Partner self-esteem and interpersonal risk: Rejection from a low self-esteem partner constrains connection and increases depletion☆

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ABSTRACT

Interpersonal rejection activates connectedness goals that are either prioritized or suppressed.

We explored whether rejection from a low (vs. high) self-esteem partner influences this process. In study 1 ($N = 205$) participants exhibited less accessibility to connection-related thoughts following rejection from a low (vs. high) self-esteem partner. Using a dyadic conflict interaction, study 2 ($N = 102$ couples) revealed that participants engaged in more connection-inhibiting behavior during conflict with a low (vs. high) self-esteem partner. Study 3 ($N = 115$) used a daily diary design and found that participants reported greater mental exhaustion on days they felt more (vs. less) rejected by a low self-esteem roommate. These effects emerged despite evidence from both self-report (studies 2 and 3) and independent coding (study 1) that rejection from a low self-esteem other was not more painful than rejection from a high self-esteem other. In sum, people appear to use impressions of others' self-esteem to determine whether connectedness goals are suppressed following rejection.

1. Introduction

Research exploring how people regulate responses to rejection within their close relationships has revealed self-esteem as an important moderator of this process (Murray, Derrick, Leder, & Holmes, 2008; Murray, Holmes, & Collins, 2006). While this research clearly demonstrates that people with low self-esteem respond to relationship threats with a range of self-protective (but potentially destructive) behaviors (e.g., Gomillion & Murray, 2014; Murray et al., 2006; Murray et al., 2008; Murray, Bellavia, Rose, & Griffin, 2003; Murray, Rose, Bellavia, Holmes, & Kusche, 2002), it does not address how relationship threat affects the partners of people with low self-esteem. Given that perceptions of a partner's level of insecurity (Lemay & Dudley, 2011; MacGregor, Fitzsimmons, & Holmes, 2013; MacGregor & Holmes, 2011) and a partner's actual level of insecurity (e.g., Campbell, Simpson, Boldry, & Kashy, 2005; Powers, Pietromonaco, Gunlicks, & Sayer, 2006) guide relationship processes important for fostering closeness, partner self-worth may be an often overlooked, but equally important predictor of how actors regulate connection-related thoughts and behavior in response to rejection within the dyadic bond. Therefore, the current research explores how rejection from a low (vs. high) self-esteem relationship partner differentially affects actor's inclination to suppress connection.

1.1. Regulating connection in response to rejection

The risk regulation model suggests that responses to interpersonal rejection are governed by a regulatory system aimed at maximizing a sense of security and minimizing the pain of being hurt by close relationship partners (Murray et al., 2006; Murray et al., 2008). At the relatively uncontrolled end of this risk regulation system is the central conflict between connectedness and self-protection goals. To resolve this goal conflict, an executive control system uses situation specific appraisals and state expectations of rejection to determine whether people will pursue connectedness goals or suppress such goals in the quest for self-protection (Murray et al., 2008). Research suggests that

the signature style underlying this corrective system, however, is moderated by people's own chronic insecurities about acceptance (e.g., Gomillion & Murray, 2014; Murray et al., 2002; Murray, Holmes, MacDonald, & Ellsworth, 1998).

Indeed, previous research has provided ample evidence that people with low explicit self-esteem (Gomillion & Murray, 2014; Murray et al., 2002; Murray, Bellavia, et al., 2003), low implicit self-esteem (Hamilton & DeHart, 2017; Peterson & DeHart, 2013), high rejection sensitivity (Downey & Feldman, 1996), and an insecure attachment style (Collins, Ford, Guichard, & Allard, 2006; Simpson, Rholes, & Phillips, 1996) have regulation systems calibrated to prioritize self-protection over connectedness goals. But given the dynamic nature of the risk regulation system (Murray et al., 2008) and the inherently dyadic process of interpersonal rejection, it is perhaps surprising that more researchers have not explored the moderating role of *partner* (in) security. We know of only one study to date that has explored how dispositional differences in partner qualities, namely partner self-control, moderate the risk regulation process predicting actor behavior (Gomillion, Lamarche, Murray, & Harris, 2014). However, there is good reason to believe that partner self-esteem informs the functioning of the risk regulation system in times when the partner is the source of rejection concerns.

1.2. Partner self-esteem as a moderator

Why might partner self-esteem influence the suppression of connectedness goals following rejection? An implicit theory of self-esteem (Zeigler-Hill & Myers, 2011, 2009) provides some insight. Specifically, the implicit theory of self-esteem suggests that self-esteem has status signaling properties, such that people perceived as high (vs. low) in self-esteem are presumed to have other characteristics (e.g., confidence, attractiveness, warmth-trustworthiness) thought to co-vary with high (vs. low) levels of self-worth. In line with this theory, research suggests that people not only form fairly accurate impressions of others' levels of self-esteem (Robinson & Cameron, 2012; Kilianski, 2008; Lemay & Dudley, 2011; Zeigler-Hill, Besser, Myers, Southard, & Malkin, 2012; MacGregor et al., 2013), but also use these impressions as a guide for how those others should be regarded (e.g., Zeigler-Hill & Myers, 2011) and treated (e.g., Lemay & Dudley, 2011; MacGregor et al., 2013; MacGregor & Holmes, 2011). Unfortunately, people perceived to have low self-esteem are evaluated more harshly and treated more cautiously than their high self-esteem counterparts.

For example, participants assign a lower mate-value and are less willing to engage in relational activities with people they believe to have low (vs. high) self-esteem (Zeigler-Hill & Myers, 2011). Moreover, even though people report equivalent levels of love for low and high self-esteem romantic partners (Murray, Holmes, & Griffin, 2000), people engage in less authentic behavior toward partners they believe to be insecure (Lemay & Dudley, 2011) and are less willing to capitalize on positive events with a close other they perceive to have low self-esteem (MacGregor & Holmes, 2011; MacGregor et al., 2013), suggesting that even within the context of a loving relationship a partner's perceived level of self-worth constrains relationship processes that promote connection. As a result, naïve theories about the negative attributes associated with low self-esteem (Zeigler-Hill & Myers, 2009, 2011), including the perception that insecure partners are easily upset (Lemay & Dudley, 2011), less responsive to self-disclosure (e.g., MacGregor et al., 2013), and particularly self-focused in conflict-of-interest situations (e.g., Murray et al., 2008; Murray & Holmes, 2009) may make it difficult for people to feel safe depending on a low self-esteem partner for the fulfillment of connectedness goals following rejection or conflict within the dyadic bond.

Research on the effect of actual (rather than perceived) partner insecurity seems to support the contention that efforts to reconnect with low self-esteem partners in response to relationship threat may be met with at least some resistance. For example, Salvatore, Kuo, Steele,

Simpson, and Collins (2011) report that insecure participants are more likely to reengage with conflict during a post-conflict "cool-down" discussion task, even when explicitly told to focus on the positive aspects of the relationship. In light of this, it is perhaps not surprising that actors whose partners doubt their self-worth are slower to physiologically recover from conflict (Powers et al., 2006) and report that daily conflicts will have more negative long-term implications for the future of their relationship (Campbell et al., 2005). As a result, it seems reasonable to suggest that rejection or conflict with a low (vs. high) self-esteem partner may be perceived as inherently more risky and unlikely to end with satiated connectedness needs, prompting the risk regulation systems of actors to activate control processes that interfere with connectedness goals (e.g., Murray et al., 2008).

2. Overview of the present research

We believe that a partner's level of self-worth will provide important information about whether actors minimize interdependence in the face of relationship threats. Specifically, we explore the inhibition of connection in response to rejection from a low (vs. high) self-esteem partner across three studies. The goals of studies 1 and 2 were to explore the effect of partner self-esteem on the suppression of connection-related thoughts and on connection-inhibiting behavior, respectively. In study 1 we used a lab experiment to explore how perceived partner self-esteem moderates the effect of a rejection manipulation on the accessibility of connection-related themes in memory. Given that connection-related information should be less accessible in memory if connectedness goals have been suppressed (e.g., Murray et al., 2008), in study 1 we tested whether rejection from a low (vs. high) self-esteem partner reduced the cognitive accessibility of constructs related to interpersonal connection.

Additionally, because the effects of goal suppression likely unfold on a cognitive level before being observed in overt behavior (e.g., Murray, Pinkus, et al., 2001), we thought it was important to determine whether the suppression of connection was also evident in behavioral reactions to relationship threat. Therefore, in study 2 both members of a dyad came to the lab, completed measures of self-esteem, and then engaged in a conflict interaction that was videotaped and coded by trained observers for behaviors related to the inhibition of connection. This method allowed us to explore how actual (rather than perceived) partner self-esteem predicted actor's connection-inhibiting behavior during the conflict, as rated by independent observers. Finally, in study 3 we sought to extend the interactive effect of partner self-esteem and partner rejection to ego depletion in day-to-day life. Given that suppressing connectedness goals in response to interpersonal risk requires executive control and, therefore, taxes cognitive resources (Murray et al., 2008 experiments 4 & 5), study 3 used a daily diary methodology to test whether daily experiences of rejection from a low (vs. high) self-esteem roommate predicted daily increases in cognitive depletion. If people are indeed suppressing connectedness goals in response to rejection from a low self-esteem partner, we would expect increases in mental exhaustion on the days participants report feeling rejected by someone with low self-esteem.

3. Study 1: partner self-esteem, rejection, and connection-thought accessibility

Previous research suggests that actors use observations about partner self-esteem to both make assumptions about additional partner characteristics (Zeigler-Hill & Myers, 2011, 2009) and forecast a partner's future behavior (e.g., Lemay & Dudley, 2011; MacGregor et al., 2013). Given that people with low (vs. high) self-esteem are perceived as less desirable relationship partners (Zeigler-Hill & Myers, 2011), respond poorly to conflict of interest situations (e.g., Murray et al., 2008; Murray & Holmes, 2009), and are treated with extra caution (e.g., Lemay & Dudley, 2011), having a partner with low self-worth may

influence the forecasted safety associated with approaching the partner after rejection, resulting in risk regulation systems that trigger the suppression of actor's connectedness goals. In study 1 we test this possibility by exploring whether rejection from a low (vs. high) self-esteem partner inhibits the cognitive accessibility of connection-related words.

Because the suppression of connectedness should decrease the accessibility of goal-related information (e.g., Murray et al., 2008 Experiment 1), we hypothesized that people who perceived their partners as low (vs. high) in self-esteem would show less accessibility to connection-related words on a word completion task after recalling a time they had been rejected by that partner. Study 1 also included a general rejection condition, which allowed us to test whether the suppression of connectedness goals was specific to rejection from the low self-esteem partner (as opposed to more general feelings of rejection stemming from outside the relationship). Because information about a partner's self-esteem should be most relevant to the risk regulation systems of actors when rejection stems from that partner, we hypothesized that people who perceived their partners as high and low in self-esteem would not differ in the accessibility of connection-related thoughts after recalling a time they had been rejected by people other than their close relationship partner. Finally, because the risk-regulation system of actors should not be activated in the absence of interpersonal threat, we also hypothesized that perceived partner self-esteem would not impact the accessibility of connection-related thoughts in the control condition.

3.1. Participants

We recruited 205 undergraduate college students from a private university in the northeastern United States to take part in a study on social relationships. Sample size was determined by recruiting as many student volunteers as possible from the psychology department participant pool in a single semester. Consistent with the demographics of the university, the sample was primarily female (78%) and Caucasian (92.2%), but also included participants who identified as African American (0.5%), Native American (2.0%), Asian American (1.5%), Hispanic/Latino (0.5%), and multi-racial (3.4%). Participants' mean age was 18.87 ($SD = 1.02$). Participants received partial course credit for participating. A post hoc power analysis was conducted using the linear multiple regression R^2 increase test in GPower (Faul, Erdfelder, Buchner, & Lang, 2009) to determine our ability to detect the unique contribution of the 2-way interactions between perceived partner self-esteem and each of the condition contrasts ($N = 205$; $\alpha = 0.05$). Power exceeded 0.99 for detecting moderate ($f^2 = 0.15$) to large effect sizes ($f^2 = 0.35$), but statistical power was 0.42 for detecting a small effect ($f^2 = 0.02$), suggesting inadequate power to detect a small effect, but more than adequate power to detect moderate/large effects.

3.2. Procedure

Participants came to a research lab and completed a series of computer-based background questionnaires, including a measure of self-esteem and several additional measures assessing individual difference factors not relevant to the present analyses. Specifically, participants completed the following measures in this order: Name-Letter Test (NLT; Kitayama & Karasawa, 1997; Koole et al., 2001; Nuttin, 1985), Rosenberg (1965) Self-esteem Scale, Relational Interdependent Self-Construal (RISC) Scale (Cross, Bacon, & Morris, 2000), Self-Concept Clarity (SCC) Scale (Campbell et al., 1996), Forced-choice Narcissistic Personality Inventory (NPI; Raskin & Terry, 1988), Adult Attachment Questionnaire (AAQ; Simpson et al., 1996), and the Need to Belong Scale (Leary, Kelly, Cotrell & Schreindorfer, 2013). Participants then identified a close relationship partner (i.e., close friend, family member, or romantic partner), and reported levels of relationship commitment and relationship satisfaction (Murray, Bellavia, et al.,

2003) and reported their perception of that partner's self-esteem (Lemay & Dudley, 2011).[3]

Participants were then randomly assigned to one of three conditions: relationship rejection, general rejection, or control. Participants in the rejection conditions were asked to write a detailed narrative of a time in which they were rejected by either the close-other identified earlier in the study (relationship rejection condition) or people with whom they were not particularly close (general rejection condition). Participants in the control condition were asked to write about their daily commute. Immediately following the manipulation, all participants completed a word-fragment completion task as a measure of accessibility of connection-related thoughts. Participants then completed a mood measure and several additional post-manipulation measures not relevant to the current analyses in the following order: Inclusion of Other in Self Scale (Aron, Aron, & Smollan, 1992), NLM (Kitayama & Karasawa, 1997); State Self-esteem Scale (Heatherton & Polivy, 1991), Facebook usage, Body-Esteem Scale for Adolescents and Adults (BESAA; Mendelson, Mendelson, & White, 2001), perceived acceptance (Murray, Bellavia, et al., 2003; Murray, Griffin, Rose, & Bellavia, 2003), future relationship behavior (Jaremka, Bunyan, Collins, & Sherman, 2010; Murray et al., 1998), and relationship optimism. All measures, manipulations, and exclusions in study 1 are disclosed here and in the Measures section. They are also available in greater detail in the Online supplemental materials.

3.3. Measures

3.3.1. Self-esteem
Rosenberg's (1965) Self-esteem Scale was used to assess participants' own self-esteem. Participants were asked to indicate how strongly they agreed with 10 statements (e.g., "I feel that I am a person of worth, at least on an equal basis with others") on a 7-point scale (1 = *disagree very much*, 7 = *agree very much*; $\alpha = 0.89$).

3.3.2. Perceived partner self-esteem
Participants were asked to identify a close relationship partner (e.g., close friend, family member, or romantic partner) and complete an adapted version of the Rosenberg's (1965) Self-esteem Scale to measure perceptions of that partner's self-esteem (see Lemay & Dudley, 2011 for similar method). Participants were asked to indicate how strongly they agreed with 10 adapted statements (e.g., "This person feels that he/she is a person of worth, at least on an equal basis with others") on a 7-point scale (1 = *disagree very much*, 7 = *agree very much*; $\alpha = 0.94$).

3.3.3. Rejection manipulation
Participants were randomly assigned to condition. Participants assigned to the relationship rejection condition were asked to write a "thorough narrative" about a time they "felt intensely hurt or rejected" by the close other they identified earlier in the study. Participants assigned to the general rejection condition were asked to write a "thorough narrative" about a time they "felt intensely hurt or rejected" by people with whom they were "not extremely close." Participants in the control condition were asked to write a "thorough narrative" about their daily commute to campus or class (see also Supplemental material for full manipulation wording).

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[3] Relationship satisfaction did not moderate the interaction between perceived partner self-esteem and either condition contrast ($b = 0.09$, $SE = 0.07$, 95% CI = [−0.04, 0.23], $t(192) = 1.39$, $p = .17$; $b = −0.08$, $SE = 0.09$, 95% CI = [−0.25, 0.10], $t(198) = −0.87$, $p = .39$). Relationship commitment also did not moderate the interaction between perceived partner self-esteem and either condition contrast ($b = 0.25$, $SE = 0.17$, 95% CI = [−0.08, 0.59], $t(192) = 1.50$, $p = .14$; $b = −0.20$, $SE = 0.13$, 95% CI = [−0.44, 0.06], $t(192) = −1.53$, $p = .13$). Finally, the interaction between perceived partner self-esteem and the relationship rejection contrast remained significant with satisfaction and commitment in the model. Therefore, we do not discuss these variables further.

3.3.4. Word-fragment completion task

Following the manipulation, participants completed a word-frag-ment completion task. Adapted from a measure of death-thought ac-cessibility (Schimel, Hayes, Williams, & Jahrig, 2007), the word-frag-ment completion task was used to measure the accessibility of connection-related words by asking participants to complete 20 word-fragments "as quickly as possible by filling in the blanks with the very first word that comes to mind." Six of 20 word-fragments could be completed with either a connection-based word adapted from Murray et al. (2008) Experiment 1 (*kissed, hug, trust, touch, bond,* and *love*) or a neutral word. For example, L_VE could be completed as either LOVE (connection-based word) or LIVE (non-connection based word). Based on the number of connection-related word fragments completed, par-ticipants received a single score ranging from 0 to 6. Higher numbers indicated greater accessibility of connection-related thoughts.

3.3.5. Mood

Participants were asked to indicate how *happy, ashamed, en-thusiastic, angry, excited, sad, proud,* and *nervous* they were "right now" on a 7-point scale ranging from 1 (*not at all*) to 7 (*very*; adapted from Watson, Clark, & Tellegen, 1988). Negative items were reversed scored and averaged together with positive items to form a single index of mood ($\alpha = 0.82$).

3.3.6. Observer-rated hurt and rejection

Two independent coders rated participants' written responses to the manipulation. Coders rated each essay on "How negative was the ex-perience described?", "How hurtful was the experience described?", and "How rejecting was the experience described?" on a scale from 1 (*not at all*) to 7 (*extremely*). Interrater reliability was established by calculating intraclass correlations (ICC). ICCs were 0.92, 0.94, and 0.92 for ratings of negativity, hurtfulness, and rejection respectively, sug-gesting acceptable interrater reliability.

4. Study 1 results

4.1. Manipulation check

An ANOVA was run to determine if participants in our rejection conditions wrote about more rejecting experiences than those partici-pants in the control condition. As expected, independent coders' ratings of rejection differed significantly across condition, $F(2,199) = 241.31$, $p < .001$. Post hoc comparisons using the Tukey HSD test indicated that responses to both the relationship rejection condition ($M = 4.10$, $SD = 1.68$) and general rejection conditions ($M = 5.10$, $SD = 0.96$) were rated as significantly more rejecting than responses to the control condition ($M = 1.04$, $SD = 0.17$).

4.2. Perceived partner self-esteem and connection-thought accessibility

Following Aiken and West's (1991) instructions for testing interac-tions between categorical and continuous variables, two dummy coded variables (relationship rejection contrast and general rejection contrast) were computed using the control condition as the comparison group. Next, performance on the word-fragment completion task was pre-dicted from the centered main effects of participant self-esteem (con-tinuous variable), perceived partner self-esteem (continuous variable), the two dummy coded contrasts, and the relevant 2-way interactions between perceived partner self-esteem and condition contrasts. In-cluding the 3-way interactions between participant self-esteem, per-ceived partner self-esteem, and condition contrasts did not significantly change the variance accounted for ($\Delta R^2 = 0.002$, $F_{(2,192)} = 0.23$, $p = .79$), and neither the component Participant Self-es-teem × Perceived Partner Self-esteem × Relationship Rejection Con-trast interaction ($b = 0.08$, $SE = 0.12$, 95% CI = [-0.16, 0.33], t (192) = 0.68, $p = .50$) nor the Participant Self-esteem × Perceived

Partner Self-esteem × General Rejection Contrast interaction ($b = 0.05$, $SE = 0.19$, 95% CI = [-0.32, 0.42], $t(192) = 0.27$, $p = .79$) were sig-nificant.[4] Therefore, the three-way interactions were not included in the final model. Finally, controlling for mood did not change the pat-tern of results, and mood was dropped from the model.

The multiple regression analysis predicting performance on the word-fragment completion task revealed a significant interaction be-tween perceived partner self-esteem and the relationship rejection contrast, $b = 0.33$, $SE = 0.15$, 95% CI = [0.04, 0.62], $t(198) = 2.25$, $p = .03$ (see Table 1). Consistent with our hypotheses, simple slope tests revealed that perceived partner self-esteem was unrelated to connec-tion-word completion in both the general rejection, $b = 0.10$, $SE = 0.11$, 95% CI = [-0.12, 0.32], $t(198) = 0.91$, $p = .37$, and con-trol conditions, $b = -0.03$, $SE = 0.10$, 95% CI = [-0.23, 0.16], t (198) = -0.34, $p = .74$, but significantly related in the relationship rejection condition, $b = 0.30$, $SE = 0.14$, 95% CI = [0.07, 0.52], t (198) = 2.61, $p = .01$, suggesting that people showed less accessibility to connection-related thoughts after recalling a time they were rejected by a partner they perceived to be low (vs. high) in self-esteem (see Fig. 1).

Moreover, the significant relation between perceived partner self-esteem and task performance in the relationship rejection condition seems to be driven by a significant decrease in connection-thought accessibility among participants who perceive their partners as low in self-esteem. That is, participants who perceived their partners as low in self-esteem completed significantly fewer connection-related words in the relationship rejection condition compared to both the general re-jection condition, $b = -0.56$, $SE = 0.27$, 95% CI = [-1.10, -0.03], t (198) = -2.09, $p = .04$, and control condition, $b = -0.59$, $SE = 0.26$, 95% CI = [-1.10, -0.08], $t(198) = -2.29$, $p = .02$. On the other hand, participants who perceived their partner as high in self-esteem completed just as many word fragments with connection-related words in the relationship rejection condition as they did in the general re-jection, $b = -0.08$, $SE = 0.26$, 95% CI = [-0.58, 0.44], t (198) = -0.29, $p = .78$, and control conditions, $b = 0.23$, $SE = 0.26$, 95% CI = [-0.28, 0.74], $t(198) = 0.89$, $p = .38$.[5]

4.3. Post hoc analyses

Do people who perceive their partner as low in self-esteem recall more negative, hurtful, or rejecting interactions in response to our manipulation? If so, this could be a potential explanation for the re-duced accessibility to connection-related thoughts among participants who perceive their partners as low in self-esteem. To test this possibi-lity, we again ran a series of multiple regression analyses predicting observer-rated negativity, hurtfulness, and rejection from the same predictors as above. These analyses revealed the expected significant effects of condition, such that people in the control condition recalled

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[4] A post hoc power analysis (GPower; Faul et al., 2009) on our ability to detect the unique contribution of the 3 way interactions ($N = 205$; $\alpha = 0.05$) revealed that statistical power was 0.42 for detecting a small effect ($f^2 = 0.02$), but exceeded 0.99 for detecting moderate ($f^2 = 0.15$) to large effect sizes ($f^2 = 0.35$). This suggests inadequate power to detect a small effect, but more than adequate power to detect medium to large effects.

[5] While the interactions between actor self-esteem and the condition con-trasts were not significant ($\beta s < \pm 0.14$, $t s < \pm 1.50$, $p s > 0.14$), simple effect tests reveal that people with low self-esteem complete somewhat fewer connection-based words in both the relationship rejection ($b = -0.23$, $SE = 0.26$, 95% CI = [-0.74, 0.24], $t(199) = -0.91$, $p = .36$) and general rejection ($b = -0.17$, $SE = 0.28$, 95% CI = [-0.77, 0.38], $t(199) = -0.62$, $p = .54$) conditions. Conversely, people with high self-esteem complete some-what more connection-based words in the general rejection (vs. control) con-dition ($b = 0.45$, $SE = 0.28$, 95% CI = [-0.09, 0.99], $t(199) = 1.63$, $p = .11$), but not in the relationship rejection (vs. control) condition ($b = -0.11$, $SE = 0.26$, 95% CI = [-0.61, 0.38], $t(199) = -0.42$, $p = .67$).

Table 1
Multiple regression results for condition and perceived partner self-esteem predicting completed connection-related word fragments.
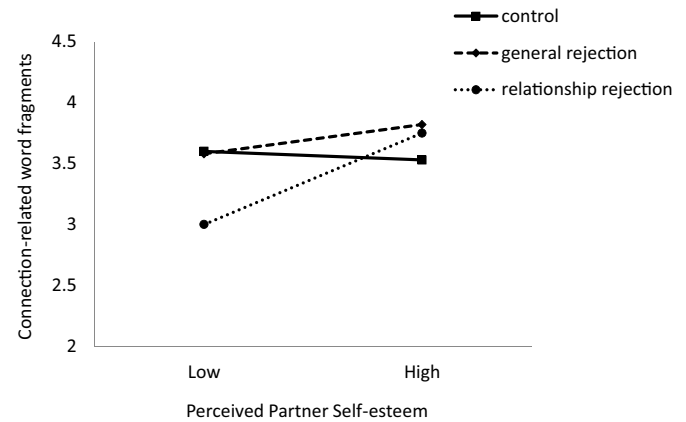
Connection-related word fragments completed (DV)						
	b	*SE*	*t*	*p*	95% CI	*sr*
Intercept	3.56	0.30	27.61	.001	3.31, 3.82	
Participant SE	−0.03	0.08	−0.40	.69	−0.19, 0.13	
Partner SE	−0.03	0.10	−0.34	.74	−0.23, 0.16	
Relationship Rejection Contrast	−0.18	0.18	−0.98	.33	−0.54, 0.18	
General Rejection Contrast	0.14	0.18	0.76	.45	−0.22, 0.50	
Partner SE × Relationship Rejection Contrast	0.33	0.15	2.25	.03	0.04, 0.62	0.16
Partner SE × General Rejection Contrast	0.13	0.15	0.92	.36	−0.15, 0.42	0.06

Fig. 1. Predicting completed connection-related word fragments from the interaction between condition and perceived partner self-esteem (Study 1).

less negative ($b = 2.96$, $SE = 0.19$, 95% CI = [2.58, 3.33], $t(195) = 15.67$, $p < .001$; $b = 3.62$, $SE = 0.19$, 95% CI = [3.24, 3.99], $t(195) = 19.22$, $p < .001$), hurtful ($b = 3.58$, $SE = 0.19$, 95% CI = [3.12, 3.95], $t(195) = 19.09$, $p < .001$; $b = 3.99$, $SE = 0.19$, 95% CI = [3.62, 4.31], $t(195) = 21.28$, $p < .001$), and rejecting ($b = 3.03$, $SE = 0.19$, 95% CI = [2.66, 3.40], $t(195) = 16.16$, $p < .001$; $b = 4.05$, $SE = 0.19$, 95% CI = [3.67, 4.42], $t(195) = 21.59$, $p < .001$) experiences compared to people in both the relationship rejection and general rejection conditions, respectively. However, perceived partner self-esteem and the interaction between perceived partner self-esteem and condition contrasts did not significantly predict observer-ratings of negativity, hurtfulness, or rejection (all βs $< \pm 0.23$, ts $< \pm 1.56$, ps $> .18$).[6]

5. Study 1 discussion

Study 1 revealed several important themes. First, in support of our hypotheses, rejection from a low (vs. high) self-esteem partner resulted in reduced accessibility to connection-related concepts. Consistent with the idea that the risk regulation system uses environmental information to determine whether it is safe to prioritize connection in response to rejection (Murray et al., 2008) and with research suggesting that low self-esteem may provide a signal to proceed with caution (e.g., Lemay & Dudley, 2011; Zeigler-Hill & Myers, 2011), study 1 offers preliminary evidence that partner self-esteem also informs the risk regulation system resulting in the suppression of connectedness goals. Second, this effect was specific to recalling a rejecting experience that involved the low self-esteem partner, and did not generalize to rejection stemming from others who were not close relationship partners. Third, the effect of partner self-esteem on connection-thought accessibility was not moderated by participants' own levels of self-esteem, a finding consistent with other work on the effect of partner insecurity (e.g., Lemay & Dudley, 2011; Robinson & Cameron, 2012). Finally, our post hoc analyses revealed that the recalled rejection experience was *not* rated by coders as more negative, rejecting, or hurtful when it involved a low (vs. high) self-esteem partner. Therefore, participants with low self-

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[6] Consistent with the risk-regulation model (Murray et al., 2006; Murray et al., 2008), we replicate the well-established finding that participants' own levels of self-esteem predict rejection experiences. Participants with low (vs. high) self-esteem were rated by observers as writing about significantly more negative ($b = −0.25$, $SE = 0.12$, 95% CI = [−0.49, −0.02], $t(195) = −2.18$, $p = .03$) hurtful ($b = −0.35$, $SE = 0.12$, 95% CI = [−0.57, −0.12], $t(195) = −2.96$, $p = .003$) and rejecting ($b = −0.42$, $SE = 0.12$, 95% CI = [−0.65, −0.19], $t(195) = −3.64$, $p < .001$) experiences in the relationship rejection condition. The simple slope of participant self-esteem was unrelated to observer ratings of negativity, hurtfulness, and rejection in both the control and general rejection conditions (all βs $< \pm 0.12$, ts $< \pm 1.57$, ps > 0.12).

esteem partners suppress connection even though being rejected by this partner is not more painful, a finding we explore further in studies 2 and 3.

6. Study 2: partner self-esteem, conflict, and connection-inhibiting behavior

The goal of study 2 was to extend the results of study 1 in four interrelated ways. First, because goal suppression (and activation) does not always translate into observable behavior (e.g., Murray et al., 2011; Finkel & Campbell, 2001), we conducted study 2 to help us determine whether the connection-inhibiting cognitive responses observed following rejection from a low (vs. high) self-esteem partner in study 1 generalize to connection-inhibiting behavioral responses during a conflict interaction with a low (vs. high) self-esteem partner in study 2. Second, because both members of the dyad participated in study 2, we were able to explore whether partner self-esteem, as reported by the partner, predicted actor's connection-inhibiting behavior during conflict. We expected to replicate the results of study 1, such that partner self-esteem would be a significant predictor of connection-inhibiting behavior during the conflict interaction. Specifically, we hypothesized that actors with low (vs. high) self-esteem partners would be rated by independent observers as engaging in more closed-off and tense/rigid body language during the conflict interaction. Consistent with study 1, we also hypothesized that this effect would be independent of the effect of actor self-esteem on connection-inhibiting behavior and would not be moderated by actor self-esteem.

Third, study 2 assessed actor's self-reported (rather than observer-rated) feelings of interpersonal angst immediately following the conflict interaction. This allowed us to test whether actor's perceptions of hurt following rejection differ depending on their partner's level of self-esteem. Because study 1 suggested that rejection from a low (vs. high) self-esteem partner was not rated by coders as more negative or hurtful, we suspected that partner self-esteem would not predict actor's self-reported post-conflict angst in study 2. Such results would replicate the null effect of partner self-esteem on actors' self-reported angst/hurt, providing additional evidence that rejection stemming from a low self-esteem partner is no more hurtful than rejection stemming from a high self-esteem partner. On the other hand, if rejection from a low (vs. high) self-esteem partner brings to mind broader relationship concerns and a reduced desire for connection, it may be accompanied by increased interpersonal angst. Study 2 allows us to test these two competing predictions.

Finally, we also assessed relationship commitment and satisfaction both post-conflict in the lab and in a 6 month follow-up survey. Because research suggests that actors with insecure partners believe conflict will have more negative effects on relationship stability over the long-term

(e.g., Campbell et al., 2005), assessing relationship commitment and satisfaction at these two time points allows us to explore whether people with low (vs. high) self-esteem romantic partners reported more relationship dysfunction immediately post-conflict and over time.

6.1. Participants

Two hundred and four undergraduate college students (102 couples) from a private university in the Midwestern United States who were currently involved in a monogamous romantic relationship of at least 2 months took part in a study on "Romantic Relationship Interactions." Our goal was to recruit as many couples as possible from the psychology department participant pool and general student population over the course of two semesters. To be consistent with past research (Lemay & Dudley, 2011 study 3; Murray et al., 2008 experiment 8), we aimed for approximately 100 couples, and recruited slightly more (102). A power analysis using APIM_Pow.R (Kenny, Kashy & Cook, 2006) revealed that the sample size allows for the detection of both actor and partner effects of $\beta = 0.2$ with a power level of 0.80, suggesting adequate power to examine our hypotheses. The mean age of participants in the sample was 20.73 years old ($SD = 1.52$) and the average relationship length was 19.95 months ($SD = 16.53$; range: 2–96 months). Of the 102 couples, 100 couples were heterosexual and 2 couples were same-sex.[7] Participants received either monetary payment or course credit for their participation.

6.2. Overview of procedure

Couples arrived at the lab together, but were separated and asked to complete a series of pre-conflict questionnaires, including a measure of self-esteem and several other scales not relevant for the current analyses. Specifically, participants completed the following measures in this order: Name-Letter Test (NLT; Kitayama & Karasawa, 1997; Koole et al., 2001; Nuttin, 1985), Rosenberg (1965) Self-esteem Scale, relationship length, distance, and marital status, current relationship quality, relationship commitment (Simpson et al., 1996; Rusbult, Martz, and Agnew, 1998) and satisfaction (Murray, Bellavia, et al., 2003), attachment (ECR; Brennan, Clark, & Shaver, 1998), Interpersonal Qualities Scale (IQS; Murray, Holmes, Griffin, 1996), RISC Scale (Cross et al., 2000), SCC Scale (Campbell et al., 1996), and the NPI (Raskin & Terry, 1988). The last item of the pre-conflict questionnaire packet asked each member of the couple to identify an issue that was the cause of a recent, unresolved, and major disagreement in their relationship. Partners were then brought back together. The researcher selected one of the issues for the conflict discussion by flipping a coin (Powers et al., 2006). After the issue was chosen for discussion, participants were told to think about the last major argument they had about this topic and that they should try to resolve it during the 7-minute discussion session (adapted from Simpson et al., 1996). Couples were told that the interaction would be videotaped and coded later.

Following the conflict discussion, each member of the couple completed post-conflict measures of interpersonal vulnerability, relationship love, satisfaction and commitment, mood, and stress. Couples where then brought back together to engage in a positive discussion task to help alleviate any negative affect left over from the conflict discussion. Finally, 6 months after participating in the initial conflict interaction, participants were contacted via phone and asked to report their current levels of relationship satisfaction and commitment. Of the 204 participants who completed the lab portion of the study, 148 completed measures of satisfaction and commitment at the 6 month follow-up. Importantly, participants who completed these follow-up measures did not differ significantly from those who did not complete

these measures in actor self-esteem, partner self-esteem, post-conflict satisfaction, or post-conflict commitment (all $ts < \pm 0.96$, $ps > .34$). All measures, manipulations, and exclusions in the study are disclosed and available in more detail in the Online supplemental materials.[8]

6.3. Pre-conflict measures

6.3.1. Self-esteem
As in Study 1, the 10-item Rosenberg (1965) Self-esteem Scale was used to assess participant self-esteem ($\alpha = 0.89$). This time, however, both members of the dyad completed the Self-esteem Scale.

6.4. Post-conflict measures

6.4.1. Interpersonal vulnerability
Post-conflict, participants completed a 12-item measure of interpersonal vulnerability or angst (Murray et al., 2008) by indicating how the interaction with their partner made them feel (e.g., happy, angry, hurt, rejected, betrayed, included, misunderstood) on a 7-point scale (1 = *not at all*, 7 = *very*). Positive items were reverse scored and combined with negative items such that higher scores reflect more self-reported vulnerability or hurt feelings ($\alpha = 0.93$).

6.4.2. Relationship satisfaction and commitment
To assess relationship satisfaction participants indicated their agreement with 4-items (e.g., *Right now, I am extremely satisfied with my romantic relationship*) on a scale from 1 (*do not agree at all*) to 9 (*completely agree*; $\alpha = 0.83$). Participants also reported their level of commitment by indicating how much they agreed with a single item (*Right now, how much commitment do you feel toward your partner or your relationship?*) on a scale from 1 (*very little*) to 7 (*very much*).

6.4.3. Mood
The Positive and Negative Affectivity Schedule (PANAS; Watson et al., 1988) was used to tap participants' post-conflict mood. The PANAS consists of 10 negative (e.g., *irritable*, *jittery*) and 10 positive (e.g., *excited*, *strong*) emotions. Participants rated the extent that they felt each emotion at that moment on a 5-point scale (1 = *very slightly or not at all*, 5 = *extremely*). An index of positive affect was created by aggregating the positive emotions ($\alpha = 0.87$) and an index of negative affect was created by aggregating the negative emotions ($\alpha = 0.87$).

6.5. 6 month follow-up measures

6.5.1. Relationship satisfaction and commitment
Six months after the initial conflict interaction, participants were contacted via phone and asked whether they were still dating the individual with whom they completed the interaction study. If the couple was still dating, participants were asked to indicate how satisfied (1 = *not at all satisfied*; 9 = *very satisfied*) and how committed (1 = *not at all committed*; 7 = *very committed*) they were to their romantic relationship.

6.6. Coding of conflict behavior

Videotaped conflict interactions were coded by trained observers. Three independent observers coded male behavior and three coded female behavior.[9] The current study used a two way mixed model,

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[7] Dropping same-sex couples from the analyses did not change the pattern of findings.

[8] Data from this study were also reported in Peterson and DeHart (2014) and Study 2 of Peterson and DeHart (2013). Findings regarding partner self-esteem, closed off behavior during the interaction, and results of the 6 month follow-up survey were not reported in that published research.

[9] If members of a couple were of the same sex, independent observers only coded one partner, never both.

where raters are seen as a fixed effect and behaviors are seen as a random effect (Shrout & Fleiss, 1979). A consistency computation was used to determine if raters' scores were correlated (as opposed to identical), and an ICC of 0.70 or higher was considered acceptable interrater reliability. Two items were adapted from the Rapid Marital Interaction Coding System (RMICS; Heyman & Vivian, 2000) and used to assess connection-inhibiting behavior. On a scale from 1 (*not at all*) to 7 (*nearly all the time*), independent observers rated the degree to which participants "appeared tense/rigid" (ICC = 0.84) and exhibited "folded or crossed arms, closed off body language" (ICC = 0.73) during the conflict interaction. Because ICCs indicated acceptable interrater reliability, ratings by the three independent observers were averaged to create single ratings for tense/rigid (*M* = 2.53, *SD* = 0.84) and closed off body language (*M* = 1.90, *SD* = 1.10).

7. Study 2 results

Because the data contains two levels of analysis with individuals (Level 1) nested within couple (Level 2), we used the Actor Partner Interdependence Model (APIM; Campbell & Kashy, 2002; Kashy & Kenny, 2000; Kenny, Kashy, & Bolger, 1998) to conduct multilevel regression analyses in PROC MIXED in SAS v9.4 . This approach allows for the simultaneous estimation of regression equations for partners from the same dyad, while controlling for the interdependence between observations. All mixed predictor variables (i.e., those predictors that have variation both within and between dyads, such as self-esteem) were modeled as Level-1 variables (Campbell & Kashy, 2002). In addition, because both members of the couple were participants in study 2, we refer to actor and partner effects (rather than participant and partner) to be both consistent with the APIM and to avoid confusion.

7.1. Partner self-esteem and actor connection-inhibiting behavior

To determine if people's connection-inhibiting behavior during conflict is influenced by their partner's level of self-esteem, multilevel regression analyses were used to examine the main effect of partner self-esteem on observer-ratings of actors' tense and closed off body language during the conflict discussion. Observer rated behavior was predicted from the centered main effects of actor self-esteem, partner self-esteem, mood, gender (1 = *females*, −1 = *males*), and the Actor Self-esteem × Partner Self-esteem 2-way interaction. As in study 1, actor self-esteem did not moderate the effect of partner self-esteem on behavior, and therefore the 2-way interaction was not included in the final model when predicting tense/rigid (*b* = 0.06, *SE* = 0.06, 95% CI = [−0.07, 0.18], *t* = 0.88, *p* = .38) or closed off body language (*b* = 0.10, *SE* = 0.08, 95% CI = [−0.06, 0.26], *t* = 1.22, *p* = .26). Dropping the interaction term did not change the reported results. Finally, like study 1, controlling for mood did not change the pattern of results, and mood was dropped from the model. As shown in Table 2, multilevel analyses revealed a significant effect of gender, such that men were rated as being more tense/rigid during the conflict interaction. In addition, partner self-esteem was significantly and negatively related to observer ratings of actor rigidity/tenseness. Partner self-esteem was also negatively related to closed off body language, and this effect was marginally significant (*p* = .09). Together, these results appear consistent with our hypotheses and suggest that people with low (vs. high) self-esteem partners engage in more connection-inhibiting behavior (tense and closed off) under the threat of rejection.[10]

Table 2
Multilevel regression results for partner self-esteem predicting conflict behavior.

	Tense/rigid (DV)					
	b	*SE*	*t*	*p*	95% CI	*r*
Intercept	2.53	0.06	40.45	.001	2.41, 2.66	
Gender	−0.23	0.05	−4.62	.001	−0.33, −0.13	
Actor self-esteem	−0.05	0.06	−0.81	.42	−0.17, 0.07	
Partner self-esteem	0.15	0.06	−2.46	.01	−0.27, −0.03	0.17

	Closed off (DV)					
	b	*SE*	*t*	*p*	95% CI	*r*
Intercept	1.89	0.08	24.84	.001	1.74, 2.04	
Gender	0.10	0.08	1.25	.22	−0.06, 0.25	
Actor self-esteem	0.01	0.08	0.13	.89	−0.16, 0.18	
Partner self-esteem	−0.14	0.08	−1.68	.09	−0.31, 0.02	0.12

7.2. Partner self-esteem and actor vulnerability

We regressed the same predictors as above onto participant reports of post-conflict feelings of vulnerability to determine if partner self-esteem influenced actor's feelings of interpersonal pain post-conflict. This analysis revealed a marginally significant main effect of gender (*b* = 0.07, *SE* = 0.04, 95% CI = [−0.01, 0.16], *t* = −1.74, *p* = .08) and a main effect of actor self-esteem (*b* = −0.25, *SE* = 0.08, 95% CI = [−0.40, −0.10], *t* = −3.31, *p* = .001), suggesting that women (vs. men) and people with lower (vs. higher) self-esteem reported feeling more hurt by the conflict interaction. This latter finding is consistent with other work on actor self-esteem and risk regulation (e.g., Murray et al., 2008). However, neither partner self-esteem (*b* = −0.03, *SE* = 0.08, 95% CI = [−0.18, 0.13], *t* = −0.35, *p* = .73) nor the interaction between actor self-esteem and partner self-esteem (*b* = −0.15, *SE* = 0.10, 95% CI = [−0.34, 0.04], *t* = −1.54, *p* = .13) were significant. These findings replicate the results of study 1 and reveal that participants did not feel more interpersonal pain following conflict with a low (vs. high) self-esteem partner, even though they appeared more inhibited during the conflict interaction.

7.3. Partner self-esteem and actor satisfaction and commitment

We also ran a set of analyses predicting participant reports of relationship satisfaction and commitment both immediately following the conflict interaction and 6 months later. Again, actor self-esteem did not interact with partner self-esteem to predict satisfaction or commitment at our post-conflict assessment or the 6 month follow-up (all *b*s < ± 0.15, *t*s < ± 1.38, *p*s > ± .17), and thus was not included in the final model. Replicating Murray et al.'s (2008) work, actor self-esteem was positively and significantly related to relationship satisfaction immediately following the conflict interaction, suggesting that people with low (vs. high) self-esteem were less satisfied, but not less committed, following the conflict interaction. Partner self-esteem was not significantly related to post-conflict satisfaction or commitment (see top of Table 3).

At the 6 month follow-up, actor self-esteem remained a significant predictor of actor's relationship satisfaction and became a significant

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[10] Consistent with the risk regulation model, actor self-esteem predicted observer-rated behaviors not presented in the current manuscript. That is, actors with low (vs. high) self-esteem were observed during the conflict interaction engaging in more self-protective verbal behaviors (e.g., changed or avoided the subject), *b* = −0.09, *SE* = 0.05, 95% CI = [−0.19, 0.002], *t* = −1.92, *p* = .05, and somewhat fewer connection-related nonverbal behaviors (e.g., eye

(*footnote continued*)

contact, smiling, nonverbal agreement), *b* = 0.07, *SE* = 0.04, 95% CI = [−0.009, 0.16], *t* = 1.77, *p* = .08. However the statistical effect of actor self-esteem on observer-rated behavior is eliminated when we control for partner self-esteem (*b* = −0.06, *SE* = 0.06, 95% CI = [−0.17, 0.06], *t* = −0.99, *p* = .32; *b* = 0.06, *SE* = 0.05, 95% CI = [−0.03, 0.16], *t* = 1.31, *p* = .19, respectively).

Table 3

Multilevel regression results for partner self-esteem predicting post-conflict and follow-up satisfaction and commitment.

Post-conflict

	Satisfaction (DV)						Commitment (DV)					
	b	SE	t	p	95% CI	r	b	SE	t	p	95% CI	r
Intercept	7.74	0.13	57.22	.0001	7.47, 8.01		6.49	0.09	74.84	.0001	6.31, 6.66	
Gender	0.05	0.06	0.88	.38	−0.07, 0.18		0.09	0.06	1.47	.14	−0.03, 0.22	
Actor self-esteem	0.34	0.11	3.02	.003	0.12, 0.56	0.06	0.12	0.08	1.40	.16	−0.05, 0.27	0.01
Partner self-esteem	−0.06	0.11	−0.56	.58	−0.28, 0.16	0.002	0.005	0.08	0.06	.95	−0.16, 0.17	0.000

6 month follow-up

	Satisfaction (DV)						Commitment (DV)					
	b	SE	t	p	95% CI	r	b	SE	t	p	95% CI	r
Intercept	7.89	0.11	67.42	.0001	7.65, 8.12		6.53	0.08	81.03	.0001	6.36, 6.69	
Gender	−0.002	0.08	−0.03	.98	−0.17, 0.17		0.03	0.05	0.62	.53	−0.07, 0.14	
Actor self-esteem	0.22	0.10	2.10	.04	0.01, 0.42	0.03	0.15	0.07	2.14	.03	0.01, 0.29	0.03
Partner self-esteem	0.34	0.11	3.25	.001	0.13, 0.55	0.07	0.23	0.07	3.20	.002	0.09, 0.37	0.07

predictor of actor's commitment, suggesting that people with low self-esteem were less satisfied and less committed 6 months after the initial conflict interaction. Interestingly, the partners of low self-esteem people felt similarly. Analyses from the follow-up survey revealed that people with low self-esteem partners reported lower commitment and satisfaction when compared to people with high self-esteem partners. Importantly, this effect emerged while controlling for the effect of actor self-esteem, suggesting the effect of partner self-esteem on satisfaction and commitment at the 6 month follow-up was unique from the effect of actor self-esteem on these same variables (see bottom of Table 3). This suggests that partner self-esteem not only influences actors' connection-inhibiting behavior during the conflict interaction, but may be a particularly important predictor of actor's perceived relationship quality over time.

7.4. Post-hoc analyses

Because we had reports of relationship length from romantic partners, we were able to explore whether relationship length moderated the effect of partner self-esteem on closed off and rigid behavior during the conflict. This allowed us to test whether connection-inhibiting behavior during the conflict represents a behavioral tendency acquired overtime with a specific low self-esteem partner or if people may be relying on implicit theories of self-esteem to guide their behavior. If the inhibition of connectedness goals is learned over the course of a relationship with a low self-esteem partner, we would expect to see a stronger effect of partner self-esteem on participant rigid and closed off behavior for people who have been in longer (vs. shorter) relationships. However, this was not the case. Analyses revealed that relationship length did not moderate the effect of partner self-esteem predicting observers' ratings of either closed off ($b = 0.005$, $SE = 0.006$, 95% CI = [−0.01, 0.07], $t = 0.96$, $p = .34$) or tense/rigid ($b = 0.001$, $SE = 0.004$, 95% CI = [−0.01, 0.01], $t = 0.28$, $p = .78$) behavior during the interaction. Such results suggest that people appeared to engage in connection-inhibiting behavior during conflict with a low self-esteem romantic partner, regardless of how long they had been dating that partner.

Finally, we decided to create a post-hoc connection-activation composite to determine whether partner self-esteem also predicted connection-activation behaviors in addition to the connection-inhibiting behaviors observed in study 2. That is, people with high (vs. low) self-esteem partners may engage in more connection seeking behaviors during the conflict discussion. On a scale from 1 (*not at all*) to 7 (*nearly all the time*) independent observers rated the degree to which

participants vocally "reassured partner of their feelings" (e.g., *I love you, I want to be with you*; ICC = 0.97), "expressed care or concern for their partner or relationship" (ICC = 0.78) and "affectionately touched their partner" (ICC = 0.72). A connection-activation composite was created by summing and averaging ratings of verbal expressions of love, verbal expressions of care, and affectionate touch (α = 0.70). A multi-level regression analysis predicting the connection-activation composite revealed a significant main effect of gender such that women engaged in more connection-activation behavior as compared to men, $b = 0.10$, $SE = 0.03$, 95% CI = [0.05, 0.16], $t = 3.67$, $p = .0004$. However, the main effects of both actor self-esteem ($b = −0.03$, $SE = 0.05$, 95% CI = [−0.14, 0.07], $t = −0.65$, $p = .52$) and partner self-esteem ($b = −0.06$, $SE = 0.05$, 95% CI = [−0.16, 0.04], $t = −1.19$, $p = .24$) were not significant, suggesting that actors with low and high self-esteem partners did not differ in connection-activation behaviors during the conflict interaction. Coupled with the findings for connection-inhibition behaviors, these post hoc analyses reveal that while actors with high (vs. low) self-esteem partners do not actively inhibit connection during conflict that partner, they may not pursue it either.

8. Study 2 discussion

Study 2 provides both a conceptual replication and extension of study 1. First, just as low (vs. high) partner self-esteem inhibited the accessibility of connection-related thoughts following a rejection manipulation (study 1), low (vs. high) partner self-esteem also resulted in connection-inhibiting behavior during a conflict interaction. Such findings provide further support that a partner's level of self-esteem may signal the suppression of connectedness goals in the risk regulation systems of actors. Second, study 2 also revealed that the effect of partner self-esteem on connection-inhibiting behavior was not moderated by actor self-esteem, nor was it moderated by relationship length. The former findings replicate those of study 1, suggesting that regardless of people's own levels of self-worth, their partner's self-esteem influenced the suppression of connectedness goals under relationship threat. The latter results suggest that the inhibition of connection during conflict with a low self-esteem romantic partner is not necessarily learned overtime through interactions with that partner. Instead, people may be relying on implicit theories of self-esteem (e.g., Zeigler-Hill & Myers, 2011), which likely signal to the risk regulation system that a low self-esteem partner is not ideal for the fulfillment of connectedness goals.

Third, study 2 revealed that people with low self-esteem partners did not feel more hurt by the conflict interaction compared to people

with high self-esteem partners. These results are similar to those of study 1, in which independent coders rated rejection experiences as similarly hurtful and negative, regardless of participants' perceptions of their partner's self-esteem. Indeed, consistent with the idea that ambivalence about approaching a partner is strongest if rejection from the partner is still painful (Murray et al., 2008), study 2 also revealed that partner self-worth does not influence overt expressions of love and affection during the interaction. That is, actors with high self-esteem partners look similar to their counterparts with low self-esteem partners on connection-activation behaviors, which occurred relatively infrequently and with little variation ($M = 1.76$, $SD = 0.70$). Thus, regardless of partner self-esteem, participants do not appear particularly forthcoming with overt affection during the lab-based conflict discussion. While this is not completely surprising given that participants were tasked with discussing "the most heated and unresolved issue" in their relationship to date, it may also suggest that this type of conflict scenario is so threatening that it is difficult to observer connection-activation behaviors, even among actors who should be poised to pursue connectedness goals (such as those with high self-esteem partners).

Nevertheless, only people with low self-esteem partners appear to actively inhibit connection with their partner by engaging in interdependence-minimizing behaviors during the interaction. Perhaps not surprisingly then, partner self-esteem became an important predictor of relationship issues over time. That is, partner self-esteem was a significant predictor of actor's satisfaction and commitment 6 months after the initial conflict interaction. Given that actor self-esteem was also a significant predictor of actor satisfaction and commitment at the 6 month follow-up, our results appear reminiscent of Campbell et al. (2005) findings in which highly anxious participants and their partners both felt conflicts would have a negative effect on the future of their relationships.

9. Study 3: roommate self-esteem, rejection, and ego-depletion

In study 3 we sought to extend the interactive effect of partner self-esteem and partner rejection observed in studies 1 and 2 to daily experience of ego depletion using a daily diary methodology. That is, given that suppressing connectedness goals in response to interpersonal risk requires executive control and, therefore, taxes cognitive resources (Murray et al., 2008 experiments 4 & 5), and because participants appear to suppress connectedness goals following rejection from a low (vs. high) self-esteem partner (current studies 1 and 2), we thought it reasonable to assume that daily rejection experiences would lead to cognitive depletion only when the offending partner was low in self-esteem. In study 3 we tested this prediction by asking participants to provide reports of both their own level of self-esteem and perceptions of their roommate's level of self-esteem. Then, every day for 14 days, participants reported daily perceptions of rejection from the roommate and daily feelings of cognitive depletion. We hypothesized that when participants perceived their roommate as low in self-esteem, daily rejection from that roommate would lead to increased daily cognitive depletion. Conversely, we hypothesized that when participants perceived their roommate as high in self-esteem, daily rejection experiences would have no impact on daily cognitive depletion.

In addition, because studies 1 and 2 suggest that rejection from a low self-esteem partner is no more painful than rejection from a high self-esteem partner, study 3 further explored how acute experiences of rejection from a roommate during the day predict general feelings of rejection that evening. Based on the results of studies 1 and 2, we hypothesized that perceived roommate self-esteem would not moderate the relationship between daily perceived roommate rejection and nightly felt rejection (as reported next day). That is, people should report greater general feelings of rejection on evenings following days of high (vs. low) perceived roommate rejection, regardless of perceptions of the roommate's level of self-esteem. Such a finding would suggest that people with low self-esteem roommates are not feeling more rejected overall (which may lead to ego depletion), but rather they report

greater ego depletion because they are likely inhibiting connection with a rejecting roommate.

9.1. Participants

One hundred and thirty-three undergraduate students currently living with a roommate were recruited to take part in a study on the self and college student daily life. Again, our goal was to recruit the maximum number of student volunteers as possible and that we could pay. Data were excluded from 18 participants who did not complete at least 7 daily surveys across the 14 day diary portion of the study. The final sample included 115 students (85% female participants). Participants completed the diary study on 1418 days of the potential 1610 (115×14 days) reporting days (88% compliance rate). According to Kreft and DeLeeuw (1988, p.125), power in multilevel modeling is based on both the number of level 1 and level 2 observations. For example, studies with at least 30 level 2 units with 30 level 1 observations each (900 observations total) would provide adequate power (i.e., 80). The current study collected a total of 1418 observations, providing acceptable power to examine all of the hypotheses in question. Consistent with the demographics of the University, the sample was primarily Caucasian (88.7%), but also included participants who identified as African American (0.9%), Native American (1.7%), Asian American (6.1%), Hispanic/Latino (1.7%), and multi-racial (0.9%). Participants' mean age was 18.65 ($SD = 0.82$). Participants received partial course credit and monetary compensation for participating.

9.2. Procedure

Participants came to the lab and completed a computer-administered background questionnaire, which included a measure of participant self-esteem and perceived roommate self-esteem along with a series of measures not used to the current analyses. Participants completed the following background measures in this order: basic demographics, romantic relationship status, Facebook Intensity Scale (Ross et al., 2009), support seeking on Facebook (Carpenter, 2012), sexual identity, Rosenberg (1965) Self-esteem Scale, Name-Letter Test (NLT; Kitayama & Karasawa, 1997; Koole et al., 2001; Nuttin, 1985), Perceived roommate self-esteem (adapted from Lemay & Dudley, 2011), ECR (Brennan et al., 1998), NPI (Raskin & Terry, 1988), SCC Scale (Campbell et al., 1996), IOS scale (Aron, Aron, & Smollan, 1992), STARS (Spielmann, MacDonald, & Tackett, 2011), RISC scale (Cross, et al., 2000), Life Orientation Test (LOT; Scheier, Carver, & Bridges, 1994), and a measure of economic hardship. Then, every day for 14 days, participants were emailed a link to a secure website to access the daily diary survey where they recorded last night's general felt rejection, today's perceived rejection from the roommate, today's ego depletion, and today's negative mood (among other items not relevant to the current analyses).[11] Participants were allowed to complete the diary survey between the hours of 3:00 pm and 9:00 pm on each day of the daily diary portion of the study. These times were selected so that students were completing the survey between the end of their classes and before their evening's social activities (e.g., drinking). All measures and exclusions in study 3 are disclosed here and available in greater detail in the Online supplemental materials.[12]

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[11] Daily diaries included items assessing, in this order, last night's time spent socializing, felt acceptance, felt rejection, interpersonal conflict, drinking, sexual activity, stressfulness, hours of sleep, and Facebook usage, as well as today's state self-esteem, ego-depletion, mood, interpersonal conflict, felt rejection and acceptance, negative and positive relationship behaviors, Facebook usage, satisfaction with technology, and discrimination. See also online supplementary materials for detailed descriptions of each measure.

[12] Data from this study were also reported in Peterson, Giguere, and Sherman (2017). Findings on perceived roommate self-esteem, roommate rejection, and ego depletion were not reported in that published research.

9.3. Background measures

9.3.1. Self-esteem

As in studies 1 and 2, the 10-item Rosenberg (1965) Self-esteem Scale was used to assess participant self-esteem ($\alpha = 0.91$).

9.3.2. Perceived roommate self-esteem

As in study 1, an adapted version of the Rosenberg's (1965) Self-esteem Scale was used to measure perceptions of a roommate's self-esteem. Participants were told that this measure was "a global measure of how you think YOUR ROOMMATE views themselves." If participants identified having more than one roommate, they were asked to answer the questions in relation to the roommate with whom they are closest.

Participants were asked to indicate how strongly they agreed with 10 adapted statements (e.g., "My roommate feels that he/she is a person of worth, at least on an equal basis with others") on a 7-point scale (1 = *disagree very much*, 7 = *agree very much*; $\alpha = 0.91$).

9.4. Daily diary measures

9.4.1. Nightly felt rejection

Each day, participants rated their general feelings of rejection from the previous night (i.e., "Last night I felt rejected by others") on a 7-point scale (1 = *not at all rejected*, 7 = *completely rejected*).

9.4.2. Daily perceived roommate rejection

Each day, participants indicated on a on a 7-point scale from (1 = *not at all*, 7 = *very much*) their agreement with 4 statements assessing daily perceived rejection from the roommate they identified during the background portion of the study (e.g., "right now I feel accepted by my roommate," "right now my roommate accepts me as I am," "right now I feel rejected or hurt by my roommate," "right now my roommate doesn't understand me"). Positively worded items were reverse scored and summed together with the remaining items to create a single index of daily perceived roommate rejection ($\alpha = 0.89$).

9.4.3. Daily ego depletion

Each day participants completed an abbreviated version of the State Ego Depletion Scale (Ciarocco, Twenge, Muraven, & Tice, 2010) by indicating their agreement with three statements ("right now, my mind feels unfocused," "right now, my mental energy is running low," "right now, I am having a hard time controlling my urges") on a 7-point scale (1 = *Disagree very much*, 7 = *Agree very much*; $\alpha = 0.78$).

9.4.4. Daily negative affect

Four negative emotions (angry, sad, ashamed, nervous) were selected from Larsen and Diener's (1992) mood circumplex and Watson et al.'s (1988) Positive and Negative Affect Schedule. Participants rated the extent that they felt each emotion at that moment on a 7-point scale from 1 (*not at all*) to 7 (*very much*). These items were averaged together to create a composite indicator of daily negative mood ($\alpha = 0.80$).

10. Study 3 results

10.1. Descriptive statistics and correlations

Table 4 shows the descriptive statistics and correlations for the between-person and the aggregate (mean across 14 days) daily variables. Gender was inversely related to self-esteem and perceived roommate self-esteem, suggesting women reported lower levels of self-esteem and more negative perceptions of a roommate's self-esteem compared to men. Participant self-esteem was positively related to perceived roommate self-esteem, and both participant and perceived roommate self-esteem were negatively related to daily perceived roommate rejection, daily ego depletion, daily negative affect, and nightly felt-rejection. These latter correlations suggest that people

higher in self-esteem and people who perceive their roommates as higher in self-esteem report less rejection from their roommate, less mental exhaustion, less negative affect, and less nightly feelings of general rejection across the 14 days of the daily diary study. Finally, daily perceived roommate rejection was positively related to daily ego depletion, negative affect, and nightly felt rejection, indicating that participants who perceived more rejection from their roommates also reported more ego depletion and negative affect during the day and felt more general rejection at night across the daily diary portion of the study.

10.2. Multi-level regression analyses

The current data contain two levels of analysis (with repeated measurements of daily perceived rejection and daily ego depletion nested within participants). Therefore, we again used PROC MIXED within SAS v9.4 to conduct multi-level regression analyses. We examined the within-person intercept and slope coefficients of daily perceived roommate rejection predicting ego depletion (Level 1 variables). We then predicted variability in the within-person intercepts and slopes from the Level 2 predictor, perceived roommate self-esteem. To eliminate the effects of individual differences in the reporting of daily perceived roommate rejection, scores were person mean-centered by centering the variables around each participant's average rating of perceived roommate rejection across the 14 assessments. Participant self-esteem and perceived roommate self-esteem scores were grand mean-centered (i.e., centered around the sample average), and interaction terms were calculated by person or group mean-centering the predictors in advance and multiplying them together. Because controlling for negative affect and gender does not change the pattern of results, they were dropped from the final model. In addition, gender does not moderate the reported effects. Finally, because observations closer in time to one another may be more highly correlated than observations that are farther apart in time (Bolger, Davis, & Rafaeli, 2003; West & Hepworth, 1991), resulting in autocorrelations among observations, all models presented specify an autoregressive error structure.

10.3. Roommate self-esteem, daily roommate rejection, and daily ego depletion

We explored whether perceived roommate self-esteem moderated the strength of the within-person association between daily roommate rejection and ego depletion. As shown in Table 5, the multi-level regression analyses revealed that participant self-esteem was significantly and negatively related to ego depletion. The analysis also revealed a significant positive main effect of perceived roommate rejection, which was qualified by a significant Perceived Roommate Self-esteem × Daily Perceived Roommate Rejection interaction. Consistent with Studies 1 and 2, the Participant Self-esteem × Daily Perceived Roommate Rejection 2-way interaction was not significant (Table 5). In addition, participant self-esteem did not moderate the Perceived Roommate Self-esteem × Daily Perceived Roommate Rejection interaction ($b = 0.01$, $SE = 0.03$, 95% CI [-0.04, 0.06], $t = 0.26$, $p = .80$).

Simple slope tests (Aiken & West, 1991) were run to determine the nature of the Perceived Roommate Self-esteem × Daily Perceived Roommate Rejection interaction predicting ego depletion. Consistent with our hypotheses, participants who perceived their roommates as low in self-esteem reported greater ego depletion on days they experienced more (vs. less) rejection from their roommate ($b = 0.25$, $SE = 0.06$, 95% CI [0.14, 0.35], $t = 4.44$, $p < .0001$; see Fig. 2). However, participants who perceived their roommates as high in self-esteem did not differ in levels of ego depletion on days they experienced more or less rejection from that roommate ($b = 0.09$, $SE = 0.07$, 95% CI [-0.04, 0.22], $t = 1.32$, $p = .19$; Fig. 2). These results indicate that increased rejection from a roommate increases cognitive depletion only

Table 4
Descriptive statistics and correlations for the between-person and the aggregate daily variables.

	Variable	M	SD	1	2	3	4	5	6	7
1. Gender			–						
2. Participant SE	5.33	1.11*	−.13**	–					
3. Roommate SE	5.52	1.08	−.15**	.18**	–				
4. Daily roommate rejection	2.22	1.38	−0.02	−.15**	−.11**	–			
5. Daily ego-depletion	3.03	1.54	0.04	−.35**	−.09**	.19**	–		
6. Daily negative affect	2.17	1.20	0.08**	−.34**	−.16**	.31**	.49**	–	
7. Nightly felt rejection	1.93	1.48	−0.04	−.16**	−.09**	.22**	.25**	.31**	–

Note. $N = 115$. Gender was coded such as 0 = male, 1 = female; thus, positive correlations denote higher values for women relative to men. The Spearman correlation coefficient is reported for correlations with dichotomous variables.
* $p < .05$.
** $p < .01$.

for those participants who perceive their roommates as low in self-esteem.

10.4. Roommate self-esteem, daily roommate rejection, and nightly felt-rejection

Next, we predicted nightly felt-rejection (as reported next day) from the same predictors as above. Again, the 3-way interaction between participant self-esteem, perceived roommate self-esteem, and daily roommate rejection was not significant ($b = 0.01$, $SE = 0.04$, 95% CI [−0.08, 0.09], $t = 0.18$, $p = .86$). However, the analyses revealed a significant Perceived Roommate Self-esteem × Daily Perceived Roommate Rejection interaction, as well as a Participant Self-esteem × Daily Perceived Roommate Rejection interaction (see Table 5). Simple slope tests indicated that participants who perceived their roommates as low in self-esteem did not differ in nightly felt-rejection on days they experienced more or less rejection from that roommate ($b = −0.02$, $SE = 0.09$, 95% CI [−0.19, 0.15], $t = −0.22$, $p = .83$). However, participants who perceived their roommates as high in self-esteem reported more felt-rejection on nights they experienced more (vs. less) rejection from their roommate during the day ($b = 0.28$, $SE = 0.10$, 95% CI [0.08, 0.49], $t = 2.78$, $p = .005$; see Fig. 3). In other words, on days in which roommates were particularly rejecting, people with high and low self-esteem roommates did not differ in nightly felt rejection ($b = 0.01$, $SE = 0.09$, 95% CI [−0.17, 0.18], $t = 0.08$, $p = .34$), a finding that echoes those of studies 1 and 2. But on days in which roommates were less rejecting, only people with high self-esteem roommates showed a decrease in nightly felt-rejection ($b = −0.18$,
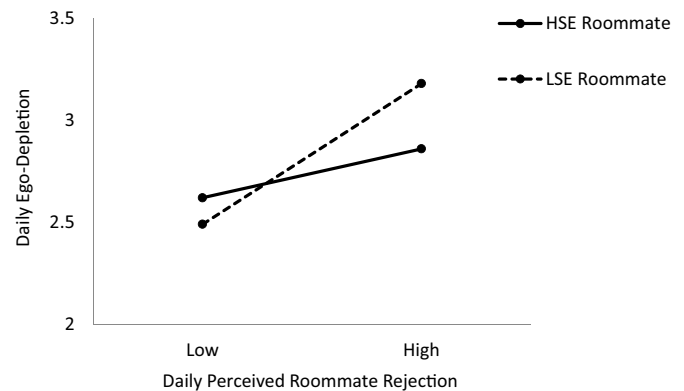
Fig. 2. Predicting daily reported ego depletion from the interaction between daily perceived roommate rejection and perceived roommate self-esteem (Study 3).

$SE = 0.09$, 95% CI [−0.36, −0.02], $t = 2.21$, $p = .03$).

Finally, we explored the Participant Self-esteem × Perceived Roommate Rejection interaction. Consistent with past research risk regulation research suggesting that people with low self-esteem are more vulnerable to perceptions of interpersonal rejection (e.g., Murray et al., 2002), simple slope tests revealed that people with low self-esteem felt more rejected on nights following days they perceived more (vs. less) roommate rejection ($b = 0.20$, $SE = 0.09$, 95% CI [0.02, 0.38], $t = 2.17$, $p = .03$). Conversely, nightly felt rejection was not significantly affected by roommate rejection during the day for people

Table 5
Multi-level regression results for perceived roommate self-esteem and daily perceived roommate rejection predicting daily ego depletion.

	Daily ego depletion (DV)					
	b	SE	t	p	95% CI	r
Intercept	2.78	0.10	26.75	.000	2.58, 2.99	
Participant self-esteem	−0.46	0.08	−5.61	.000	−0.63, −0.30	
Perceived roommate self-esteem	−0.04	0.08	−0.51	.61	−0.21, 0.12	
Daily perceived roommate rejection	0.16	0.05	3.39	.001	07, 0.25	
Participant Self-esteem × Daily Perceived Roommate Rejection	−0.06	0.04	−1.46	.14	−0.13, 0.02	
Perceived Roommate Self-esteem × Daily Perceived Roommate Rejection	−0.07	0.04	−1.98	.05	−0.14, −0.001	0.002

|	Nightly felt-rejection (DV)					
	b	SE	t	p	95% CI	r
Intercept	1.90	0.10	18.71	.000	1.70, 2.10	
Participant self-esteem	−0.22	0.08	−3.02	.003	−0.38, −0.08	
Perceived roommate self-esteem	0.09	0.08	−1.23	.22	−0.24, 0.08	
Daily perceived roommate rejection	0.12	0.07	1.65	.10	−0.02, 0.25	
Participant Self-esteem × Daily Perceived Roommate Rejection	−0.12	0.06	2.00	.05	−0.24, −0.002	0.04
Perceived Roommate Self-esteem × Daily Perceived Roommate Rejection	0.16	0.06	2.68	.01	0.04, 0.27	0.05
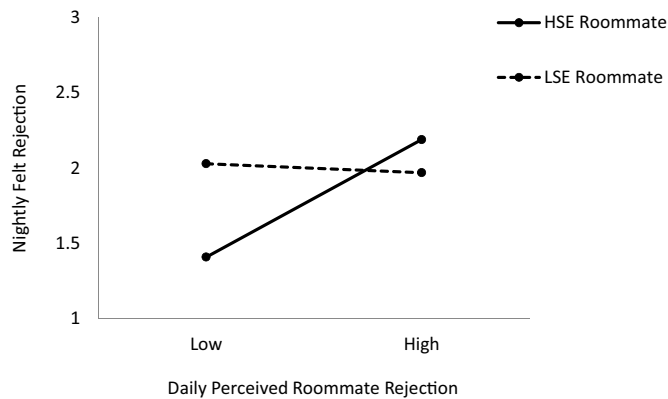
Fig. 3. Predicting nightly general rejection from the interaction between daily perceived roommate rejection and perceived roommate self-esteem (Study 3).

high in self-esteem ($b = -0.02$, $SE = 0.11$, 95% CI $[-0.22, 0.19]$, $t = -0.15$, $p = .88$).

11. Study 3 discussion

The results of study 3 revealed that on days in which a low self-esteem roommate was perceived as more rejecting than usual, participants reported higher levels of ego depletion. However, ego depletion did not differ on days of high (vs. low) roommate rejection among participants who perceived their roommate as high in self-esteem. Consistent with the notion that people suppress connectedness motivations in response to rejection from a low self-esteem partner (studies 1 and 2), study 3 provides preliminary evidence to suggest that this process may consume cognitive resources. Such an interpretation is consistent with our overall model, but should be treated with caution until future research can rule out alternative explanations for depletion, such as increased worry or rumination about the low self-esteem partner's feelings or future behavior. In addition, while we hypothesized that roommate self-esteem would not moderate the relationship between daily roommate rejection and nightly reports of felt-rejection, analyses did not fully support this prediction. That is, high levels of rejection from a roommate predicted similar levels of nightly felt-rejection regardless of the roommate's perceived level of self-esteem. However, when roommates were less rejecting during the day, only those people who perceived their roommates as having high self-esteem reported a reduction in nightly felt-rejection. This latter result suggests that, while rejection from high and low self-esteem roommates is equally upsetting, acceptance from a high (but not low) self-esteem roommate has benefits for more general feelings of inclusion, a finding we return to in the General discussion section.

12. General discussion

Given the interdependent nature of relationships, there is a growing body of research revealing the importance of partner qualities in predicting actor outcomes (e.g., Gomillion et al., 2014; Lemay & Dudley, 2011; MacGregor et al., 2013). We extend this literature by providing some of the first evidence that actors are more connection-inhibiting and depleted following rejection from a low (vs. high) self-esteem partner. In study 1, rejection from a low self-esteem partner reduced the accessibility of connection-related thoughts in memory. Similarly, study 2 revealed that this effect extends to the behavioral expression of connection-inhibiting behavior. That is, people with low self-esteem partners appeared to engage in more closed off and rigid body language during a dyadic conflict interaction compared to their counterparts with high self-esteem partners. Study 3 extended the interactive effect of partner self-esteem and partner rejection to ego-depletion, revealing

that on days people felt more (vs. less) rejected by a low self-esteem roommate, they reported feeling more mentally exhausted – a finding consistent with the notion that suppressing goals for connection should demand cognitive resources (Murray et al., 2008).

Importantly, these effects emerged despite evidence across all three studies that rejection from a low self-esteem partner is no more painful or negative than rejection from a high self-esteem partner. That is, both observer-ratings (study 1) and participant self-reports (studies 2 & 3) indicated that people's experiences were equally rejecting and hurtful, regardless of whether the offending partner was perceived to (or did) have low levels of self-worth. Such findings may be indicative of a forecasting error, such that people misjudge the pain associated with rejection from a low self-esteem partner, and suppress connection accordingly. It also seems possible that people are not misjudging the pain of rejection, but rather making assumptions about whether post-rejection connection with a low self-esteem partner will bring additional pain or frustration.

Both interpretations appear consistent with the idea that people use perceptions of low self-esteem as a heuristic in deciding whether that person has other negative qualities or behavioral tendencies (e.g., Zeigler-Hill & Myers, 2009; Zeigler-Hill & Myers, 2011). They are also reminiscent of MacGregor et al. (2013) work suggesting that people (erroneously) believe that low self-esteem partners will be less responsive to capitalization attempts. In the current research, it seems likely that people rely on implicit theories of self-esteem to guide connection-inhibiting responses to rejection from a low self-esteem partner, regardless of whether those theories are accurate or how they were acquired. In fact, study 2 revealed that how long people had dated their low self-esteem romantic partner did not influence the pattern of results observed. These findings indicate that the underlying process of suppressing motivations for connection is either not learned over the course of the relationship with a low self-esteem partner, or is learned within the first few months of that relationship.

Nevertheless, study 2 revealed that low partner self-worth was related to increased relationship issues 6 months later, suggesting that the negative effects of navigating interdependence dilemmas with a low self-esteem partner may accumulate over time. Relatedly, the results of study 3 suggested that, while rejection from a low self-esteem roommate is not more painful, acceptance may be less rewarding. That is, when roommates were more accepting during the day, only those people who perceived their roommates as high in self-esteem reported a reduction in nightly felt-rejection. Given that the need to prioritize self-protection over connection should be most evident in those scenarios where rejection is more painful than acceptance is rewarding (Murray et al., 2008), the results of study 3 may suggest that people with low self-esteem partners suppress motivations for connection simply because such goal pursuit would be fruitless. That is, even if low self-esteem partners were responsive to actors' needs, connectedness goals may not be fully satiated. While the current research did not directly test this possibility, it provides an important avenue for future research.

The current research also builds on evidence that perceptions of partner insecurity are at least moderately related to actual partner insecurity (Lemay & Dudley, 2011; MacGregor et al., 2013). In line with this, the current study found a conceptually similar pattern of results regardless of whether we assessed perceived partner self-esteem (studies 1 & 3) or actual partner self-esteem (study 2), suggesting that people detect elements of a partner's actual self-worth and use that information to guide responses to threats within the relationship. Interestingly, the effect of partner self-esteem on connection-related thoughts and behavior was independent of, and not moderated by, participants' own levels of self-esteem. While this finding is consistent with other research (e.g., Lemay & Dudley, 2011; MacGregor et al., 2013; MacGregor & Holmes, 2011; Robinson & Cameron, 2012), it also highlights the need to explore how partner self-esteem influences risk regulation processes in ways that differ from actor self-esteem. In particular, Murray et al. (2008) report that while the activation of

connectedness goals do not depend on actor self-esteem, the subsequent activation of self-protection goals do. Conversely, we find that connectedness goals are influenced by partner self-esteem such that when actors feel vulnerable at the hands of a low self-esteem partner they exhibit the cognitive and behavioral suppression of connection. The results of the current research, therefore, underscore the importance of considering actor and partner self-worth as an important and independent predictors of risk regulation processes.

12.1. Limitations and future directions

Although the findings provide good support for our primary contention that partner self-worth informs risk regulation processes, there are a few issues to be considered. First, post hoc analyses in study 2 revealed that partner self-esteem did not predict the connection-activation behavioral composite. One possible explanation for this null effect is that the immediacy of risk inherent in romantic conflict heightened the tension between connectedness and self-protection goals even among people with high self-esteem partners. Indeed, not only do participants in study 2 discuss a heated and unresolved issue, our self-report data reveals that actors with high self-esteem partners felt just as interpersonally vulnerable as actors with low self-esteem partners. As a result, participants did not appear particularly loving and affectionate during the discussion, regardless of partner self-worth. Interestingly, study 1 reveals a somewhat similar pattern among actors with high self-esteem partners. Actors with high self-esteem partners exhibit only a small and non-significant increase in accessibility to connection-related thoughts in the relationship rejection (vs. control) condition (see Fig. 1), which may be indicative of the ambivalence associated with approaching a high self-esteem partner who is generally positively regarded, but who is currently the source of rejection concerns. Thus, actors with high self-esteem partners do not appear to suppress connectedness goals following rejection, but they may not actively pursue such goals either. On the other hand, actors with low self-esteem partners respond to rejection by inhibiting the accessibility of connection-related themes in memory (study 1), and this inhibition of connection appears evident in conflict behaviors that minimize interdependence (study 2).

Second, while study 1 used a quasi-experimental design, the results of studies 2 and 3 are correlational. In study 2 we cannot know whether partner self-esteem caused people to engage in more connection-inhibiting behavior during the conflict interaction. Even though the pattern of results mirrors those of study 1, it is possible that other relationship variables or events influenced both partner reports of self-esteem and actor conflict behaviors. Similarly, in study 3 it is possible that other variables not measured in the current study influenced reports of daily rejection, daily ego depletion, and nightly felt acceptance. In particular, today's daily roommate rejection and today's ego depletion were measured in the same daily survey, making it is somewhat more difficult to determine the causal relationship of these effects. However, given experimental research showing that interpersonal threat predicts self-regulation failure (e.g., Baumeister, DeWall, Ciarocco, & Twenge, 2005; Inzlicht, McKay, & Aronson, 2006), it seems more likely that changes in perceived roommate rejection predicted changes in ego-depletion. Nevertheless, future experimental research that manipulates both interpersonal threat and partner self-esteem would be helpful to clarify some of these causal relationships.

Third, we have also suggested that rejection from a low self-esteem partner is cognitively taxing, but our measure of ego-depletion relies on participants' self-reports. It will be important for future research to test whether the effects extend to other standard measures of ego-depletion, such as a Stroop task (Gailliot et al., 2007; Inzlicht et al., 2006). Relatedly, because we did not assess the cognitive accessibility of concepts related to self-protection (e.g., *retreat, protect, defense,* etc.) following rejection, nor did we implicitly prime connection, we cannot assess whether partner self-esteem influenced the activation of self-protection

goals in ways that mirror the effects of actor self-esteem on such goals (see Murray et al., 2008). Finally, although we argue that people respond to rejection from low self-esteem partners by suppressing connectedness goals (studies 1 and 2), which depletes cognitive resources (study 3), future research is needed to test the full model in a single study. It is our hope that the ideas proposed by the current research invite additional investigation on the role of partner self-esteem in driving actors' regulation of interpersonal risk.

12.2. Concluding thoughts

The current research offers the first evidence that rejection from a low (vs. high) self-esteem partner inhibits connection-related thoughts, elicits connection-minimizing behaviors, and decreases mental energy in actors. That these effects are independent of and not moderated by actor's own levels of self-worth provides additional evidence that partner qualities are important predictors of actor's relationship outcomes. Indeed, coupled with other work suggesting partner (rather than actor) self-worth may constrain beneficial relationship processes (MacGregor et al., 2013; MacGregor & Holmes, 2011), the current work challenges traditional assumptions about the importance of self-love for actor's own relationship regulation. Instead, how *partners* feel about their worthiness of love and acceptance may be the ticket to understanding *actor's* responses to relationship threat.

Appendix A. Supplementary data

Supplementary data to this article can be found online at https://doi.org/10.1016/j.jesp.2018.09.006.

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