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Publication Date

2010-04-14

Peer reviewed

Overconfidence and the attainment of status in groups

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Abstract

Individuals who occupy positions of high status and authority tend to engage in overconfidence more than others. While prior work suggests that this excessive overconfidence is partly a product of their elevated status, the current research tested whether overconfidence can also lead to status: Are individuals with overly positive self-perceptions of ability more likely to attain status in the first place? Three studies of task-focused dyads and groups involving laboratory and field settings found support for this hypothesis. Further, the relation between overconfidence and status was consistently mediated by peer-perceived competence: overconfident individuals attained status because others inaccurately perceived them as more competent. An experimental manipulation established the causal priority of overconfidence, and a longitudinal study found the effects of overconfidence endured over time. This research contributes to our understanding of status distribution systems in groups and organizations, the consequences of overconfidence, and the psychology of status.

Keywords: overconfidence, self-perception, status, power, influence, hierarchy, groups, teams, competence, person perception

Overconfidence and the attainment of status in groups

Although people of all kinds engage in overconfidence (Alicke & Govorun, 2005), studies suggest that individuals with high status are particularly likely to possess an overly rosy view of their competence. That is, even more than the average person, individuals who occupy positions of elevated status and authority are especially prone to overestimate their superiority vis-à-vis others (e.g., Harvey, 1953; Pfeffer, Cialdini, Hanna, & Knopoff, 1998; Sachdev & Bourhis, 1987; Stolte, 1978).

Prior research suggests social status and overconfidence are linked in part because the possession of higher status leads to overconfidence. When people occupy high-status roles, their traits and characteristics tend to be viewed in overly positive ways (Berger, Rosenholtz, & Zelditch, 1980; Fiske, Cuddy, Glick, & Xu, 2002; Jost & Banaji, 1994; Lee & Ofshe, 1981; Lord, 1985; Ridgeway, Boyle, Kuipers, & Robinson, 1998), and they receive disproportionately positive feedback (Hecht & LaFrance, 1998; Keltner, Young, Heerey, Oemig, & Monarch, 1998; Ridgeway et al., 1998), which is likely to inflate their self-perceptions.

But is the link between overconfidence and status also due to the effects of overconfidence? Are overconfident individuals more likely to attain higher status in the first place? If so, this would suggest a more comprehensive approach to remedying overconfidence among individuals in positions of status and leadership in organizations. Excessive overconfidence among high status actors represents a significant problem for groups and organizations. Individuals with higher standing in a hierarchy by definition have disproportionate control over collective decisions and outcomes (Bales, Strodtbeck, Mills, & Rosenborough, 1951; Berger, Cohen, & Zelditch, 1972). Yet overconfidence is

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associated with many deleterious patterns of thought and decision-making, such as the inability to perceive one's weaknesses (Dunning, Heath, & Suls, 2004; Gino & Moore, 2007), biased perceptions of one's competitive advantage (Moore & Kim, 2003; Neale & Bazerman, 1985), and engaging in risky ventures with a high probability of failure (Camerer & Lovallo, 1999; Hayward & Hambrick 1997).

While proposed solutions for leader overconfidence typically emphasize structural remedies, such as greater accountability or stronger checks and balances (e.g., Hayward & Hambrick, 1997; Malmendier & Tate, 2005), it is possible that selection and promotion practices could be addressed as well. If overconfident individuals are systematically more likely to attain higher status, organizations might need to examine how they evaluate and select individuals for positions of leadership and authority.

In the current research, we thus tested whether overconfident individuals attain higher status in groups, as compared to individuals with accurate self-perceptions of ability. We conducted three studies of informal status hierarchies in small, task-focused groups (Bales et al., 1951; Berger et al., 1980) – a methodological approach that allowed us to objectively measure performance and thus distinguish justifiably high self-confidence from overconfidence. This approach also allowed us to examine one likely mediating mechanism for this effect: peer-perceived competence. Status theory points to group perceptions of task competence as a primary and consistent basis of status (e.g., Berger et al., 1972). We tested whether overconfident individuals attain higher status because they come across as more task competent to others.

Defining and conceptualizing status in face-to-face groups

A long tradition of research has focused on status hierarchies in task groups (e.g., Bales et al., 1951; Berger et al., 1972; Blau, 1964; Ridgeway, 1987; Thibaut & Kelley, 1959). Sometimes called "power-prestige orders," these hierarchies involve differences among group members' respect and admiration, influence over group processes and decisions, leadership behavior, and contributions and participation. Thus, although these separate dimensions may be conceptually distinct from each other – for example respect and admiration can be distinguished from power (Magee & Galinsky, 2008) – they are indistinguishable empirically in task dyads and groups (Bales et al., 1951; Heinicke & Bales, 1953; Berger et al., 1972). Individuals who have higher respect in these settings tend to also have more power or influence, exhibit more leadership behavior, and contribute more. Accordingly, we examined the status hierarchies that emerge in task dyads and groups by focusing on individuals' respect, influence, leadership, and contributions.

Research has also shown that task groups strive to base their status hierarchies on differences in merit. Status is a function of the group's collective judgments and decisions about which individuals deserve social status (Berger et al., 1972; Goldhamer & Shils, 1939; Eibl-Eibesfeldt, 1989; Emerson, 1962). According to this perspective, groups develop an implicit consensus as to which individual characteristics will help the group succeed, and allocate high and low status positions according to whether the individual possesses relatively more of those valued characteristics. Individuals who seem to possess more valued characteristics are afforded high status positions in the group, whereas individuals who seem to possess fewer valued characteristics are allocated low status positions.

Although the characteristics that help a group succeed – and thus lead to higher status – are multifaceted and can vary from group to group, a primary and consistent predictor of status in task groups is task-related competence (e.g., Berger et al., 1972; Driskell & Mullen, 1990; Lord, De Vader, & Alliger, 1986). Individuals' status in task groups depends strongly on whether they are perceived to possess superior abilities related to the group's tasks. Regarding the less competent, Van Vugt (2006) wrote in a recent review that "Low task ability disqualifies an individual almost immediately from leadership status" (p. 362). Thus, much of the theorizing and research on status attainment in task groups has focused on the effects of perceived task competence (for a review, see Driskell & Mullen, 1990).

The problem of detecting competence in others

Basing status hierarchies partly on differences in competence also introduces a real challenge for groups, however. Each individual's true ability resides within him or her and is hidden from observers, making it difficult for group members to accurately gauge each other's actual competence levels (e.g., Anderson & Kilduff, 2009; Elsbach & Kramer, 2003; Moore & Healy, 2008). People are often forced to assess others' competence on superficial cues such as their nonverbal behavior, attire, style of speaking, or physical characteristics (e.g., Anderson & Kilduff, 2009; Berger et al., 1972; Carli, LaFleur, & Loeber, 1995; Driskell, Olmstead, & Salas, 1993; Elsbach & Kramer, 2003; Imada & Hakel, 1977; Reynolds & Gifford, 2001; Ridgeway, 1987). Therefore, peerratings of competence often exhibit low levels of accuracy. For example, peer-ratings of cognitive ability tend to only modestly correlate with individuals' scores on objective

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tests, even when peers are well acquainted with the individual (e.g., Borkenau & Liebler, 1993).

As a result of the ambiguity inherent in many competence judgments, in many groups status and competence are not closely intertwined. A long line of research on Status Characteristics Theory has shown that task groups often base status on age, ethnicity, physical attractiveness, and gender, even if these characteristics are unrelated to competence (Berger et al., 1972; Ridgeway & Berger, 1986). In a recent study, Anderson & Kilduff (2009) found that individuals higher in the personality trait dominance attained higher status and influence in task groups, even though they were no more competent than less dominant individuals; further, dominant individuals attained status because fellow group members mistakenly perceived them to be more task competent. As we outline below, in conditions where there is any ambiguity in competence and performance (which is common in organizations), overconfident individuals will be perceived as more competent by others, and should attain higher levels of status, compared to individuals with more accurate self-perceptions of competence.

Defining and conceptualizing overconfidence

The consequences of positive self-perceptions have received a great deal of theoretical and empirical attention (for reviews, see Kwan, John, Kenny, Bond, & Robins, 2004; Moore & Healy, 2008; Taylor, Lerner, Sherman, Sage, & McDowell, 2003). In general, there are three major ways in which scholars have operationalized overly positive self-perceptions. Researchers in the *positive illusions* tradition have typically compared individuals' self-perceptions to their perceptions of others.

Individuals who believe they are better than others are considered to possess "overly"

positive" views of themselves (e.g., Bonanno, Field, Kovacevic, Kaltman, , 2002; Taylor & Brown, 1988; Taylor et al., 2003). Most of that research has found that positive illusions about the self have beneficial interpersonal consequences (for a review, see Kwan et al., 2004). However, those studies have not often distinguished inaccurate, overly positive self-perceptions from justifiably positive self-perceptions (cf. Kwan et al., 2004; Taylor et al., 2003). People who believe they are better than others might in fact be better than others. Further, those studies have not focused on status as a potential outcome of overly positive self-perceptions.

Research in the *self-enhancement* tradition has typically compared individuals' self-perceptions to others' perceptions of them. Individuals whose self-perceptions are loftier than how others' perceive them are considered to possess overly positive self-views (e.g., Colvin et al., 1995; John & Robins, 1994; Paulhus, 1998; Robins & Beer, 2001). Most of that research has found negative interpersonal consequences of self-enhancement. For example, individuals who believed they had higher status than others believed they had were more disliked and ostracized (Anderson, Srivastava, Beer, Spataro, & Chatman, , 2006; Anderson, Ames, & Gosling, 2008).

Finally, research in the *overconfidence* tradition has typically compared individuals' self-perceptions to objective, operational criteria such as task performance and test scores (for a review, see Moore & Healy, 2008). Individuals who believe their abilities to rank in the 90th percentile even though they actually rank in the 50th, for example, are considered to have overly positive self-perceptions. Arguably, this approach comes the closest to measuring whether individuals believe their skills to be better than they actually are – rather than, say, better than others' perceptions of them (Paulhus,

Harms, Bruce, & Lysy, 2003). However, studies of overconfidence have focused heavily on consequences unrelated to interpersonal outcomes, such as mistakes in decision-making (Camerer & Lovallo 1999; Malmendier & Tate 2005; Odean, 1998; Odean 1999). No work has examined the effects of overconfidence on status.

We aimed to test whether individuals who believe they are more competent than they actually are will attain higher status in task groups, and thus we focused on overconfidence. Status in task dyads and groups is contextually defined, based on individuals' perceived abilities relative to other group members (Berger et al., 1972). Therefore, we focused on *overplacement*, which involves overestimating one's rank in ability relative to others (Larrick, Burson, & Soll, 2007; Moore & Healy, 2008). Overplacement occurs, for example, when individuals believe themselves to be the highest performing person among their classmates when in fact they perform in the middle of the pack.

In this sense, measures of overplacement are similar to measures of overly positive self-perceptions used in the positive illusions literature (e.g., Taylor & Brown, 1988), which focused on whether individuals believe that they are better than others. However, measures of overplacement go further and test the validity of these positive self-perceptions, by assessing whether individuals actually rank higher than others in their relative abilities.

The effects of overconfidence on status

Why would overconfident individuals attain higher status than individuals with accurate self-perceptions of ability? As noted above, members of task groups use superficial cues to discern each other's competence levels. In particular, groups often

focus on nonverbal cues that signal competence, such as whether the person appears more confident in his or her opinions, exhibits more comfort with the task, speaks in a louder voice, and used more emphatic gestures when making his or her points (Anderson & Kilduff, 2009; Carli et al., 1995; Driskell et al., 1993; Imada & Hakel, 1977; Reynolds & Gifford, 2001; Ridgeway, 1987).

Research suggests that overconfident individuals display more of these "competence cues." Self-perceptions are a powerful driver of social behavior (e.g., Swann, 2005), and self-perceived abilities can determine one's behavior above and beyond one's actual abilities (Anderson & Kilduff, 2009; Bugental & Lewis, 1999; Camerer & Lovallo, 1999; Campbell, Goodie, & Foster, 2004; McNulty & Swann, 1994). Thus, when individuals see themselves as highly competent – even if they lack competence – they are likely to exhibit more behaviors that signal competence to others. In turn, overly positive self-perceptions of ability should lead individuals to be seen as more competent by other group members, and to be afforded higher status. We thus predict:

Hypothesis 1. Overconfident individuals will achieve higher status than individuals with accurate self-perceptions of competence.

Hypothesis 2. Overconfident individuals will be perceived as more competent by others than individuals with accurate self-perceptions of competence.

Hypothesis 3. The effects of overconfidence on status will be mediated by peer-ratings of competence.

While prior research has found some indirect support for these hypotheses, it does not provide a sufficient test. Much research has shown self-confidence to predict status

(for reviews, see Edinger & Patterson, 1983; House, 1988; Stogdill, 1948; Van Vugt, 2006). However, self-confidence is an expectation for success, or a belief that putting effort toward a task will result in its accomplishment (Instone, Major, & Bunker, 1983; Mowday, 1979). Highly self-confident individuals are sometimes justified in their lofty self-assessment (cf. Kwan et al., 2004). Therefore, the correlations obtained between confidence and status might have been driven by actual ability, in that highly competent people might have reported (justifiably) high levels of confidence and attained higher levels of status. In contrast, overconfident individuals have inaccurate and overly positive self-perceptions of ability by definition. To more directly test whether overconfidence leads to status, it is necessary to distinguish self-perceived ability from actual ability.

Studies have also found that strategic self-presentation such as boasting can lead to positive peer-perceptions of competence (Jones & Shrauger, 1970; Powers & Zuroff, 1988). However, self-presentation is the use of social behavior to establish, maintain, or refine an image of oneself in the minds of others (Baumeister, 1982; Goffman, 1959). In contrast, overconfidence concerns one's own perception about oneself. Moreover, self-presentation can be deliberately and purposefully enacted (Baumeister, 1982). In contrast, we are focused on overconfidence as a genuine, unintentional error in overestimating one's ability. For example, we are interested in individuals who genuinely believe they rank in the 90th percentile in ability even when they actually rank lower (for more on the distinction between genuine vs. deliberately reported self-favoring biases, see Hoorens, 1995).

Overview of studies

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We tested our hypotheses in three studies. In Study 1, we examined dyads in the laboratory that worked on a joint task, which allowed for the objective measurement of ability and thus overconfidence. In Study 2, we again examined dyads in the laboratory using the same task, this time experimentally creating differences in individuals' overconfidence levels to establish the causal effects of overconfidence. In Study 3, we tested whether the effects of overconfidence endure over time by longitudinally examining teams that worked together for 15 weeks.

Along an exploratory vein we also examined a number of possible moderators of our hypothesized effects. First, research on the backlash effect has shown that women who behave assertively are not viewed as favorably as men who display the same assertive behavior (e.g., Eagly & Karau, 2002; Heilman, Wallen, Fuchs, & Tamkins, 2004; Ridgeway, 1981; Rudman & Glick, 1999). If overconfidence manifests in greater assertiveness, it is thus possible that overconfidence might help men attain higher status more than women. Second, we explored whether the effects of overconfidence depend on individuals' actual competence levels. Specifically, individuals might need to possess at least some moderate level of ability for overconfidence to have any status benefit; in contrast, individuals who are totally incompetent might not appear more competent regardless of their self-perceptions. Third, we explored whether the effects of overconfidence depend on others' actual competence levels. Research by Dunning and colleagues (Dunning, Johnson, Ehrlinger, & Kruger, 2003; Kruger & Dunning, 1999) has shown that more competent individuals have the meta-cognitive tools to perceive their own competence more accurately. It is possible that these meta-cognitive tools also help individuals perceive others' competence more accurately as well. If so, overconfidence

might have less of an impact in groups with highly competent fellow group members, because those group members can better discern overconfidence from justifiably high confidence.

The current research makes a number of important contributions to the research literature. First, we contribute to the literature on status organizing processes (e.g., Berger et al., 1972; Ridgeway, 1985), which has sought to understand flaws in the processes by which groups sort their members into high- and low-status positions. While that research has focused on how demographic characteristics such as age, ethnicity, and sex can affect and distort status organizing processes, we examined how "psychological" variables such as overconfidence can play a role as well. Second, the current research contributes to the overconfidence literature by focusing on possible the interpersonal or social benefits of overconfidence. In contrast, much of the research on overconfidence has focused on intra-individual outcomes (such as decision-making outcomes; see Moore & Healy, 2008). Third, these studies speak to the question of the origins of overconfidence. In explaining why overconfidence is so pervasive in judgment and decision-making, theorists have focused on limitations in human cognition (Miller & Ross, 1975), or the psychological benefits that overconfidence provides, such as higher self-esteem (Alicke, 1985). An additional possibility that has received less attention, however, is that people might tend to engage in overconfidence because of the social benefits it provides. Although we do not examine the motivational mechanisms that underlie overconfidence, the current studies provide some of the first empirical tests of whether overconfidence indeed provides social benefits.

Study 1

Based on prior research (e.g., Aronson & Carlsmith, 1962; Mussweiler, Gabriel, & Bodenhausen, 2000), participants engaged in a person-perception task in which they judged individual targets' personality traits from photographs. As much research has shown, person-perception tasks allow for the unambiguous measure of ability and its differentiation from self-perceived ability (Ames & Kammrath, 2004; Bernieri, Zuckerman, Koestner, & Rosenthal, 1994; Ickes, 1993; Levenson & Ruef, 1992; Realo et al., 2003; Swann & Gill, 1997). Further, person perception is an important social skill and component of career success (Gilbert, 1998; Cote & Miners, 2006).

We first measured overconfidence (specifically overplacement) by having participants individually judge a set of targets' personality traits and estimate their performance relative to other students. We compared participants' self-perceived abilities relative to others to their actual abilities relative to others. Next, we randomly paired participants into dyads where they judged a set of targets' personality traits together.

After the dyads had judged all targets, we separated them and had them privately rate each other's task abilities and status in the dyad. We predicted that overconfident participants (as measured in the initial individual task) would be perceived as more competent by their partner in the dyadic task, and would consequently be afforded higher status, as compared to participants with accurate self-perceptions of ability.

Method

Participants. Participants were 104 undergraduate students at a West Coast university (40.6 percent men and 59.4 percent women), who were divided into 52 dyads. They received partial fulfillment of course credit for participating. The participants were 22 years old on average (SD = 2.8); 3 percent were African-American, 71 percent Asian-

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American, 13 percent Caucasian, 4 percent Hispanic/Latino, and 9 percent who reported "other." Two to six participants were scheduled for each laboratory session and were assigned into dyads.

Procedure. All sessions were conducted in the laboratory. There were three phases to each laboratory session. In the first phase, the *overconfidence measurement*, participants were seated at their own individual workstation to work on a "social perception task." To increase participants' motivation, we told them that the task assessed social intelligence, which is critical to their career success (see Aronson & Carlsmith, 1962). Participants were presented, via computer, still images of 10 target individuals.¹ Participants rated each target's personality traits on 10 items from the Ten Item Personality Inventory (Gosling, Rentfrow, & Swann, 2003). After rating each target, participants estimated their own performance in accurately judging that target, relative to other students. As outlined below, we measured participants' overconfidence (specifically overplacement) by comparing their estimates of their own percentile rank in performance relative to other students to their actual percentile rank in performance relative to other students. (Participants were never told their actual performance percentile.)

In the second phase of the study, the *dyadic task*, participants were randomly paired into dyads and completed the "social perception task" together. Each dyad was asked to reach consensus on their judgments of five target individual targets' personality traits. We only paired participants who were unacquainted with each other.

In the third phase of the study, we separated dyad partners so that they could complete various *peer-ratings* privately. In this phase participants rated their partner's task abilities as well as status in the dyad.

Overconfidence measure. During the individual task in the first phase of the study, after participants individually rated each target, they were asked to estimate their percentile rank relative to the other students at their university (where 90th percentile meant their answers were near the top ranking; see Ames & Kammrath, 2004). They were told that each answer was considered accurate if it was within .5 above or below the target's true score (see Swann & Gill, 1997). Their estimates of their percentile rank in abilities were reliable across the 10 targets they rated (α = .94). Therefore, some participants reliably perceived themselves as higher performing than others. These estimates of percentile rank were combined to form an overall measure of self-perceived task competence rank (M = 58.22, SD = 13.99).

We scored participants' actual accuracy in the task using the method described to them. The average number of items answered correctly was $16.87 \ (SD = 5.66)$. Participants showed reliability in their performance relative to others across the 10 target individuals, alpha = .67, indicating that some participants were reliably higher performing than others. We thus combined their accuracy scores across the targets to form an overall index of actual competence. We then transformed their competence scores into percentile rankings, which reflected where they actually ranked in performance relative to other subjects. This allowed us to measure *overplacement* by comparing their self-perceived competence ranking relative to other students, to their actual competence ranking relative to other students.

Given the problems inherent in using difference scores (Edwards, 1994), we measured overconfidence with a regression residual technique (Bonanno et al., 2002; John & Robins, 1994; Paulhus, 1998). Specifically, we regressed participants' self-perceived task competence percentile rank on their actual competence percentile rank, and then retained the standardized residual. The residual score represents the variance in self-perceived competence ranking after the variance predicted by actual competence ranking has been removed.³

Partner-rated task competence measure. In the peer-ratings phase, participants first estimated their partner's competence on the task using the same percentile-rank scale they used to assess their own ability. To increase reliability, participants also rated their partner using three items from the Mind-Reading Belief Scale (Realo et al., 2003): "A stranger's character is revealed to my partner at first sight," "It is hard for my partner to tell a person's thoughts by their looks," and "I do not think my partner is good at knowing human nature / judging people." These three items were rated on a scale from 1 ("Disagree strongly") to 7 ("Agree strongly"). After standardizing all four items and reverse-scoring the latter two, they correlated together ($\alpha = .73$) and were combined into a measure of partner-rated task competence, M = .00, SD = .74.

Status measure. Partners then rated each other's status in the dyad. Previous research (e.g., Anderson & Kilduff, 2009; Bales et al., 1951; Cohen & Zhou, 1991), and theoretical conceptions of status (e.g., Berger et al., 1972) have identified status in groups as involving respect, influence, leadership, and contributions. Therefore, on four items, dyad partners rated each other on how much their partner earned their respect and admiration, had influence over the decisions, led the decision-making process, and

contributed to the decisions. Each of these four items was rated on a scale from 1 ("Disagree strongly") to 7 ("Agree strongly"). These four items correlated together ($\alpha =$.71) and were thus combined into one measure of status, M = 4.36, SD = .83.

Results and Discussion

Data collected in dyads can violate assumptions of independence. Therefore, we tested our hypotheses using a statistical technique outlined by Gonzalez and Griffin (1997), which involves calculating the correlation between the variables and translating it into a z-score that accounts for the dependence in the data.

Overconfidence predicted status in the dyad, r(101) = .21 (z = 2.14, p < .05). Therefore, in support of Hypothesis 1, overconfident individuals achieved more status in the dyad than individuals with accurate self-perceptions of ability.

Overconfidence also predicted peer-ratings of competence, r(101) = .42 (z = 4.29, p < .01). Therefore, in support of Hypothesis 2, overconfident individuals were perceived by their partner as more competent than were individuals with accurate self-perceptions of ability. To illustrate the magnitude of this effect in a more intuitive way, we examined the relation between overconfidence and partners' ratings on the percentile rank measure of competence only. The regression coefficient was B = .36, SE = .09 (p < .01), suggesting that for every percentile rank in which individuals overestimated their competence relative to others, they received more than a third of a percentile rank boost in their partner's perception of their competence. Stated otherwise, if individuals overestimated their percentile rank by three percentile points, their partner viewed them as scoring more than a full percentile point higher.

We next examined whether the relation between overconfidence and status was mediated by partners' ratings of competence. This mediation effect is illustrated in Figure 1. Controlling for overconfidence, partners' ratings of competence predicted participants' status, r(101) = .43 (z = 4.47, p < .01), whereas the relation between overconfidence and status was reduced almost to zero (.02) after controlling for partner-rated competence (z = .22, n.s.). This suggests that the relation between overconfidence and status in the dyad was fully mediated by partner-ratings of competence, supporting Hypothesis 3.

Insert figure 1 about here

Finally, along an exploratory vein, we examined a number of possible moderators of the effects of overconfidence. For example it was possible that overconfidence boosted individuals' peer-rated competence (and status) only when individuals' possessed at least some moderate level of actual competence, when their partner was less competent (and less able to discern individuals' actual ability), or that the effect would be stronger for men than women. We did not find any evidence for any moderation effects, however. In fact none of the significance levels of the interaction terms were below p = .50.

In sum, the findings in Study 1 suggested that overconfident individuals achieved higher status in collaborative tasks than individuals with accurate perceptions of their abilities. Further, the findings suggested that this relation was mediated by peer-perceptions of competence: overconfident individuals attained higher status because their partner perceived them as more competent.

Study 2

To test whether overconfidence leads to higher status, it is important to also establish the causal priority of overconfidence through experimental methods. In Study 2

we thus manipulated overconfidence by providing randomly selected participants with information that would allow them to believe that they were more competent than they actually were. We reasoned that the most direct way of doing so would be to provide them with false, overly positive feedback about their task abilities. Therefore, in Study 2 we used very similar methods to those in Study 1, but this time gave randomly selected participants overly positive performance feedback and gave others accurate performance feedback.

Method

Participants. Participants were 80 undergraduate students (47.5 percent men and 52.5 percent women) at a West Coast university who received course credit. The participants were 21 years old on average (SD = 1.0); 70 percent were Asian-American, 20 percent Caucasian, and 10 percent who reported "other."

Procedure and design. The study design was very similar to that in Study 1. The laboratory sessions again involved three phases: an individual person perception task in which participants individually rated 10 target individuals' personality traits (the same targets used in Study 1), a dyadic person perception task in which pairs of participants rated five targets' personality traits together (the same targets used in Study 1), and a set of peer-ratings in which participants rated their partner's task competence and then status in the dyad.

The critical difference was an experimental manipulation of overconfidence administered halfway through the individual task in the first phase. After judging the first five targets, randomly selected participants received overly positive feedback about their performance up to that point (*overconfident* condition), whereas others received accurate

performance feedback (*accurate* condition). We administered this feedback halfway through the individual task so we could check its effectiveness in manipulating participants' overconfidence on the remainder of the individual task. We expected that after the feedback was given, participants in the *overconfident* condition would exhibit higher levels of overconfidence than participants in the *accurate* condition.

In the second phase, the dyadic task, we paired participants in the *accurate* condition with participants in the *overconfident* condition. We expected participants in the overconfident condition to be perceived as more competent than participants in the accurate condition and achieve higher status in the dyad.

Overconfidence manipulation. With our focus on overplacement, at first glance the most appropriate way to manipulate overconfidence would be to provide participants with overly positive feedback on their percentile rankings. However, doing so would have meant providing some participants in the *overconfident* condition overly negative, rather than overly positive, feedback. For example, telling participants in the *overconfident* condition that they scored in the 95th percentile would require providing overly negative feedback to individuals who ranked in the 97th or 99th percentile. To avoid this problem we conducted pilot tests to examine whether providing participants with feedback about their absolute performance scores would also manipulate their overplacement. These pilot tests showed that such a method was effective, so we used it in Study 2.

Specifically, participants in the *overconfident* condition were told that they answered 37 out of 50 responses correctly on the first five targets (we described our scoring technique the same way as in Study 1). No participant in Study 1 answered more

than 26 ratings correctly out of the first 50, so 37 seemed an unattainable yet realistic score. In the *accurate* condition, participants were told the actual number of items they answered correctly for the first five targets, which on average was 8.8 out of 50 (SD = 3.03). A suspicion check at the end of the study showed that no participant in either condition suspected the performance feedback to be false. Further, following the study, participants were debriefed regarding the performance feedback.

To ensure that participants in both conditions interpreted their scores using the same metric, we also provided all participants with a more intuitive translation of their scores. For example, we told them that 8 correct answers was performing "as well as chance (the same as guessing randomly)," and that 32 correct answers was performing "extremely well." To avoid the possibility that dyad partners would simply exchange their feedback scores, participants were instructed not to share their scores with their partner. An experimenter was present while dyads worked together to ensure no partners exchanged this information.

Self-perceived and actual competence rankings measures. As in Study 1, in the individual task, participants estimated their percentile rank in performance, in terms of their ability to judge each target's personality relative to other students at their university. Before participants were given performance feedback, across the first five targets, their estimates of their own abilities relative to other students were reliable (α = .93), and were thus combined into one aggregate *pre-feedback self-perceived ranking* measure. After they were given the performance feedback, across the second set of five targets, participants' estimates of their rank in abilities relative to others were again reliable (α = .96), and were thus combined into one aggregate *post-feedback self-*

perceived ranking measure. Participants' actual percentile rank in performance was measured the same way as in Study 1. Participants again showed reliability in their actual accuracy across targets, $\alpha = .70$. Therefore, once again some participants were reliably better at the person perception task than others.

Partner-rated task competence measure. In the *peer-ratings* phase, participants first rated their partner's task competence with the same four items used in Study 1. After standardizing all items and reverse-scoring negatively worded ones, the items showed satisfactory internal consistency ($\alpha = .63$) and were combined into one measure of *partner-rated task competence*.

Status in the dyad. Participants then rated their partner's status in the dyad with the same four items as in Study 1. The item measuring respect and admiration had a low item-total correlation (.13) and was excluded from the measure. The remaining three items showed sufficient reliability ($\alpha = .62$) and were thus combined into one measure of status in the dyad.

Results and Discussion

Manipulation check. As expected, before the performance feedback was administered, self-perceived rankings in competence did not differ between participants in the *overconfident* condition (M = 61.61, SD = 14.84) and in the *accurate* condition (M = 61.23, SD = 14.76), F(1, 39) = .02, n.s. This reassured us participants did not differ in overconfidence across conditions simply by chance, before the feedback was administered.

However, after the feedback was administered, participants in the *overconfident* condition had higher self-perceptions of their competence ranking relative to others (M =

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62.82, SD = 15.82) than did participants in the *accurate* condition (M = 57.14, SD = 15.25), F(1, 39) = 3.92, p = .05. Further, participants in the *overconfident* condition overestimated their percentile rank in competence, F(1,39) = 17.37, p < .01, whereas participants in the *accurate* condition did not, F(1,39) = 1.70, *n.s.* This suggests the feedback manipulation was effective.

Hypotheses tests. Participants in the *overconfident* condition (M = 4.74, SD = .85) attained higher status in the dyad than participants in the *accurate* condition (M = 4.10, SD = .88), F(1, 39) = 7.80, p < .01. Therefore, this provides evidence that overconfidence led to achieving higher status, and further supports Hypothesis 1. This effect is illustrated in Figure 2.

Insert figure 2 about here

As shown in Figure 3, participants in the *overconfident* condition were also perceived by their partners as more competent at the task (M = .23, SD = .63) than were participants in the *accurate* condition (M = -.25, SD = .68), F(1,39) = 13.20, p < .01. Therefore, this supports Hypothesis 2, and provides evidence that overconfidence also led to being perceived as more task competent.

Insert figure 3 about here

We next examined whether partner-rated ability mediated the effect of overconfidence on status. According to Judd, Kenny, and McClelland (2001), to establish mediation in a repeated measures design, one calculates whether the experimental manipulation affected both the dependent variable and proposed mediator, which we have already done. One then calculates difference scores for the dependent variable and the proposed mediator across the two experimental conditions, and calculates a summed

score for the proposed mediator across the two conditions; this summed score is then centered. One then predicts the dependent variable difference scores with the mediator difference scores and the mediator summed (and centered) scores.

The regression coefficient of the difference score for the mediator was significant $(B = .44, SE = .26, \beta = .26, p = .05)$, which indicates partner-rated competence mediated the effect of overconfidence on status. The intercept was also significant (B = -.43, SE = .26, p = .05), indicating the effect of overconfidence on status was still significant, controlling for the mediating effect of partner-rated competence (Judd et al., 2001). Therefore, this suggests support for Hypothesis 3: overconfidence led to status in part because it led to being perceived as more competent.

Exploratory analyses. Finally, as in Study 1, we again explored a number of possible moderators of the effects of overconfidence, including participants' gender, their actual competence levels, and their partner's competence levels. Similar to Study 1, however, we again did not find any evidence for any moderation effects, in that none of the interaction effects approached significance.

Summary. In Study 2 we found that overconfident individuals achieved higher status than individuals with more accurate self-perceptions of ability, and this effect was partially mediated by peer-perceptions of competence. Individuals in the *overconfident* condition attained higher status, and they did so in part because their partner perceived them as more competent. Critically, Study 2 used an experimental design and thus provided more direct evidence that overconfidence led to higher peer-perceptions of competence, and in turn, higher status.

Study 3

Some theorists have suggested that the interpersonal benefits of overly positive self-perceptions might be limited to short-term interactions only. While individuals with overly positive self-perceptions might be perceived positively in single interactions, for example, this effect would fade over time as others get to know the person better (Colvin et al., 1995). Indeed, Paulhus (1998) found that narcissistic individuals, and those who perceived themselves more positively than close acquaintances did, were perceived as high performers in groups of strangers at the beginning of the group's formation, but that this effect eroded over time.

However, as Paulhus (1998) also points out, the waning benefits of narcissism he observed might have been due to specific aspects of narcissism, rather than to overly positive self-perceptions per se: "Narcissists have an interpersonal style characterized by a competitive and domineering social presence (Morf & Rhodewalt, 1993), which may be increasingly offensive over time" (p. 1201). Therefore, narcissists might have been viewed less positively over time because they behaved in a highly domineering or condescending way, not necessarily because they were objectively overconfident in their abilities.

Indeed, a separate study conducted by Paulhus and colleagues compared selfperceptions to objective measures of ability and found that those who were overconfident
in their intellectual skills were perceived as more intelligent by close acquaintances
(Paulhus & Harms, 2004). This suggests that the benefits of overconfidence on status
attainment might endure over time when overconfidence is measured using operational
criteria for actual ability.

In Study 3, we tested whether the effects of overconfidence on status endure over time by assessing student project teams that met over 15 weeks. We reasoned that academic ability is a key source of status in student project teams, and that students who appear more academically competent are typically afforded higher status. We therefore tested whether individuals overconfident in their academic ability would have higher status in student teams even after they had worked together for 15 weeks.

Further, in Study 3 we also aimed to address an alternative explanation for our findings in Studies 1 and 2. Namely, it is possible that positive emotion acted as a third and drove the results. In Study 1, individuals with higher levels of dispositional positive affect might have been more overconfident (Lerner & Keltner, 2001), and more likely to attain status (Stogdill, 1948). Similarly, in Study 2, participants who were told they performed well might have reacted with positive emotion, which in turn might have helped them attain higher status. To address this possibility, in Study 3 we measured participants' positive affect and controlled for it in hypothesis tests.

Method

Participants. Participants were 111 undergraduate students in an introductory business course at a West Coast university (46.8 percent men and 53.2 percent women)

Participants were 22 years old on average (SD = 1.6); 51 percent Asian-American, 32 percent Caucasian, 5 percent Hispanic/Latino, 3 percent Middle Eastern, 3 percent Native American, and 6 percent who reported "other."

Procedure. The data were collected as part of a semester-long team project. At the beginning of the semester, students completed an on-line survey, from which we measured overconfidence. They were randomly assigned to project teams of 4-5 people.

Each team conducted a study of a real-life organization, reported their findings in a coauthored paper and presentation. After the projects were completed, students rated their team members on various attributes via an on-line survey. To encourage honest ratings, students were told that their ratings of teammates would remain anonymous, and that their teammates would be provided only with aggregate feedback from their fellow team members (as part of their course learning).

Overconfidence measure. At the beginning of the semester, completed Taylor and Gollwitzer's (1995) index of overly positive self-perceptions, the "How I See Myself" measure (HSM). Consistent with our focus on overplacement, the HSM asks participants to whether they rank above or below other students at their university on various qualities and skills using a 1 to 7 scale (see Taylor & Gollwitzer, 1995). We focused on the items related specifically to academic ability: academically able, intellectually self-confident, and ability to obtain personal goals. These items showed high internal consistency ($\alpha = .87$) and were thus combined to yield an overall measure of self-perceived academic competence relative to other students, (M = 5.67, SD = 1.09).

As suggested by prior researchers (Paulhus et al., 2003) we used overall grade point average (GPA), M = 3.54 (SD = .29) as an index of actual overall academic ability. We transformed participants' GPA into percentile rankings to reflect where they ranked relative to others. We again derived an overconfidence measure the same way as described above, by regressing self-perceived competence ranking on actual competence ranking, and retained the standardized residual.

Peer-rated competence measure. After the group project was completed, participants rated each of their team members on six dimensions related to academic

ability: the same three items from the HSM on which participants rated themselves, whether the participant possessed expertise that was important to the group task, had unique skills and abilities to add, and had unique resources to contribute. We used the software program SOREMO (Kenny, 1994) to implement a social relations model analysis of these round-robin ratings. SOREMO calculated a target score for each participant on each competence dimension, which reflects how the participant was perceived by other team members on average. SOREMO also removed group differences, making target scores statistically independent of group membership and thus appropriate for conventional least squares procedures that assume independence (see Kenny & La Voie, 1984).

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The target scores of each competence dimension showed statistically significant amounts of relative variance (M = 12 percent), which indicates sufficient inter-judge reliability in the ratings of competence. It is important to note that target effects should not be interpreted as alpha reliability coefficients (Kenny, Albright, Malloy, & Kashy, 1994). The magnitude of relative target variance reflects the proportion of variance in ratings explained by targets. To illustrate, group members tend to exhibit high consensus in perceiving each other's extraversion, and thus produce alpha reliabilities above the .70 level; yet, the relative target variance in ratings of extraversion tends to be in the low 30s in group contexts (Kenny et al., 1994). The six competence dimensions correlated with each other ($\alpha = .89$), so we combined them to yield an overall measure of peer-rated competence.

Status measure. Participants then rated each of their team members on five dimensions related to status in task groups, based on prior research and theory (Berger et 30

al., 1972): the respect and admiration each received from other group members, who led the group (the degree to which the person made decisions, coordinated group activities, and motivated the group), who should have led the group, who contributed useful ideas, and who contributed overall.

We again used the software program SOREMO (Kenny, 1994) to implement a social relations model analysis of these round-robin ratings. The target scores of each status dimension showed statistically significant amounts of relative variance (M = 51%), which indicates very high inter-judge reliability. The five status dimensions also correlated with each other ($\alpha = .88$), so we combined them to yield an overall measure of status.

Positive affect measure. To help rule out positive affect as a potential third variable, participants also completed the positive affect scale of the Positive and Negative Affect Schedule (PANAS; Watson, Clark, & Tellegen, 1988). Participants reported how much they felt 10 emotions in general, or on average: interested, excited, enthusiastic, proud, alert, strong, inspired, determined, attentive, and active, on a scale from 1 ("*None*") to 5 ("*Extreme*"). The scale showed satisfactory internal consistency, $\alpha = .85$; the mean score was 3.65 (SD = .56).

Results and Discussion

In support of Hypothesis 1, overconfidence predicted higher status in the group (β = .19, B = .17, SE = .08, p < .05). Therefore, overconfident individuals had more status in the group than individuals with accurate self-perceptions of ability, even after the group had worked together for 15 weeks. This relation also held up even after controlling for positive affect (β = .19, B = .16, SE = .08, p = .05). In fact, positive affect did not predict

status ($\beta = .03$, B = .03, SE = .09, n.s.). This lends some reassurance that the effects of overconfidence on status were not due to positive affect.

In support of Hypothesis 2, overconfidence also predicted peer-ratings of competence, (β = .29, B = .11, SE = .04, p < .01). Therefore, overconfident individuals were perceived by their teammates as more academically skilled than were individuals with accurate self-perceptions of academic ability. This relation also held up after controlling for positive affect, (β = .29, B = .13, SE = .04, p < .01). Once again, positive affect did not predict peer-rated competence (β = .00, B = .00, SE = .05, n.s.).

We next examined whether the relation between overconfidence and status was mediated by peer-ratings of competence. To establish mediation, four conditions had to be met (Kenny, Kashy, & Bolger, 1998). First, overconfidence must predict status; second, overconfidence must predict peer-rated competence. These two conditions have been met as described above. Third, the mediator must predict the outcome variable when controlling for the independent variable; a multiple regression showed that status was predicted by peer-rated competence ($\beta = .76$, B = 1.54, SE = .14, p < .01), but not by overconfidence ($\beta = -.01$, B = -.01, SE = .06, n.s.). Finally, a Sobel test of the reduction in the predictive power of peer-rated competence (i.e., the indirect effect) achieved significance (z = 1.99, z = 0.05), thus satisfying the final condition for mediation and providing support for Hypothesis 3. As displayed in Figure 4, the relationship between overconfidence and status in these student project teams was mediated by peer-rated academic ability.

Insert figure 4 about here

Finally, we again explored the potential moderating effects of gender and participants' actual competence (peers' actual competence in this group setting seemed less relevant so we did not examine that as a potential moderator). Similar to the findings in Study 1 and Study 2, however, there was no support for any interaction effects, as none of the interactions approached significance.

In sum, the findings in Study 3 again suggested that overconfident individuals achieved higher status in collaborative tasks than individuals with accurate perceptions of their abilities. Further, the findings suggested that this relation was mediated by peer-perceptions of competence: overconfident individuals attained higher status because their partner perceived them as more academically skilled. Finally, these findings held up even though the teams had worked together for 15 weeks, suggesting that overconfidence has a positive effect on status that endures over time.

General Discussion

Summary of Findings

Across three studies we found consistent support for our primary hypothesis, that overconfidence helps individuals attain status. In Studies 1 and 2, individuals who were overconfident in their person-perception abilities attained more status in a joint person-perception task than individuals who perceived their abilities accurately. This effect emerged regardless of whether such overconfidence was naturally occurring or experimentally manipulated. In Study 3, individuals who were overconfident in their academic abilities attained more status in their student project group than individuals who perceived their academic skills accurately. Furthermore, we found that the effects of overconfidence on status were mediated by peer-rated competence in all three studies.

That is, overconfident individuals attained more status than accurate self-perceivers because others (mistakenly) perceived them as more competent. Finally, we observed similar effects of overconfidence in longer-term groups; overconfident individuals had higher status than accurate self-perceivers even after working together for 15 weeks.

The current studies had a number of strengths. First, the data were extensive. In the 92 task dyads and 23 task groups we assessed, we obtained self-reports of abilities, objective indices of actual ability, and peer-ratings of competence and status. Therefore, we helped avoid problems associated with shared method variance. Second, we obtained highly consistent results even though the studies were conducted in the laboratory as well as field, used correlational as well as experimental methods, used different tasks (person perception tasks and class projects), and the data were collected cross-sectionally as well as longitudinally. Third, a critical feature of our study designs is that we used operational measures of actual ability to distinguish between overconfidence and justifiably high confidence. This provides some assurance that actual ability was not driving a spurious relation between self-confidence and status.

While the current studies had a number of strengths, there were of course limitations. For example, we cannot know with certainty whether overly confident individuals truly believed that they were highly competent, or whether they were merely reporting what they wished to believe about themselves (and expressing to others a demeanor that reflected their desired self). Were "overconfident" participants genuinely overconfident, or were they merely engaging in impression management (Paulhus et al., 2003)? Previous research suggests that the overconfidence we observed was genuine, not a product of impression management. Specifically, our overconfidence measures were

based on questions completed privately, and participants were explicitly told their answers would not be shared with other participants. Under similar experimental conditions, Hoorens (1995) found that overconfidence was a product of genuine delusions about the self and not impression management motivation.

Our studies examined laboratory dyads and student project groups. Such samples allowed for greater methodological control and precision in measures, but also perhaps limit the ecological validity of the findings. Although the student project groups might be deemed "real world" in that they were not constituted for study purposes and there were real stakes at hand, it is possible that the same findings might not emerge in other real world teams where the stakes are higher. For example, in organizational teams, groups might be more skeptical of teammates who seem highly confident because their own job performance depends on the team's success. However, task contexts in organizations often do not allow for perfect detection of others' competence. Therefore, we propose that the findings we observed would replicate in organizations as well. Future research should follow up by examining other naturally occurring teams.

Contributions to the status literature

The current findings have a number of important theoretical implications. First, they inform us about the psychology of those who possess high status. One commonly asked question about those who possess status is: does their behavior reflect their position or their preexisting personality? For example, in the case of narcissistic CEOs (Chatterjee & Hambrick, 2007), did their status make them more narcissistic or did their narcissism help them rise in the hierarchy? With regard to overconfidence, our findings suggest that the answer might be "both." That is, while status increases the propensity to engage in

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overconfidence, overconfident individuals are also more likely to attain status in the first place.

Our findings also help us understand some of the systematic biases and inefficiencies that exist in status distribution systems. That is, groups and organizations strive to put their most competent members in charge (Berger et al., 1972; Lord, 1985). However, as we know from prior research – and perhaps personal experience – groups and organizations frequently get it wrong. The link between individuals' status and their underlying competence is not always strong in that individuals who are not the most competent often take charge, and highly talented individuals are often relegated to the bottom of the hierarchy (Anderson & Kilduff, 2009; Berger et al., 1980). How does this occur? Based on the current findings, we believe that such "dysfunctional" hierarchies emerge in part because it is often difficult for group members to ascertain each other's true competence levels. In such contexts, status is based on each member's self-perceived abilities in addition to his or her actual abilities.

The current findings contribute to the resurgent social-psychological literature on status and power, which has demonstrated many ways in which possessing positions of high rank shapes individuals' thoughts, emotions, and behavior (for a review, see Keltner, Gruenfeld, & Anderson, 2003). Most of that research randomly assigns participants to positions of high status and authority. Such study designs afford greater control and help establish causality. However, they might also lead us to underestimate the differences in behavior patterns that exist in the real world between high- and low-ranking individuals. For example, prior studies have shown that individuals randomly given higher rank exhibit more disinhibited behavior and prefer riskier courses of action (Anderson &

Galinsky, 2006; Keltner et al.2003). Our findings suggest that in the real world, overconfident individuals are more likely to achieve positions of status. And because overconfidence also promotes risk-taking (e.g., Chatterjee & Hambrick, 2007), the actual relation between high rank and risk-taking might have been underestimated by those prior studies. People in positions of status and power – corporate or government leaders for example – would be subject to two forces that encourage them to take risks: their elevated social position and their pre-existing propensity for overconfidence. Our findings therefore suggest that gaining a clearer picture of the magnitude of differences across high- and low-ranking individuals requires field studies of individuals in real-world high- and low-ranking positions as well as laboratory studies.

Finally, the current findings extend the organizational literature on influence. In organizations, the ability to influence others is critical to each member's overall effectiveness. Initiating change, obtaining assistance, and implementing new ideas all require the capacity to influence, direct, or modify others' behavior (Kanter, 1977; Kipnis & Schmidt, 1988; Mowday, 1978; Yukl & Falbe, 1990). Many theorists have argued that structural factors, more than personal qualities, determine individuals' influence in organizations (Brass, 1984; Perrow, 1970; Pfeffer, 1981). For example, according to Kanter (1979), "we have to look not at the person . . . but at the position the person occupies in the organization" (p. 66) to understand differences in influence. Accordingly, organizational researchers have typically focused on how influence is shaped by formal positions in the organization (e.g., Salancik & Pfeffer, 1977), location in a social network (e.g., Brass, 1984; Burt, 1992), or subunit membership (Salancik & Pfeffer, 1974). With the current studies, we contribute to the smaller but still critical body of research on how

influence can also come from personal characteristics (e.g., Anderson & Kilduff, 2009; Flynn, 2003; Flynn, Reagans, Amanatullah, & Ames, 2006; House, 1988).

Contributions to the overconfidence literature

The findings we observed also make important contributions to the literature on overconfidence. As Moore and Healy (2008) point out in a recent review, overconfidence has been labeled as a potentially catastrophic bias – a catalyst of wars, labor strikes, and stock market bubbles. On an individual level, overconfidence is viewed as an impediment to work performance, learning and development, and health and longevity (Dunning, Heath, & Suls, 2004). While we do not argue with these claims, the current findings suggest that the effects of overconfidence are likely more nuanced. Indeed, we found that overconfidence helped people gain status because they were perceived as more competent in the eyes of their peers. Thus, whether overconfidence brings benefits or costs might depend on the person, the context, and the outcome under consideration. The social benefits of overconfidence have been suggested by other organizational scholars (e.g., Bonaccio & Dalal, 2006; Keren & Teigen, 2001; Russo & Schoemaker, 1992; Yates, Lee, & Shinotsuka, 1996). However, to our knowledge, no work has tested whether overconfidence leads to higher peer-perceptions of ability or to status.

Further, our findings speak to arguments regarding the origins of overconfidence. In explaining why overconfidence is so pervasive in judgment and decision-making, many theorists have focused on limitations in human cognition such as errors in the accounting of past successes and failures (Miller & Ross, 1975), the inability to recognize one's weaknesses and actual performance levels (Kruger & Dunning, 1999; Moore & Healy, 2008), or the use of favorable standards when assessing the self (Dunning,

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Meyerowitz, & Holzberg, 1989). Others have focused on the psychological benefits that overconfidence provides, such as higher self-esteem (Alicke, 1985), improved mental health (Taylor & Brown, 1988), or greater task motivation and persistence (Waldman, 1994). An additional possibility that has received less attention, however, is that people might tend to engage in overconfidence because of the social benefits it provides. This is some of the first empirical investigation of the idea that overconfidence pervades human cognition because of its social benefits, even though numerous theorists have proposed such an argument (Alexander, 1987; Krebs & Denton, 1997; Leary, 2007; Trivers, 1985; Waldman, 1994).

Future Directions

The current findings generate a number of questions for future research. First, when will overconfidence lead to increases in status, when will it not, and when will it lead to decreases? One possibility is that overconfidence leads to social benefits only when others are uncertain about an individual's actual abilities. As Swann and Ely (1984) found, individuals' self-perceptions influenced perceivers' ratings of them only when the perceivers were uncertain about their preexisting views of the individual; in contrast, when perceivers were more certain in their view of the individual, individuals' self-views had no effect. Another possibility is that overestimating one's abilities to a mild or moderate degree, but not an extreme amount, is optimal (Baumeister, 1989). As evidence for this idea, studies often find, as did this one, that the average level of overconfidence across individuals tends to be just slightly unrealistic, but not dramatically so (John & Robins, 1994).

On a related note, what happens to overconfident individuals when their actual competence is revealed to others? Imagine an overconfident executive who conveys total certainty in his ideas, making him appear highly competent to others and boosting his status among coworkers. What happens to his status when subsequent information (e.g., product sales) contradicts his positions? Would this individual face a backlash, such that his eventual status would drop lower than it would have been if he more accurately portrayed his competence to others in the first place? Or would he simply drop to a status level commensurate with his actual ability?

Finally, future research should explore more possible mediating mechanisms for the effect of overconfidence on status. While we found full mediation for peer-rated competence in Studies 1 and 3, we found partial mediation in Study 2. For example, perhaps overconfidence leads individuals to work harder on difficult tasks, allowing them to actually perform at higher levels (Taylor & Brown, 1988). Or, perhaps overconfident individuals are viewed by others not only as task competent but motivated to achieve, and thus worthy of status and influence.

On a more general level, previous research has suggested that the possession of status can lead individuals to be overconfident in their abilities. Here, we found that overconfidence can lead to higher peer-ratings of competence, and in turn, status. This notion has important implications for group and organizational dynamics, including status distribution systems, group decision-making, and the detection and expression of competence. Future research should further examine the mechanisms underlying the effects we observed, the boundary conditions, as well as the other social and

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organizational domains in which overconfidence may lead to social and organizational success.

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Footnotes

- 1. We thank Daniel Ames for these photographed targets.
- 2. The data for each target's "true" personality were obtained from Daniel Ames. Each target's "true score" was derived by averaging the ratings of the target made by him/herself and by eight knowledgeable informants.
- 3. Because participants performed somewhat poorly on the task on average, one concern might be that any effect of overconfidence would be due to one of two statistical artifacts. First, the actual competence variable might have suffered from a floor effect and thus a restriction of range. If so, any effect of overconfidence might be due simply to the higher variance in self-perceived competence relative to actual competence. However, the variance in actual competence percentile ranking was larger (SD = 28.94) than the variance in perceived competence percentile ranking (SD = 13.99), thus alleviating that concern. Second, the task might have been so difficult that any variance across participants in their actual performance might be random akin to dice-throwing scores in a game of chance. If so, the actual competence variable might be meaningless and unable to predict anything, thus allowing for self-perceived competence to have greater predictive power. However, the reliability of the actual competence measure indicates that variance across participants in their actual ability was systematic and not random; some participants reliably performed better than others.

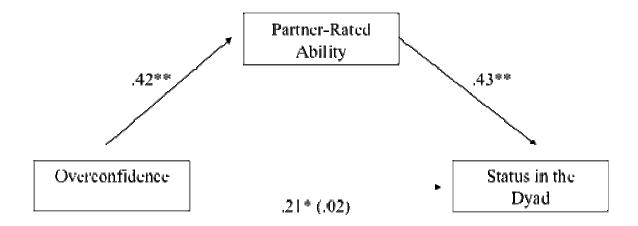
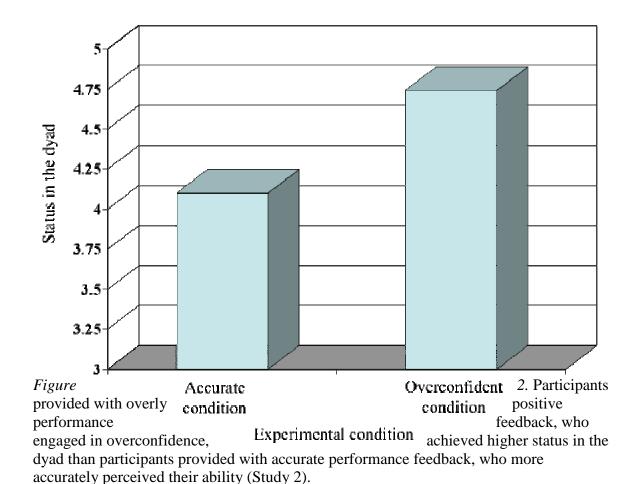


Figure 1. Partner-rated ability mediated the relationship between overconfidence and status in the dyad (Study 1).



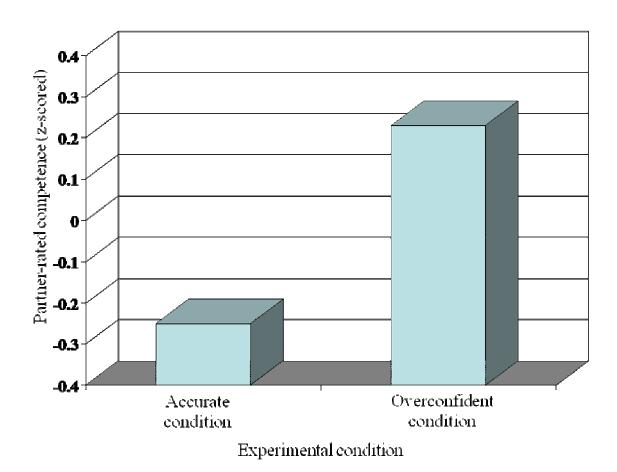


Figure 3. Participants provided with overly positive performance feedback, who engaged in overconfidence, were perceived as more competent by their partners than participants provided with accurate performance feedback, who more accurately perceived their ability (Study 2).

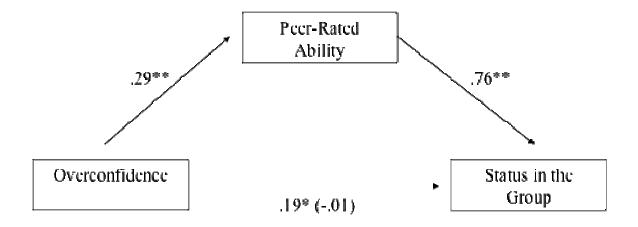


Figure 4. Peer-rated academic ability mediated the relationship between overconfidence and status in the group (Study 3).