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Developing a functional view of pride in the interpersonal domain

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Developing a Functional View of Pride in the Interpersonal Domain

A dissertation presented

by

Lisa A. Williams

to

The Department of Psychology

In partial fulfillment of the requirements for the degree of
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in the field of

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DEVELOPING A FUNCTIONAL VIEW OF PRIDE IN THE INTERPERSONAL
DOMAIN

By

Lisa A. Williams

ABSTRACT OF DISSERTATION

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for the degree of Doctor of Philosophy in Psychology
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Abstract

The presented studies examined the ability of pride to serve as an adaptive emotion within the context of interpersonal situations. Two functional hypotheses for this positive self-conscious emotion are posited. First, pride should organize and direct behaviors in interpersonal settings such that domain knowledge or expertise is shared or demonstrated. Second, pride should engender behaviors that signal warrant of increase in social capital to others. Building off of previous work, which demonstrated that pride facilitates increased efforts on valued tasks in intrapersonal situations (Williams & DeSteno, 2008), two studies examined these hypotheses in interpersonal settings.

Study 1 specifically tested the hypothesis that pride will motivate individuals to engage in behaviors that display or communicate their expertise to others. Once engaged in such sharing, proud individuals were found to exert more effort to demonstrate to peers skills and knowledge associated with the source of the emotion. Self-reported pride intensity demonstrated a predictive role in this effect, while alternative mechanisms of positivity and self-efficacy did not. Thus, Study 1 produced initial support for the first of two hypothesized functional roles of pride: interpersonally, pride impels individuals to demonstrate their success and skills with peers.

Study 2 utilized group problem solving tasks designed to determine if proud individuals would exert domain-relevant leadership within an interpersonal, cooperative setting. Of import, Study 2 asked also whether peers view individuals exhibiting pride positively, as opposed to with disdain. Both functional hypotheses were supported; proud participants took on a leadership role within the group problem-solving task, but of high import, were also perceived as the most likeable interaction partners.

These findings suggest that pride, when representing an appropriate response to actual performance, constitutes a functional social emotion with important implications for leadership, status attainment and the building of social capital. This work provides an important piece to the puzzle of elucidating the myriad mechanisms involved in successful intra- and interpersonal functioning, yet also opens doors to numerous and potentially highly valuable veins of research.

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Introduction

The emotion pride has a Janus-faced reputation. Pride has been described both as a virtue and a vice, both as an emotion at the pinnacle of human experience and as a state leading to spiritual demise. While, on one hand, pride is universally classified as a positive emotion in the psychological literature and is experienced with positive hedonic tone, this emotion has not been free of negative colloquial associations or explicit warnings against downfalls associated with indulging in it. Indeed, Ancient Greeks, early Christians, Buddhists and many famed writers (e.g., Dante, Shakespeare, and Bronte), among others, warn of the dire spiritual and interpersonal consequences of not abstaining from experiencing and/or expressing pride. How can these two views be reconciled? Is there evidence to maintain a positive view of pride, or is this emotion one that should be dismissed as a maladaptive, reviled component of the emotional repertoire? If useful, what function might this emotion serve in both intra- and interpersonal situations? While many religious leaders, philosophers, and psychologists alike have theorized on this topic extensively, empirical research is the main avenue by which a definitive answer might be achieved.

The empirical work leading up to and presented in this dissertation attempts to establish support for a positive, functional view of pride. In my view, pride is not an emotion to be avoided, suppressed, or shunned, but instead, at least in some cases, embraced and utilized as a tool by which individuals can develop skills and gain interpersonal, social capital. Pride stemming from appropriate precursors might be an essential mechanism by which individuals climb the social ladder within domains in which they are efficacious. Empirical support for this view is presented along with

extensive discussions of theoretical and definitional concerns, as well as implications for both the field of psychology and society in general.

Defining Pride

Before endeavoring to establish a functional role for pride, it is first important to define what I mean by the term. Although some debate surrounding the cognitive appraisals and experiential characteristics of pride exists, most psychologists agree that pride is a positive, self-conscious emotion arising from achievements that can be attributed to one's abilities or efforts (M. Lewis, 1997; Tangney, 1999; Tracy & Robins, 2004a, 2007a). Mascolo and Fisher (1995) concisely wrote, "Pride is generated by appraisals that one is responsible for a socially valued outcome or for being a socially valued person." Consistent with the view that pride involves public evaluations of the self (i.e., a situation where one is conscious of one's evaluation by other social beings), Webster and colleagues (2003) demonstrated that pride was most strongly evoked in situations of publicly praised accomplishment.

However, it is noteworthy that experiences of pride are not so narrowly contrived. An audience or explicit peer is not an absolute necessity; pride can arise in solitude upon reflecting on the self from a meta-aware standpoint (Baumeister, 1998). In fact, as Allport (1954) would agree, many social psychological mechanisms occur with the mere implied presence of others. For instance, achieving a particular goal in solitude may result in pride stemming from an individual's ability to project how others might interpret that success even though that audience is not physically present. Indeed, the ability of humans to engage in mental simulations relevant to emotional experience and to view such simulations from the perspective of a "third person" stands as an important evolved

adaptation for behavioral decision-making (Baumeister, Vohs, DeWall, & Zhang, 2007).

Thus, whether the evaluation and comparison criteria stem from other individuals or one's self, the underlying process is the same; pride is experienced when positive acclaim, whether internally or externally derived, is applied to the self.

Pride can also arise in cases of success of a close other, such as a child or romantic partner (i.e., vicarious pride, cf. Tracy, 2004a; Kitayama, Mesquita, & Karasawa, 2006), or from successes related to communal identities such as nationality and team allegiance. In these cases, the "self" in the self-conscious emotion is expanded to include the close other (Aron, Mashek, & Aron, 2004) or defined in terms of group membership (Tajfel & Turner, 1986). Successes attained by the group or loved one will likely instill pride in those individuals who identify strongly with that alternative self-concept. It seems that this constitutes a common experience of pride; so-called "stage parents" and die-hard sports team fans certainly feel pride, likely as well as other self-conscious emotions, on behalf of the loved one or group.

In any case, the term pride seems to encompass a varied class of emotions that arise from situations of self-attributed success, where "self" can be broadly defined. I believe the best approach to "defining" pride is to adopt a prototype perspective (Fehr & Russell, 1984; Shaver, Schwartz, Kirson, & O'Conner, 1987), via which emotions constitute categories that have a set of prototypical characteristics, but also include affective experiences that vary in intensity and antecedent context. In this way, pride is an umbrella term for emotions related to self-attributed success. As such, experiences of pride arising from a direct achievement or achievement of a loved one are both considered valid experiences; they are simply more or less prototypical.

Facets of Pride: Authentic Pride vs. Hubristic Pride

Most would not argue with the statement that experiences of pride vary wildly from one instance to another. As described above, individuals feel proud both about receiving a promotion and hearing that their daughter was accepted to college. Thus far, I have discussed pride as elicited by a specific event. This is not a delimiting characteristic, however. It is noteworthy that individuals can be both proud of a particular achievement (*I am proud because I won my tennis match*) and simply proud of the global self (*I am proud because I am a great athlete*). The dimension distinguishing these two cases has been proposed by many social psychologists (M. Lewis, 2000; Tangney, 1999; Tracy & Robins, 2004a, 2007d). The key dimensional difference lies in whether the emotion is generalized and non-targeted or occurs in response to a specific event. Tracy and Robins (2004a) have specified a detailed model of self-conscious emotions in which this dimension plays a critical role. The more specific type of pride, termed authentic pride, stems from a specified successful event (e.g., mastering a skill, receiving a high academic mark; Tracy & Robins, 2004a, 2007a, 2007b), see also Tangney, 1999) where causal attributions are unstable and specific.¹ Hubristic pride, on the other hand, has no particular target and in essence is an unconditional positive view of one's self as a whole that may lead to negative social consequences (see also M. Lewis, 1997; Tangney, 1999). Causal attributions leading to hubristic pride are stable and global.

Experiences of pride may fall anywhere along the spectrum between authentic and hubristic pride. Tracy and Robins (2007a, 2007d) have argued that both authentic and hubristic pride can take the form of state emotions and/or trait characteristics within

an individual. This is to say the same event (e.g., winning a tennis match) can give rise to both a transient feeling of authentic pride tied to the event, or hubristic pride, a transient feeling of global self-worth. Conversely, pride relating to the global self can be state dependent or more trait-like in nature. Note, however, that the research discussed here deals with experiences of pride that would be classified much towards the authentic and state end of this spectrum. The distinction between authentic and hubristic pride becomes important as the proposed functional role of pride is discussed.

Distinguishing Pride From Other Psychological Constructs

Almost as important as defining what pride *is* is defining what pride *is not*. There are multiple psychological constructs that possess quite a bit of overlap with pride, as defined above. Conceptual and operational definitions of the constructs of pride, self-efficacy, and self-esteem have frequently possessed some level of overlap in the literature. At hand is also the issue of whether pride is a distinct emotion in its own right, or instead a variant of positive mood or affect. Each of these will be considered in turn.

Judgments of self-efficacy involve recognizing that the self is capable in a certain domain; thus, self-efficacy deals with cognitive appraisals of ability (Bandura, 1997). Pride, on the other hand, is an emotional response to success or goal achievement. Thus, although pride and self-efficacy often co-occur in everyday experience, they are theoretically and phenomenologically separable. Indeed, Bandura (1997) points out that an individual can feel that he or she is particularly able in a certain domain, yet glean no sense of self-worth, or pride, from those abilities. Take, for example, a divorce lawyer who is exceptionally apt at getting his clients the better half of a settlement. He might judge himself to be efficacious, but may not derive pride from his ability to cheat others

out of their fair share. The failure of pride to enter in such a situation could be due to the fact that cheating is not a socially valued behavior. Hence, pride and self-efficacy are related, yet inherently distinct phenomena. The functional hypotheses of pride presented here argue that it is the emotion in particular that drives adaptive behaviors. This is not to say that judgments of personal capability never impel one to pursue goals or demonstrate skills; rather, pride adds an independent component of motivation above and beyond those stemming from appraisals of ability that will come into play given certain contingencies.

Self-esteem and pride are also dissociable, though often conflated. Self-esteem is widely considered to be an attitude toward oneself (Banaji & Prentice, 1994; Baumeister, 1998). As with all attitudes, the structure of this representation contains both cognitive and affective components (Eagly & Chaiken, 1998). Thus, self-esteem consists of the attributes ascribed to the self at a given moment and the positive or negative evaluations stemming from these attributes. The affective component of self-esteem reflects a generalized positive or negative valence in relation to the self. Pride, on the other hand, is a specific emotion that derives from an appraisal of recognition for increasing self-mastery within a given context (cf. Tracy & Robins, 2004a). Like all emotions, it is temporally limited and tied to specific events in the internal or external environment. Consequently, one can feel pride about one's self or one's abilities, but this is distinct from the global valence-based attitude one holds toward oneself (i.e., self-esteem). Of course, changes in self-esteem and pride will often track one another in given situations (e.g., achieving a goal or receiving public recognition; cf. Herrald & Tomaka, 2002; M. Lewis, 2000; Tracy & Robins, 2004a), but heightened pride resulting from a given event

does not necessarily indicate high self-esteem;² an individual who has chronically low self-esteem in a given domain may experience intermittent pride as he or she makes strides toward gaining skills.

Nonetheless, some theoretical discussions of pride and self-esteem often blend the two, thereby leading to understandable confusion in the literature. For example, pride has been described as a self-esteem relevant affect (McFarland & Ross, 1982) and a feeling of self-worth (Brown, Dutton & Cook, 2001). Further, there is a growing trend to equate self-esteem and affective experience (Brown & Marshall, 2001; Hewitt, 2002). Indeed, Bandura (1997) discusses the two as if they are interchangeable and non-distinct concepts. Such views do suggest that, as we have noted, the two constructs are inherently related. I maintain that pride is a distinct construct, and as such, will have distinct, although not completely unrelated, functions from self-esteem and self-efficacy.

While I consider pride to be an emotional state distinct from happiness and generalized positivity, there is some contention as to whether this is a defensible position. In fact, pride does not appear in many of the seminal models of emotion (Ekman et al., 1987; Izard, 1971; Shaver et al., 1987; Tomkins 1962). On the other hand, there is strong evidence to support the claim that pride is in fact one of the basic emotions, and as such, constitutes a unique psychological state. Basic emotions are considered to be biologically based, and thus to have evolutionary value and universality (cf. Ortony & Turner, 1990). Tracy and colleagues (Tracy & Matsumoto, 2008; Tracy & Robins, 2008) have provided compelling evidence that the empirically-derived set of nonverbal behaviors associated with pride are recognized quickly as well as cross-culturally and are displayed by individuals achieving success. Indeed, my own research has demonstrated

that reports of pride uniquely predict behaviors, while generalized positivity does not (Williams & DeSteno, 2008). Such findings set pride apart from another basic emotion, happiness, which has its own set of nonverbal expressions and behavioral outcomes. In addition, some social psychological theories posit distinct functions for pride above and beyond those of generalized positivity or happiness (Fredrickson, 2001, 2005, 2006; Fredrickson & Branigan, 2001). Specifically, the broaden-and-build theory of positive emotions argues for pride's unique role in communicating success and engendering progress towards goals. Such functions and likely outcomes for pride set it apart from happiness or generalized positive affect. Rooted in a mood-maintenance perspective, the hedonic contingency hypothesis (Wegener & Petty, 1994) holds that costs and benefits of engaging in an activity (e.g., effortful cognitive processing) are weighed differently depending on an individual's mood. Positive mood increases critical analysis of potential mood-decreasing effects of engaging in a task, resulting in lowered likelihoods of expending effort towards a goal if doing so carries the risk of lowering mood valence. Note the divergent predictions for positivity and pride: pride *increases* while happiness *decreases* likelihoods of effort expenditure towards goals. As such, it is theoretically and empirically defensible to argue that pride constitutes a state that is unique from happiness or generalized positive affect.

For the purposes of this dissertation, and to be precise about what I mean when I use the term pride, I reiterate here a concise definition: pride is an emotion elicited upon achieving a particular success in a domain that is socially valued. While pride, positive mood, high state self-esteem, and positive judgments of self-efficacy are often

experienced in concert, these constructs are dissociable; the research presented here makes efforts to make such dissociations among these highly related constructs.

A Functional View of Pride: Background

I put forth a view of pride that is strongly based in functional views of emotion. For functionalists, emotional states serve as efficient mechanisms that aid individuals in efficiently responding to challenges presented by the environment as well as valued informational signals to those around us (Frijda, 1986; Keltner & Haidt, 2001). As such, emotions serve two main functions: (1) to organize thoughts and behaviors towards adaptive ends, and (2) to signal to others important information about the situation at hand. The former can be considered from the perspective of the emoting individual (i.e., intrapersonal functionality, Levenson, 1999), while the latter is most readily perceived from the perspective of those surrounding the individual (i.e., interpersonal functionality). Behavioral and cognitive organization can take many forms by shifting attention, physiologically preparing the body for particular action, and/or prioritizing certain goals. Expressions or signals of emotion are thought to communicate important information about environmental situations to others, to elicit the same or complementary emotions in others, and to guide others' behaviors (Fridlund, 1992, 1994; Keltner & Haidt, 2001; Scherer, 1986). Such expressions have signal value to perceivers, who identify such expressions automatically and use them as a source of information to guide behaviors.³

These two functions are seen perhaps most clearly in the so-called "basic" emotions. Basic emotions are thought to be biologically based, evolved states that are accompanied by easily recognizable facial expressions, feeling states, and sets of cognitive and behavioral responses (Ekman, 1992; Izard, 2007). Cross-cultural

universality is claimed for the basic emotions, such as fear, anger, disgust, sadness, joy, and surprise, although it should be noted that there is considerable debate surrounding which emotions should be considered basic (Sabini & Silver, 2005; Sauter & Scott, 2007; Shaver, Morgan, & Wu, 1996; Tracy & Matsumoto, 2008; Tracy & Robins, 2008) and if basic emotions constitute natural kinds or a category (Barrett, 2006; Ortony & Turner, 1990).

Basic emotions are thought to serve basic survival needs. At a minimum, humans, and indeed other animals, must meet challenges to immediate survival. Responding appropriately to physical threats of harm (e.g., a bear attack) or potential contamination (e.g., eating rotten carrion), for example, are crucial to day-to-day survival. It is classically thought that basic emotional responses aid in the efficient and adaptive responding necessary for successfully meeting these types of challenges (Bradley, Codispoti, Cuthbert, & Lang, 2001; Damasio, 1994; Frijda, 1986; Johnson-Laird & Oatley, 1992; LeDoux, 1996; Schwarz & Clore, 1996). The physiological, cognitive, and behavioral changes that accompany the experience of such emotions are classically thought to potentiate actions that deal with or take advantage of the situation at hand as well as to communicate information about that situation to others.

Take, for example, the emotion fear. Many components of the fear response are easily identifiable as behavioral preparation for dealing with the environmental stimulus. Upon elicitation, the sympathetic nervous system is activated, setting in motion a series of changes to hormone levels, heart rate, and blood flow—the classic “fight or flight” response (Öhman, 1986). Facial and bodily expressions might change accordingly; eyes widen, pupils dilate, a deep intake of breath occurs and muscles tighten (Darwin, 1872;

Ekman & Friesen, 1975; Izard, 1977). Visually and cognitively, attention is drawn towards the threat. These physiological and cognitive outcomes of fear are thought to be adaptive responses to the stimulus: the body is geared towards locating the environmental threat both physically and cognitively as well as towards physically dealing with the threat (e.g., running or fighting). The experience of fear is also typically associated with other behaviors that would fit under the second sense of functionalism. The facial expression of fear elicits strong emotional responses in others (Whalen, 1998). If fear is accompanied by startle, an individual may call out, vocalizing a cue to potential threat that others might use as a source of information (Darwin, 1872; Plutchik, 1984). In this snapshot of fear, it is evident that emotions have the capacity to serve two types of functional roles: organizing behavior on one hand, and signaling information to other individuals on the other hand.

For humans, environmental challenges involve not only successful navigation of the physical environment, but also navigation of the social one as well. This social environment is rife with potential friends, enemies, romantic partners, subordinates, and leaders. Humans need to decide with whom to interact, whom to trust, and when to invest in meaningful relationships (Keltner & Haidt, 2001). Various psychological mechanisms, including emotions, evolved or adapted to help meet the demands of social life (Barrett & Campos, 1987; Buck, 1999; Buss, 2000; Cosmides & Tooby, 1992; Levenson, 1999). These uniquely social challenges necessitate the existence of a class of socially-oriented emotional responses that play a critical role in successful interpersonal interaction (Keltner & Gross, 1999; Keltner, Haidt, & Shiota, 2006). Many emotion

theorists delineate *social* or *self-conscious* emotions as those that arise from situations with clear interpersonal orientations. Each of these classes is discussed in turn below.

The key features of self-conscious emotions are that they (1) require self-awareness and self-representations, (2) emerge later than other emotions, (3) facilitate social goals, (4) do not have discrete facial expressions, and (5) are cognitively complex (Tracy & Robins, 2007e). Among the emotions that are commonly grouped under this classification are shame, guilt, embarrassment, and pride. While all emotions can occur while reflecting on the self, self-conscious emotions necessitate a form of self-concept that is compared to personal or societal standards. Such comparisons can occur either internally by reflection or externally by actual observation by another person. Feeling embarrassed, for example, is dependent upon knowing that *someone* has witnessed, or could have witnessed, a committed social transgression.

While all emotions can occur in a social context, social emotions require the implied or actual presence of another person or entity. The features that distinguish social emotions from other emotions are that they inherently involve social concerns involving social functions, social goals, or social objects (Barrett & Campos, 1987; Hareli & Parkinson, 2008). Among emotions considered to fall under this category are pride, gratitude, jealousy, admiration, pity and empathy. For example, feeling grateful is dependent upon receiving a favor from *someone*; pity would not constitute a distinct state from sadness without the presence of *someone* else suffering.

Although in nascent stages, social psychological research regarding the functional roles of such emotions has revealed much about the roles that these emotions play in the human emotional repertoire. The prevailing view is that social and self-conscious

emotions help facilitate, not surprisingly, social goals (Keltner & Buswell, 1997; Tracy & Robins, 2004a). The proposed functional roles of social and self-conscious emotions can be classified in terms of the functions discussed above: (1) organizing thoughts and behavior, and (2) signaling situational information to others. In these cases, however, the types of situations in which the adaptive responses occur are necessarily social in nature and move beyond those that have to do with basic survival.

While functions for various emotions such as gratitude and shame have been proposed and demonstrated (Bartlett & DeSteno, 2006; Gruenewald, Dickerson, & Kemeny, 2007), a prime example of dual functionality for a social or self-conscious emotion is embarrassment. Embarrassment has been shown to motivate reparative, appeasing behaviors in the face of social transgression and also to bring about a set of nonverbal behaviors that indicate submission and awareness of the transgression to others (Keltner & Buswell, 1997). Embarrassed individuals display blushing, gaze aversion, smiling, and self-touch, all of which are thought to communicate submission and evoke reconciliation in others.

Perhaps the most convincing line of work demonstrating the crucial functional roles of self-conscious or social emotions looks at the *dysfunctions* or social deficits exhibited by individuals who cannot experience these emotions. Patients with damage to the orbitofrontal cortex fail to show appropriate social emotional responses to situations (e.g., high levels of self-disclosure and overpraise) that typically elicit such emotions among non-damaged counterparts (Beer, Heerey, Keltner, Scabini, & Knight, 2003). These patients not only fail to experience normal emotional responses to these types of highly social situations or even recognize that they have acted in an abnormal manner,

they often cannot subsequently adjust their interpersonal behaviors or display the nonverbal cues necessary to meet the demands of the pending situation. For example, awareness of social norm violation brought about by embarrassment is absent (Beer, John, Scabini, & Knight, 2006), and thus the associated nonverbal cues that start the appeasement-reconciliation process are likely also missing. Without the social emotional system intact, these individuals are in essence left interpersonally crippled.

While the functional roles for shame, guilt and embarrassment are both logically deducible and empirically supported from both a normal and impaired functioning approach, those for pride are less intuitively clear and have certainly been neglected in the realm of empirical research. I set forth in this dissertation a view of pride that provides clear predictions for its functional role in interpersonal settings along with a set of studies that aim to demonstrate support for this view of pride. In particular, my view details the functions of pride both in the sense of behavior organization and signal value.

A Functional View of Pride

It is my contention that the primary functions of pride fall into two categories: behavior organization and signal value. Not only does pride engender behaviors appropriate to the situation in which it is elicited, it also brings about cues to others that have significant social signal value. Each of these two potential functions is discussed in turn below.

Guided behavior. In terms of pride's role in guiding and organizing behavior, I argue that pride's function is to aid in the successful attainment and pursuit of long-term goals. Such goal-related decisions include the necessary tradeoff between benefits of immediate pleasure on one hand, and gains of long-term goal achievement on the other.

Short-term costs (e.g., tedium, frustration, or embarrassment) often have to be endured for long-term benefits that are otherwise difficult to achieve (e.g., highly-valued skills or status). For example, if an individual desires to become a respected scholar (i.e., the long term goal), he must sacrifice time and energy that could be spent doing less effortful tasks in order to invest the resources needed to attain the goal. He must risk initial failure and endure mental discomfort as his skills develop. Likely, investment of time and cognitive resources will need to occur in order to learn and develop his scholarship. When it comes time to attain acknowledgement from others, he may have to “put himself on the line,” so to speak, risking disapproval from colleagues. In such a case, pride related to scholarly ability might guide the decision to pursue the long-term goal and endure the potential risks and setbacks associated with such perseverance. In other words, pride might provide one mechanism by which individuals relinquish current positive states and endure short-term costs in order to attain long-term goals and rewards those goals facilitate.

A long history of psychological thought has pitted these two drives against one another. Freud posited the counteracting drives of the “pleasure-principle,” which guides immediate gratification, and the “reality-principle,” which delays gratification and helps an individual to endure momentary pain (Freud, Hubback, & Jones, 1922). Mischel and colleagues (Metcalf & Mischel, 1999; Mischel & Ebbelson, 1970) have described in detail the capacity of willpower to overcome the impulse of immediate hedonic gain. A plethora of more recent psychological research looks self-regulation (see Baumeister & Vohs, 2003 for a review), the premise of which is that humans must control or regulate the impulse for immediate gain in order to reap greater benefits. As has been discussed,

individuals engage in hedonic contingency analyses (Wegener & Petty, 1994), seeking to maximize current pleasure by avoiding engagement in tasks that might put such positivity in jeopardy. It has been suggested, however, that such analyses can take into account both short- and long-term states in order to arrive at the most beneficial decision (Wegener & Petty, 1994). However it is termed, the successful decision to delay hedonic gain is thought to be central to adaptive functioning (Baumeister, Leith, Muraven, & Bratslavsky, 1998). Indeed, a follow up on the participants of the classic study on delayed gratification asking children to decide between indulging a single marshmallow or waiting to get two marshmallows later revealed the long-term benefits of possessing such an ability. Data obtained when those same children had matured show that those who successfully overcame the impulse to have a single treat in the moment demonstrated significant advantages both intra- and interpersonally (Shoda, Mischel, & Peake, 1990).

While psychological theories have proposed various constructs that play a role in these types of decisions and tradeoffs, few have given any particular emotion a central role. I believe, however, that this oversight is in error. I posit that pride serves a functional role towards this end; pride motivates hedonically-costly efforts aimed at acquiring skills that increase one's status and value to one's social group. In essence, I believe that pride, unlike generalized positive affect (cf. Wegener & Petty, 1994), should impel an individual to incur short-term costs (e.g., expenditure of high levels of effort) for the purpose of reaping longer-term rewards (e.g., value by a social group). That is, pride should motivate individuals to acquire and/or demonstrate abilities, even in the face of initial difficulties or risks, in order to increase their status and attractiveness with

respect to potential interaction partners. This makes sense, as pride is elicited by successful achievement in a socially valued domain. Using the emotion as a source of information, individuals should recognize the likelihood of further success in the domain given investment of effort and resources. Pride should also indicate to the proud individual that she achieved a socially valued success, and thus support behaviors geared towards sharing this success despite inherent risks in doing so.

As initial support for the motivational view of pride, I have demonstrated the ability of pride to engender perseverance on socially-valued tasks while also dissociating the effects of pride from the related causal factors of self-efficacy, self-esteem, and generalized positive affect (Williams & DeSteno, 2008). Across two studies, support was garnered for the *motivational hypothesis of pride*, which states that when feeling proud about a recognized accomplishment, an individual might feel incentive to pursue further action in that valued domain and overcome short term hedonic costs. After establishing a reliable, *in vivo* pride induction that consisted of positive interpersonal feedback, participants engaged in a tedious task for a length of their choosing. I found evidence that demonstrates pride's ability to compel individuals to persevere at a task they would otherwise stop; use of control conditions and mediational analysis allowed alternative explanations of positive affect, self-efficacy, and self-esteem to be ruled out.

Comparisons of behavioral perseverance among participants led to feel proud and participants in various control conditions demonstrated that, on average, the highest levels of perseverance occurred among participants who received the pride induction; Control conditions were designed to induce generalized positivity and heightened levels of self-efficacy and not pride; participants in these conditions did not persevere at higher

levels than those in standard neutral control conditions. While high levels of these conceptually related constructs co-occurred with high levels of pride, these constructs did not drive perseverance, as only pride was a significant mediator of the relationship between condition assignment and perseverance. It seems, then, that pride serves a motivational role for goal-related tasks, at least in an intrapersonal setting.

Yet, such findings do not speak directly to the *social* functions of this emotion. Simply put, the fact that pride may mediate increased perseverance on tasks does not necessarily imply that individuals will demonstrate similar investments in an interpersonal situation. Demonstrating skill and extending leadership over a particular domain during an interaction with peers requires quite a bit more incentive than the motivated behaviors observed in the previous study. It is risky to demonstrate skills and share knowledge; there is always a chance that those behaviors will not be acknowledged positively by peers. Overcoming such risks, however, is crucial for personal and group development. This role of pride makes sense from an evolutionary standpoint, as it promotes dissemination of valued skills to the group, while at the same time allowing for further skill development of the proud individual.

The previous studies do not test the skill- or success-sharing component of this view of pride. Only demonstration of pride's role in interpersonal settings will provide compelling support for the view of pride set forth presently. Both Studies 1 and 2 presented here test pride's functionality in terms of behaviors observed in interpersonal, as opposed to intrapersonal, situations.

Signal value. Just as many other emotions have signal value to observers, I posit that pride serves to indicate to others pending merit of increased social capital. Pride is

likely to elude verbal and nonverbal behaviors in the proud individual that convey a sense of deserved status. Such behaviors might be explicit (e.g., discussing the success) or much more subtle (e.g., taking a leadership role on a task in a related domain). There are two components of this argument; (1) pride must have a signal, and (2) that signal must have informational value to observers.

To the notion that pride has a distinct signal, there is evidence that pride has a set of unique nonverbal cues. Tracy and Robins (2004b, 2007c) identified a set of nonverbal behaviors reliably and uniquely recognized as conveying the emotion pride. The cues include a small smile, head tilted back, arms raised above the head or on hips and expanded chest. This set of nonverbal cues is reliably identified not only among standard Western samples, but also by children aged 4-10 years (Tracy, Robins, & Lagattuta, 2005) and by samples from Italy and the West African nation of Burkina Faso (Tracy & Robins, 2008). In fact, Tracy and Matsumoto (2008) found evidence that both blind and sighted international athletes exhibit this set of nonverbal cues upon successful performance in a competition, further supporting the argument that the nonverbal pride expression is innate and universal.

It is well supported, then, that there exists a set of nonverbal behaviors that can be recognized as conveying pride. However, it has yet to be demonstrated that these nonverbal behaviors are displayed spontaneously across many situations that elicit pride in real life or laboratory settings. That is to say, there may be subtler cues that convey the emotional state of pride to others in situations in which displaying the full expression would not be warranted or socially appropriate (cf. Tracy & Robins, 2007c).

Anecdotally, in my research thus far I have not witnessed the full nonverbal expression of

pride as identified by Tracy and Robins in response to the developed induction of the emotion (Williams & DeSteno, 2008). Even so, I believe that it is likely that pride elicits behaviors that convey the emotional state to others, whether it is the full set of nonverbal cues associated with pride (Tracy & Robins 2007c) or more subtle communicative cues.

The question becomes, then, what informational value these cues hold for observers. Tracy and Robins (2004b, 2007c) present a detailed account of what the informational function of the pride expression might be. In essence, the pride display signals success deserving of an increase in social status. The nonverbal behaviors associated with pride attract attention to the individual due to the expanded body posture. The posture conveys a sense that the individual is deserving of high status. The smile conveys friendliness, indicating that the dominance cue should not be interpreted as hostility. Thus it seems that others should interpret displays of pride, or behaviors that accompany pride, as cues to status, or increases in social capital. If this logic holds, those individuals exhibiting pride should be viewed as potential leaders or experts, and perhaps as more valuable or attractive peers given their increased status. This hypothesis regarding interpersonal perception or impression formation of proud individuals is tested empirically in Study 2.

Pride: Virtue or Vice?

The view of pride as an adaptive social emotion that can facilitate important interpersonal goals via both behavior and social signals stands in stark contrast with the conventional view that it is a sinful emotion that, if indulged, might lead to dire interpersonal consequences. My view of pride, however, is not alone in its attempts to argue for its placement among other emotions considered to have adaptive functional

value in the emotional repertoire. Within the psychological literature, the notion that pride is not unequivocally maladaptive has been growing. Several researchers have suggested that pride, given certain contingencies, may result in positive outcomes for individuals (Fredrickson & Branigan, 2001; Tracy & Robins, 2007a; Williams & DeSteno, 2008). The pivotal factor determining the positive role of this emotion is theorized to hinge on the antecedent of the emotion. Whether pride stems from objective successes such as mastering a skill or receiving a high academic mark (i.e., *authentic* or *beta* pride) or a more generalized overly positive assessment of one's self-worth and abilities (i.e., *hubristic* or *alpha* pride; M. Lewis, 2000; Tangney, 1999; Tracy & Robins, 2004a, 2007a, 2007b) seems to determine the emotion's positive adaptive role. Thus it may be that the conventional view of pride as negative mostly stems from emotional experiences at the hubristic end of the dimension,⁴ while experiences having to do with specific successes are more positive, functional, and adaptive. While the present research does not pit the two facets of pride against one another, it does provide ample support for the view that *authentic pride*, at least, plays an important role in successful interpersonal functioning.

Overview of Studies

The goal of the present studies, therefore, was to put the hypothesis about the socially adaptive value of pride to the test. This view of pride sets forth two hypotheses. First, pride should organize and direct behaviors in interpersonal settings such that domain knowledge or expertise is shared or demonstrated. Second, pride should engender behaviors that signal warrant of increase in social capital to others. Building off previous work, which demonstrated that pride facilitates increased efforts on valued

tasks while working individually, Study 1 tests the hypothesis that proud individuals will engage in behaviors that display or communicate their expertise to others. The second study utilizes group problem solving tasks designed to determine if proud individuals would exert domain-relevant leadership within an interpersonal, cooperative setting. Of utmost import, Study 2 asks not only if pride leads to increased dominance and leadership, but also whether individuals exhibiting pride are viewed positively, as opposed to with disdain, by their partners.

Both studies utilize an *in vivo* induction of pride developed previously (Williams & DeSteno, 2008). While other methods of inducing emotion are common, including autobiographical recall, video- or photo-viewing tasks, or reading of emotionally laden vignettes, it has been argued by many social psychologists that these methods are inadequate for eliciting the full emotional response of many of the more complex, social, or self-conscious emotions (Bartlett & DeSteno, 2006; Harmon-Jones, Amodio, & Zinner, 2007). Thus, these studies use highly involved paradigms that are designed to be of relatively high-impact to participants.

In a similar vein, the present studies measure actual behaviors as emitted by participants in real time. As opposed to many studies investigating complex social phenomena that heavily rely on self-reported intentions or projections of behavior (e.g., descriptions of what a participant thinks she would do in a situation), the two studies presented here study phenomena of interest in real, live social interactions or situations. While this approach is more complicated from a methodological point of view, the benefits for interpretability of obtained data are clear; true behavioral measures are not as

subject to self-presentation biases, social desirability concerns, or inability to accurately predict future behaviors or responses.

Study 1

The functional hypothesis of pride's adaptive role in interpersonal settings posits that the emotion will organize behavior towards achieving goals that render long-term, as opposed to short-term, benefits. Pride serves as a motivational source to overcome the inherent risks and costs associated with pursuing such goals. Study 1 focuses on pride's role in motivating actions aimed specifically at achieving interpersonal goals.

Interpersonal goals can take many forms (e.g., belonging, helping and receiving help from others, trusting and being trusted; see Chulef, Read, & Walsh, 2001). A main drive for individuals is to attain valued skills that are recognized by peers. High ability for valued skills stands as both an adaptive end in and of itself, as well as a marker for admiration and elevated status (cf. Fiske, Cuddy, Glick, & Xu, 2002; Tracy & Robins, 2004a, 2004b). Given the importance of possessing valued attributes for maintaining bonds to others (Baumeister & Leary, 1995; Leary, Tambor, Terdal, & Downs, 1995), efforts aimed at achieving abilities and associated recognition might represent a unique goal, the pursuit of which may be influenced by emotional reactions to acclaim (i.e., pride). Previous work (Williams & DeSteno, 2008) has demonstrated support for pride's candidacy among other psychological mechanisms that shape effort towards valued goals, including self-efficacy (Bandura, 1997) and self-regulation (Vohs, Baumeister, & Ciarocco, 2005).

Yet, support for the argument of pride's role in motivating behaviors geared towards achieving recognition for previous success remains to be obtained. Indeed, in

order to attain increased social capital, individuals need to demonstrate their knowledge, skill set or expertise to peers. If my view of pride is correct, this emotion should act as a motivator, impelling individuals to engage in behaviors that communicate to others expertise in the domain of the previous success. Study 1 tested this hypothesis directly by giving participants the opportunity to share knowledge regarding a previously completed task that, for target participants, was the source of pride.

Method

Participants

66 undergraduate students from Northeastern University (39 female; mean age = 19) participated in exchange for partial fulfillment of course credit. Participants participated individually and were randomly assigned to either the pride condition or the control condition.

Procedure

Upon arriving at the lab, participants were informed that they were participating in a study of verbal and spatial abilities. The experimenter explained that the participant would be completing various tasks that were in the process of development. Thus, the participant would be asked to complete the tasks and then fill out a variety of questions designed to obtain their opinions on the tasks. This cover story was utilized to allow for the discreet, unobtrusive measurement of emotional states and other dependent measures.

To begin the study, participants turned to a PC to complete the first task, which was presented as a measure of verbal ability and called the Word Associates Task. Items in this task were adapted examples of the Remote Associates Test (RAT; Harkins, 2006; Mednick & Mednick, 1967). The RAT asks participants to view sets of three words (e.g.,

washer, shopping, and pane) and come up with a fourth word that is conceptually related to each of the three stimulus words (*window*). Via pre-testing, the Word Associates Task was designed to contain 8 sets of words that had relatively easy solutions (i.e., solution rate during pre-testing > 75%; see Appendix A for a list of items and their solutions). Each set of words was presented on the screen for up to 45 s. If a solution was entered, participants were taken to the next set of items. If no solution was entered in the allotted 45 s, a screen appeared that notified participants that they were out of time. They were asked to enter a solution, or if they could not think of anything, to enter “none,” at which point they were taken to the next set of words.

After the eighth and final item, participants were told that a computer in the adjacent control room was calculating their score on the Word Associates Task. They were informed that their score would be based not only on the accuracy of their answers, but response times for each item as compared to response times of previous participants. In this way, participants could not estimate with certainty their level of performance on this task, thus allowing for successful delivery of the performance feedback in the pride induction (see below).

Participants were then instructed to go to the control room to get the next task from the experimenter. The true purpose of this interaction was to allow for the manipulation of the independent variable. At this point, participants assigned to the pride condition received the pride induction (see below) before obtaining the next task and returning to the main room; those in the control condition were simply given the next task before returning.

The next few tasks were tasks included in the design to maintain the cover story given at the start of the session. Participants completed another innocuous verbal task (i.e., letter preference ratings) and a spatial task (i.e., a short series of mental rotation tasks). Performance on these tasks was not of interest and will not be discussed further.

After the secondary verbal and spatial tasks, participants completed an evaluation of all tasks completed during the session. Among filler questions regarding instruction clarity and presentation style of the tasks, participants responded to items that comprised the manipulation check of the pride induction as well as other dependent measures of interest (see below).

Participants were then presented with a screen announcing that all requirements of the session had been completed. Only after the participants believed that they were not required to do anything further was the primary dependent variable of interest measured.

The next screen presented the following text:

We are interested in how to encourage better performance among future participants. In particular, we plan on using the Word Associates Task (i.e., the first verbal task you completed) in future studies. We have found, though, that the Word Associates Task can be difficult to understand at first. It can be helpful to read through the techniques used by other participants.

If you would be willing to type out some of the techniques you used to complete the Word Associates Task, please click "Yes" below. If not, click "No."

If participants indicated "yes" they were taken to a screen where they could type the techniques used to complete the Word Associates Task. This screen included the following instructions:

Please describe below the techniques you used to solve the Word Association Task (i.e., the first task you did). Feel free to use examples, as future participants will be using different sets of items. Use as much detail as you feel necessary. When you are done, click "continue."

If participants indicated “no,” or once those who said “yes” had completed the writing portion, they filled out a suspicion check⁵ and were subsequently dismissed.

Manipulations and Measures

Pride manipulation. As noted, the pride manipulation occurred in the control room after the Word Associates Task had purportedly been scored. For participants in the pride condition, the experimenter casually drew a sheet of paper out of a printer, and said, “I printed this to show you how you did on that first task. You got a score in the 94th percentile—great job! That’s one of the highest scores we’ve seen!” As she made these comments, she pointed to an official-looking score sheet that included a graphical image and numerical calculations indicating the participant’s supposed high score. The experimenter used nonverbal cues (e.g., voice intonation and smiling) to convey that she was truly impressed with the level of performance that the score indicated. Importantly, this induction has been shown to induce a discrete state of pride that is distinct from simple positive affect (Williams & DeSteno, 2008). After the feedback was given, the experimenter set the score sheet aside and presented the next task on a clipboard. She announced that the participant should return to the main room, read the instructions presented on the sheet, and complete the task before turning back to the PC.

In the neutral condition, efforts were made to equate the amount of time spent and interaction with the experimenter as in the pride condition. The experimenter said, “Ok. So, you are done with the first task. Let me get the next task for you out of this cabinet. One second.” As she said this, she retrieved a sheet and a clipboard from a cabinet and

assembled them before delivering the rest of the instructions regarding the subsequent task.

Manipulation checks. Participants indicated how they were currently feeling on 7-point scales anchored by “not at all” and “completely” in reference to several descriptors. To measure pride, participants responded to a single-item scale on which they rated how proud they felt. While other empirical studies have used more extensive measures of pride (Tracy & Robins, 2007b; Williams & DeSteno, 2008), a single-item measure was chosen for this study to reduce potential contamination of data from participants guessing the true nature of the study. Maintaining the integrity of the cover story was important, as the primary dependent measure occurred at the very end of the session. To measure positive mood as an alternative mechanism, participants also rated how happy they felt on the same scale.

To measure differences in perceptions of relative performance, participants also were asked to estimate how well they believed they performed on the Word Association Task in comparison to others. Responses were recorded using a 7-point scale anchored by “not at all” and “completely”.

Knowledge sharing. The primary dependent variable in this study is the likelihood and amount of effort spent sharing techniques on a task that was a source of pride for those in the pride condition. To measure knowledge sharing, participants’ dichotomous decision to engage or not to engage in knowledge sharing was recorded. If participants chose to write, the PC also recorded the text of what was written as well as the total amount of time spent writing.

Results

As expected, the pride manipulation proved to be successful; participants in the pride condition reported feeling more pride ($M = 4.73$, $SD = 1.13$) than did those in the neutral condition ($M = 3.70$, $SD = 1.13$), $t(64) = 3.71$, $p < .001$, $d = 0.93$. As expected, and as evidenced in past research (Williams & DeSteno, 2008), participants in the pride condition evidenced significantly higher levels of subjective relative performance ($M_{\text{pride}} = 5.94$, $SD = 0.70$, $M_{\text{control}} = 4.39$, $SD = 1.30$), $t(64) = 6.01$, $p < .001$, $d = 1.50$, as well as higher levels of happiness than those in the control condition ($M_{\text{pride}} = 4.76$, $SD = 0.87$, $M_{\text{control}} = 4.18$, $SD = 0.77$), $t(64) = 2.85$, $p < .001$, $d = 0.71$.

Turning to the primary dependent measure of interest, did participants in the pride condition engage in knowledge sharing more often than those in the neutral condition? Data failed to support this hypothesis; approximately one third of the participants in both conditions decided to engage in the technique sharing task, $\chi^2(1, 66) = 0.61$, $p > .05$. Even so, it is possible that participants in the pride condition expended more effort on the technique-sharing task, despite being no more likely to do so. That is, a dichotomous measure of choosing to help may obscure more fine-grained differences in effort, especially given that the task itself (i.e., providing information on how one solved the items in the Word Associates Task) did not appear to be especially taxing. Two measures of effort expenditure were obtained: time spent on the task and number of words entered. While conditional differences were not significant ($ts < 1$), trends in the predicted directions were observed for time spent ($M_{\text{proud}} = 46$ s, $SD = 90.40$; $M_{\text{control}} = 29$ s, $SD = 48.47$) and word count ($M_{\text{proud}} = 21$ words, $SD = 31.67$; $M_{\text{control}} = 14$ words, $SD = 23.56$).

These analyses, however, fail to account for the possibility that pride may vary within condition. Indeed, participants in the neutral condition were not given any information on their performance on the Word Association Task. It is plausible that some participants gleaned pride from estimating how well they may have done. As opposed to tasks used in the past (Williams & DeSteno, 2008), the present study utilized a task that likely allowed easier estimations of actual performance in the absence of performance feedback. For instance, even though a participant couldn't know the base rate of response, she could be sure of whether she entered a response and could also estimate the likelihood of her response being correct or incorrect (e.g., being quite certain about the response as opposed to guessing). So, while participants knew their score was also based on response time as well as accuracy, it is probable that they had a decent sense of their performance. Among those who may have been confident in their performance on the task, many may have derived a sense of pride without explicit feedback (see Introduction for discussion of self-reflective pride). Supporting this suspicion, many participants in the neutral condition reported levels of pride above the middle range of the scale ($N = 7$). To examine the impact of such variability in pride, a series of regression analyses were conducted predicting key outcome variables (i.e., effort expended measured in time and quantity) from reported intensity of pride.

Both analyses provided support for the view that increasing pride lead to increasing efforts at sharing expertise. Pride was a significant predictor of word count, $\beta = .25$, $t(64) = 2.04$, $p = .05$, $R^2 = .06$. Pride was also a marginally significant predictor of time spent providing information on employed techniques, $\beta = .23$, $t(64) = 1.90$, $p = .06$, $R^2 = .05$.

As mentioned, the construct of pride is highly correlated with other psychological constructs that stand as alternative explanations for this pattern of results. Namely, it could be argued that participants expended more effort on the task due to cognitive awareness of high relative performance or due to generalized positivity (cf. Williams & DeSteno, 2008). Notably though, while measures of alternative mechanisms such as subjective relative performance and positivity do correlate highly with reported pride intensity⁶, they fail to predict these outcome variables, $\beta_s < .10$, $t_s < 1$.

Discussion

Study 1 tested the hypothesis that pride motivates behaviors aimed at demonstrating acknowledged expertise or knowledge to peers. After a manipulation of pride, target participants were given the opportunity to engage in a knowledge sharing task. Results demonstrated that although proud participants were no more likely to engage in the task, once engaged these participants exerted more effort both in terms of amount of time and amount of words written.

Why did the manipulation fail to produce changes in the rate of engagement in the knowledge sharing task (i.e., the rate of decisions to choose to write techniques used on the initial task for future participants)?⁷ I believe that, while there are many potential explanations of this, the three most likely candidates are methodological in nature.

The first has to do with the intensity or impact of the pride induction in relation to the nature of the knowledge-sharing task. While the induction is designed to be of as high impact as possible while remaining believable to participants, there is an inherent limitation in the intensity of pride that such a non-tailored induction can achieve. The domain in which the success occurred was the same for every participant (i.e., verbal

abilities). Some participants may have low identification with success in this domain, and thus derive lower levels of pride from that success as opposed to other participants who might be highly identified in this domain. A manipulation with the most impact would include successful feedback in a domain in which a particular participant feels strongly identified (e.g., athletics for one participant, spatial abilities for another, and interpersonal skills for yet another). However, such a paradigm would be methodologically impractical and would pose difficulties in generalizability and interpretation of resulting data (e.g., are the effects due to pride in general, or pride in specific domains?). Therefore, while the present paradigm has its limitations, it strikes the best balance between practicality and impact.

Secondly, given that participants believed that they had completed all required aspects of the study, there was likely a low level of motivation to volunteer to do yet another task in the lab setting. It is possible that the manipulation was not of sufficiently high impact to impel individuals to overcome this motivational barrier. Indeed, the knowledge-sharing task requires a significant amount of personal risk and investment of resources, and thus requires a fairly high level of motivation for engagement. Participants were faced not only with an opportunity to leave the study with more resources in terms of time and cognitive effort if they choose to not to write, but they also weighed the risk of writing something that would not in fact be beneficial to future participants and might have experienced unease from assuming such a risk. When these two limitations are considered simultaneously, it is not surprising that that the pride induction was sufficient to impel participants to engage in this task above and beyond the base rate of engagement observed in the control condition. It is worth noting here,

however, that once engaged in the task, participants with high levels of pride, stemming at least in part from the manipulation, expended more effort on the task.

To address these issues and better get at the mechanisms of pride in interpersonal situations, the design used in Study 2 did not allow participants a choice in whether to engage or not; all participants engaged in a group activity.

The third likely explanation for why the manipulation of pride did not affect propensity to engage in the knowledge-sharing task has to do with the nature of the knowledge requested. While many skills allow for explicit descriptions of techniques used, perhaps many participants did not feel as if they could effectively verbalize the process by which they arrived at solutions to the Word Associates Task. The Remote Associates Test, on which the present task was based, is frequently described, and in fact originally designed, as a test of creativity (Mednick, 1968) or insight (Harkins, 2006). It could be difficult for participants to articulate techniques related to something as abstract as creative skill, which is often punctuated by insight. To the extent that participants do not feel confident in articulating the skill, they will not feel compelled to attempt to write such techniques for the use of future participants, regardless of emotional state. Thus, for Study 2, the pride-inducing task was changed to a task that included more concrete skills of which participants would have a better sense of utilized techniques. In addition, by allowing participants to work on a physical puzzle, Study 2 reduced the need for explicit verbalization in order to demonstrate domain-specific knowledge to or share recognized skills with others.

Despite these methodological concerns, Study 1 provides initial evidence for pride's potentially causal role in motivating increased effort and resource expenditure

towards sharing knowledge related to the source of the pride. This provides preliminary support for one of the two functions of pride proposed presently; pride functions to motivate behaviors geared towards acquiring or demonstrating valued skills to others. Once engaged in an opportunity to share task knowledge or expertise, proud individuals are compelled to expend more effort to make their skills known to peers.

While not a major concern, I acknowledge that the knowledge-sharing task used in Study 1 was not truly interpersonal in strict terms (i.e., participants did not actually engage with the targets of the sharing). The most compelling argument for expertise sharing would be evidenced in an actual interpersonal setting, where proud individuals engaged in real-time interaction with others. The aim of Study 2 was to create just such a situation, modify the design to avoid the limitations of Study 1 discussed above, and further test the proposed functional view of pride.

Study 2⁸

Thus far, preliminary support has been garnered for one of the two main functional roles of pride I have set forth; namely, pride guides behaviors aimed at pursuing valued goals (Williams & DeSteno, 2008) and at demonstrating to others the skills associated with the source of the emotion (Study 1). Limitations regarding Study 1 exist, including the nature of the task used to induce pride and the setting in which the outcome measures were observed. As discussed above, Study 2 was designed with these limitations in mind; paradigmatic and methodological changes were instituted to help alleviate the concerns and limitations posed by Study 1.

Additionally, the second proposed role of pride regarding signal value remains to be tested. Namely, does pride signal situation-specific information to others and lead to

preferential impression formation? If the logic holds, pride, as indicative of valued success, should stimulate bestowal of increased social capital from peers.

Indeed, social psychologists have demonstrated that successful (Carlston & Shovar, 1983) and task-engaged (Stang, 1973) individuals are desirable peers. The key to this puzzle appears to be projected competence; both male and female leaders that exhibit competence are rated as interpersonally attractive (Rhue, Lynn, & Garske, 1984). Actual competence is not required; portraying competence appears to be effective in attaining influence (Anderson & Kilduff, 2009), at least initially. Evolutionarily, this makes sense. It is most adaptive to seek proximity to and affiliate with individuals who offer skills of high value to the group. Signaling the possession of valued skills should be effective in garnering social capital for such experts in so far as these signals are found to be valid reflections of ability. These signals can take the form of demonstration of skills, explicit announcement of such skills, or much more subtle nonverbal cues conveying dominance in the situation at hand. To the extent that these skills are seen as valued and genuine, peers should readily allow such skilled individuals to adopt leadership on related tasks and also lend them status for both having the necessary skills and impetus to execute them. As argued above, pride may play a crucial role in this process, as it drives goal-related behaviors and directs efforts at demonstrating success-related skills to peers (Williams & DeSteno, 2008; Study 1, present research).

Study 2 was designed with two main goals in mind. First, the paradigmatic and methodological concerns with Study 1 were addressed. As described above, previous paradigms cannot fully claim interpersonal functionality for pride, because the outcome behaviors were observed in the absence of peers. While pride should guide behaviors in

both intra- and interpersonal settings according to my view of this emotion, direct evidence of such effects is necessary; Study 2 invokes a live, interpersonal interaction in order to observe key constructs. Both the induction-related task and the outcome task were also modified to address limitations associated with the nature of these tasks.

Second, Study 2 tests potential differences in perceptions of proud vs. non-proud individuals by interaction partners. Thus, the paradigm allows groups of individuals to rate each other on various dimensions after interacting on a cooperative task. In this way, interpersonal impressions of proud and neutral individuals were obtained.

Study 2 builds off of the previous work by introducing pride into a live cooperative interaction with peers and testing the two main functional roles of pride outlined above. I expect that individuals led to feel proud about a related performance will exhibit behaviors indicative of higher status or dominance (i.e., they will exert leadership over the task, demonstrating their domain relevant skills). I also predict that these individuals will have higher social capital, operationalized here as interpersonal liking, bestowed upon them by their interaction partners.

Method

Participants

Sixty-two undergraduate students from Northeastern University (48 female; mean age=19) participated in exchange for partial fulfillment of course credit. Participants completed the study in same-sex dyads in which one participant was randomly assigned to the pride condition and the other to the neutral condition.

Procedure

Upon arriving at the lab, participants were informed that they were one of three individuals completing the experiment. In reality, the third “participant” was a confederate blind to the hypotheses of the study. Gender of the confederate matched gender of the participants (i.e., groups consisted of two female participants and a female confederate or two male participants and a male confederate).

At the start of the experiment, all three individuals were seated at individual PCs and given an overview of the tasks they would complete. The cover story given to participants was that the study was investigating individual differences in spatial-cognitive tasks. The experimenter also informed participants that the purpose of the session was to obtain scores on and evaluations of related spatial tasks that were in the process of development. They would complete both individual and group tasks and subsequently be asked questions regarding their perceptions of themselves and of the other participants.

Participants then turned to their PCs to complete the first task, which was presented as a measure of visuospatial ability. This task consisted of 15 mental rotation exercises. Participants had to decide whether two images of three-dimensional objects were identical (i.e., the same objects only oriented differently in space; see Appendix A for a sample set of images). They were told that the computer would calculate their score based both on the accuracy of their responses and their response times as compared with the speeds of participants who completed the task previously. Consequently, participants were not able to estimate reliably how well they performed.

After all participants had finished this task, the experimenter announced that individual calibrations of visual acuity were necessary and, to maintain privacy, would be

completed in the adjoining room individually. Once in the separate room, participants were seated in front of a computer and asked to perform a 10 second spatial eyesight test (i.e., a macular degeneration screening). The true purpose of this “calibration” was to allow for the manipulation of the primary independent variable. At this point, participants assigned to the pride condition received the pride induction (see below) before returning to the main room; those in the control condition simply completed the screening before returning. Once all of the three individuals finished the calibration, they completed an “evaluation” of the mental rotation exercise. In addition to filler items asking about image quality and instruction clarity for the first task, this evaluation included the manipulation check for the pride induction (see below) as well as other measures of dependent variables.

The experimenter next provided instructions for the second task. Participants relocated their chairs around a square table in the middle of the room. The experimenter informed them that the task would require the group to work together on a three-dimensional puzzle and that the group would receive a score based on their progress towards the solution. The puzzle was presented as a cube, which the experimenter unwound into a single rod of smaller adjoining cubes. To solve the puzzle, participants would have to bend and rotate the individual adjoining pieces of the rod to reform them back into the large cube. Of import, this task appeared quite similar to the mental rotation tasks that participants had completed individually on the PCs; in that task, the presented three-dimensional objects all consisted of adjoining cubes bent and rotated in different ways (see Appendix A for a sample mental rotation set and an image of the puzzle). The experimenter also turned on a video camera located over the confederate’s

shoulder and facing the participants, noting that its use was to get a transcript of the ensuing conversation. The group was told to do their best to ignore the camera and also told that they were not being watched as they did the task. Each group was given 6 minutes to work on the task. Confederates were trained to interact consistently for all groups and to touch the puzzle for approximately 1 minute total. At the end of the allotted time, participants returned to their computers and filled out an “evaluation” of this task, which included subjective ratings of their group partners (see below).

Participants were then dismissed.

Manipulations and Measures

Pride manipulation. As noted, the pride manipulation occurred individually as part of the “calibration” for visual acuity. Each participant was alone with the experimenter at the time of the manipulation and out of earshot of the other participants. For participants in the pride condition, the experimenter casually pulled three sheets of paper out of a printer, shuffled through them, and said, “I just wanted to show you how you did on that first task. You got a score in the 94th percentile—great job! That’s one of the highest scores we’ve seen!” As she made these comments, she pointed to an official-looking score sheet that included a graphical image and numerical calculations indicating the participant’s supposed high score. The experimenter used nonverbal cues (e.g., voice intonation, smiling) to convey that she was truly impressed with the level of performance that the score indicated. Participants in the neutral condition were simply asked to return to the lab once they had completed the calibration check. To maintain consistency, confederates entered the control room with the experimenter, waited the appropriate amount of time, and then reentered the lab. Importantly, this induction has been shown to

induce a discrete state of pride that is distinct from simple positive affect (Williams & DeSteno, 2008).

Manipulation checks. Participants indicated how they were currently feeling on 7-point scales anchored by “not at all” and “completely” in reference to several descriptors. Level of felt pride was calculated as the mean response to the items: proud, confident, satisfied, fulfilled, accomplished, successful, achieving, productive, and full of self-worth ($\alpha = .93$, cf. Tracy & Robins, 2007b; Williams & DeSteno, 2008). In this study, a larger set of manipulation check items were used to increase both the reliability and validity of the assessment of pride intensity. To measure differences in subjective ability, participants also were asked to estimate how well they believed they performed in comparison to others. Level of generalized positivity was assessed by calculating the mean response to the following items: happy, good, pleasant, and content ($\alpha = .91$).

Dominance. Dominance was measured in three ways. The first measure was based on objective behavior. Given that solving the puzzle required active manipulation of its pieces, a trained coder blind to condition and hypotheses viewed each video clip and recorded the total amount of time each participant manipulated the puzzle using a stopwatch. The other two measures involved subjective assessments of dominance. For the first, we utilized participants’ ratings of each other in reference to the group interaction. As part of the second “evaluation,” each person completed ratings of their two interaction partners with respect to individual items measuring subjective dominance, leadership, contributions, ability, and relative time spent talking and listening during the puzzle completion. These items were averaged to form an index of subjective dominance ($\alpha = .80$). Finally, we obtained a second measure of subjective dominance from two

individuals who did not take part in the experiment and, thereby, would not be subject to any self-presentation concerns about rating others as more dominant than the self. These individuals were drawn from the same population as the primary participants and were blind to both the purpose of the study and the conditions of the participants. Each rater was simply asked to view each 6-minute video clip and provide a rating (using a 7-point scale) for the dominance level of each individual in the respective dyads ($\alpha = .78$).

Liking. As part of the post-puzzle evaluation measure, participants also completed ratings of their two interaction partners with respect to their level of liking for each. Specifically, they were asked how much they (a) liked the person, (b) would want to work with the person again, and (c) enjoyed the interaction with the person. These three items were averaged to form an index of interpersonal liking ($\alpha = .84$).

Results

Given that participants were nested within dyads, all statistical analyses utilize techniques appropriate for nested data. All reported t values stem from paired t-tests and all reported regression coefficients stem from multilevel models in which participant-level data is nested within dyadic groupings.

As expected, the pride manipulation proved successful; participants in the pride condition reported feeling more pride ($M = 4.78$, $SD = 1.09$) than did those in the neutral condition ($M = 3.73$, $SD = 1.02$), $t(30) = 3.47$, $p = .002$, $d = 1.00$. Replicating the pattern found in Study 1, participants in the pride condition reported higher levels of subjective relative performance ($M = 5.00$, $SD = 1.24$) than their neutral counterparts ($M = 3.26$, $SD = 1.29$), $t(30) = 6.35$, $p < .001$, $d = 1.38$. A similar pattern was observed for intensity of

general positive emotion ($M_{\text{pride}} = 4.85$, $SD = 0.90$, $M_{\text{control}} = 4.19$, $SD = 1.01$), $t(30) = 2.63$, $p = .013$, $d = 0.70$.

Confirming predictions, proud participants also evidenced greater dominance within the context of the group problem-solving task. They spent more time manipulating the puzzle ($M = 192$ sec) than did neutral participants ($M = 145$ sec), $t(30) = 2.18$, $p = .04$, $d = 0.66$. They were also perceived as more dominant by their partners (i.e., neutral participants, $M = 4.61$) than were neutral participants as rated by their proud partners ($M = 4.30$), $t(29) = 1.86$, $p = .07$, $d = 0.50$.⁹ Confirming this perception, proud participants were also judged to be more dominant by third-party observers ($M = 4.31$) than were neutral participants ($M = 3.48$), $t(30) = 2.56$, $p = .02$, $d = 0.66$. Of high import, dominance was attributable specifically to pride; time spent manipulating the puzzle was directly predicted by pride intensity, $b = 16.31$, $t(60) = 2.06$, $p = .04$, but not by positive mood or self-efficacy (i.e., participants' subjective assessments of their level of relative performance on the task).¹⁰

Finally, our primary hypothesis regarding the social attractiveness of an individual exhibiting authentic pride also received support. As shown in Figure 1, individuals experiencing pride were more liked by their partners ($M = 5.25$) than were individuals in the neutral condition ($M = 4.74$), $t(30) = 2.53$, $p = .02$, $d = 0.93$. In order to demonstrate that this effect stems from differential perceptions by participants in the neutral condition, we also compared liking for participants in both conditions to liking for the confederate as rated by the participants. As readily seen in Figure 1, neutral participants demonstrated enhanced liking for the proud participant ($M = 5.25$) as compared to the confederate ($M = 4.89$), $t(30) = 2.71$, $p = .01$. Proud participants, however, did not

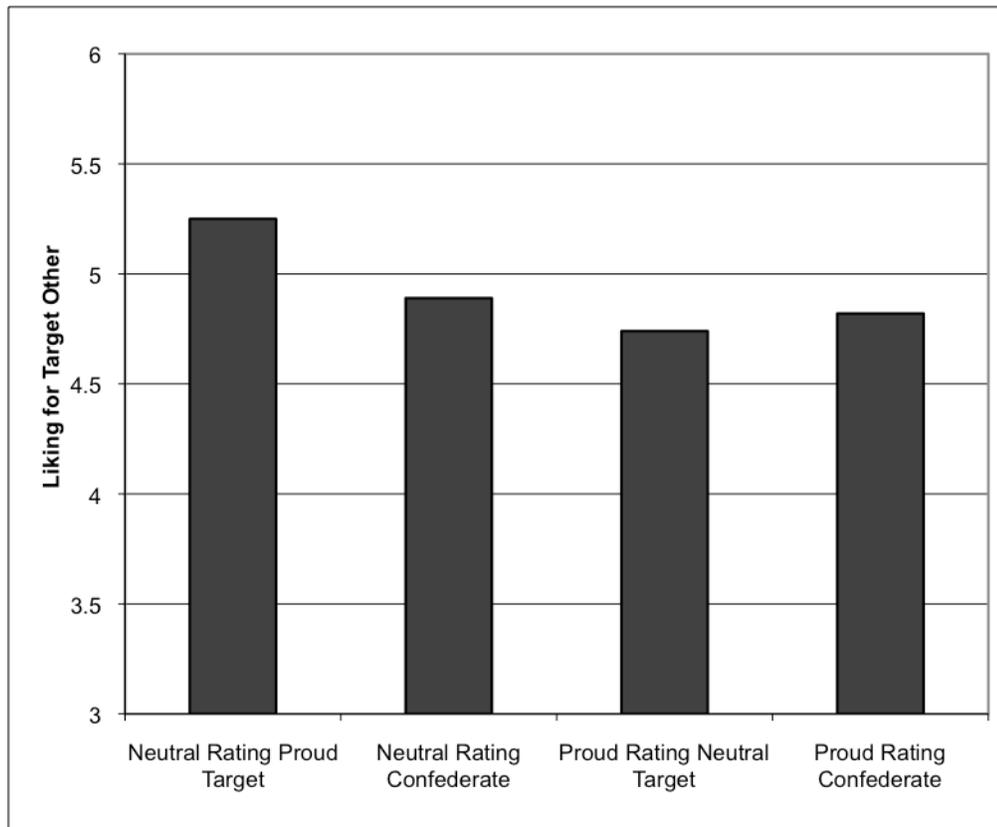


Figure 1. Liking for interaction partners as a function of target identity and emotion condition. Higher numbers indicate increased liking.

evidence any differential liking between neutral participants and confederates ($M_{\text{control}} = 4.74$), $M_{\text{confederate}} = 4.82$, $t < 1$, thereby confirming that differences in amount of liking reflect an enhanced attraction of neutral participants to partners experiencing pride.¹¹

This finding also demonstrates that liking is not a simple function for effort expended on the task, as proud individuals did not show any differential liking for the neutral participant and confederate, even though confederates always exerted lower effort than neutral participants in terms of time (as dictated by their interaction guidelines to touch the puzzle for approximately one minute).

Discussion

Study 2 provided a further test for the interpersonal, functional view of pride. Namely, Study 2 tested whether pride leads individuals to take on leadership roles in a group setting and also explored the effects of pride on impression formation in terms of dominance and interpersonal liking. When proud individuals interacted with peers on a cooperative task, they evidenced higher levels of behavioral dominance (i.e., leadership) and were rated as more dominant by their partners. The hypothesis regarding interpersonal liking was also supported: proud individuals were rated as the most likeable partners in the group context.

Taken together, the findings of Study 2 are quite noteworthy. They are the first to demonstrate functional outcomes of pride within the context of actual social behavior and interpersonal perception. In the current paradigm, pride not only led to increases in motivated behaviors to exert leadership over a cooperative, domain-relevant task, but also to gains in status and social capital as granted by peers. Thus, the two functional roles of pride outlined in the introduction are supported empirically; (1) pride guides and organizes behaviors aimed at attaining and demonstrating to peers valued skills, and (2) pride and the behaviors it brings about have signal value to others that serve to enhance social status and garner the proud individual social capital.

General Discussion

The present work provides theoretical justification and empirical support for a dually functional role of pride. As outlined in the introduction, pride is deserving of a position among other psychological mechanisms, and emotions in particular, in the human repertoire that play crucial roles in the successful navigation of the social

environment. Pride provides individuals incentive to pursue goals that lead to gains in social capital; without such gains, individuals might find it difficult to become valued, respected members of groups. This emotion and associated behaviors also signal achievement to others, so that such gains in status and interpersonal attractions manifest themselves in situations of success.

Across two studies, empirical support was provided for these two roles of pride. After receiving an interpersonal induction of pride, target participants evidenced increased effort at demonstrating skills related to the source of the pride to peers (Study 1), and higher levels of leadership in an interpersonal setting (Study 2). Study 2 also showed that individuals feeling proud convey signals to peers that increased status and liking are merited. Peers pick up on such signals and lend proud individuals boosts in social capital.

To my knowledge, the present studies stand alone in their analysis of pride's role in directing interpersonal behaviors. While the methodology is complex and the induction of the emotion requires in-depth paradigms, the studies presented here provide compelling evidence in their observation of *actual* behaviors evidenced in *live* interpersonal situations and interactions. Causality has been demonstrated methodologically and statistically, supplying ample support for confidence in pride's role in the observed outcomes. Both Studies 1 and 2 rule out alternative mechanisms to pride such as positivity and self-esteem; a unique role for pride has been shown above and beyond psychological constructs known to play a role in similar situations.

While the present studies make great strides in adding to the corpus of knowledge regarding social and self-conscious emotions, functionality of emotions, and

interpersonal interactions, limitations exist. Findings are limited in their ability to speak to questions relating to potential individual, gender, cultural and age-related differences in the experience and outcomes associated with pride. The present data do not address potential maladaptive outcomes of pride, though this is a topic worthy of exploration. In addition, the applicability of these findings in translational (e.g., clinical or health) settings has not yet been explored. Each of these topics is discussed in turn below, including a full discussion of the topic as well as possible applications or future directions for the current topic of study.

Individual Differences in the Experience and Outcomes of Pride

While there are many psychological processes that are universal to humans and even occur across species, individual and cultural differences arise in most all such processes. Regarding emotions, reliable individual differences have been found for tendencies to focus on valence or arousal (Feldman, 1995), emotional intelligence (Gohm, 2003), and self-regulatory abilities (Gross & John, 2003), among others. With respect to discrete emotions, there is growing support for the idea that while most individuals experience emotions that can be labeled similarly, the ways in which those emotions are experienced differ greatly between individuals. Even though non-basic emotions have only fairly recently received interest, individual differences have been established for tendencies towards empathy (Karniol & Shomroni, 1999; Mehrabian, Young, & Sato, 1988) and gratitude (McCullough, Tsang, & Emmons, 2004).

Tangney and colleagues (see Tangney, 1990) have examined “proneness” to particular self-conscious emotions, including shame, guilt and pride. In developing an individual difference measure of self-conscious affect (TOSCA, Tangney & Dearing,

2002), it has been hypothesized that individuals do indeed vary in their propensities to experience the different forms of pride (i.e., *authentic* or *beta* pride and *hubristic* or *alpha* pride). Empirically, however, reliable individual differences in pride proneness have proven to be elusive. There are some data identifying different personality correlates for individuals considered to be prone to authentic pride vs. those who are prone to hubristic pride, however, these data don't speak directly to the differences in experience and outcomes associated with varying on this dimension (Tracy & Robins, 2007d).

Continued efforts to establish when and how individual differences in the propensity to experience pride are likely to be fruitful. Such findings could provide a useful avenue to examine in more detail the patterns of behavioral findings found in the present studies. Are pride-prone, and more specifically authentic pride-prone, individuals more likely to evidence the positive interpersonal outcomes associated with pride? At a very basic level, are pride-prone individuals as likely as non-pride-prone individuals to react to the pride-eliciting situation utilized in this research?

Another line of research directly related to individual differences in the experience and related outcomes of pride focuses on personality differences in self-regulation. Grant and Higgins (2003) found that personality differences regarding regulatory focus (e.g., promotion or prevention focus) lead to differences in the way in which pride is experienced. Promotion-focused individuals orient towards the presence or absence of positive outcomes whereas prevention-focused individuals mainly attend to the presence or absence of negative outcomes. According to Grant and Higgins (2003), individuals will experience pride differently depending on their trait regulatory focus style; feelings of pride in promotion-focused individuals lead to a sense of eagerness

while feelings of pride in prevention-focused individuals lead to a sense of vigilance. An individual's experience with prevention or promotion successes leads to motivations in each respective way: those with a history of promotion pride approach new tasks in an eager way while those with a history of prevention pride do so vigilantly (Higgins et al., 2001). While these findings are intriguing, the applied definition of pride moves away from one of a discrete emotional state and towards a disposition that relates to achievement motivation. Conclusions may be valid for this type of definition, but they fall short of describing individual differences in the experience of state-dependent emotional pride. Even so, the functionality of pride may differ for individuals with each regulatory style. In their eager approach, promotion focus individuals may experience pride's interpersonal outcomes. Alternately, prevention focused individuals might display more outcomes relating to the intrapersonal functions of pride. A highly promising avenue of future research is to examine trait regulatory focus as a moderator of the relationships evidenced in the present studies.

Gender Differences in the Experience and Outcomes of Pride

One of the strongest stereotypes regarding psychological differences between men and women holds that women are more emotive than men. It is classically thought that women experience emotion more often and with higher intensity than men. Extensive examination of this topic (Brody & Hall, 1993; Hall, Carter, & Morgan, 2000; Manstead, 1992) has indeed revealed that men and women differ significantly and reliably in experiences of emotion.

Given the nascent state of pride-related psychological research, it is not surprising that little research on pride has investigated potential gender differences regarding pride

in particular. Studies that compared males and females on propensity to feel pride have failed to find differences between genders.¹² In an investigation of responses to success at difficult tasks among children, Lewis, Alessandri, and Sullivan (1992) found that girls and boys were equally likely to respond to a difficult success with pride. Tracy and Matsumoto (2008) failed to find any differences in the likelihood of male and female athletes to display the nonverbal behaviors associated with pride after a competitive win. In other studies looking at manipulated pride and self-reported tendencies to feel pride, no information on gender differences was reported, so it is likely safe to assume that systematic differences were not obtained (Tracy & Robins, 2007; Webster et al., 2003). Such null findings, however, only speak to the antecedents and experience of pride among men and women, and not to potential differences in behaviors evidenced by each gender once proud.

Since, to my knowledge, my previous work and the studies presented here stand alone in their analysis of pride's role in generating behaviors in intra- and interpersonal settings, I can claim that no systematic evidence exists to show differential functional roles of pride for men and women. In the research I have presented here and in earlier studies (Williams & DeSteno, 2008), gender consistently fails to play a role in the causal relationship between pride and outcome behaviors. For example, men and women are equally likely to persevere at a tedious goal once feeling proud and are equally likely to display leadership behaviors in a group setting when feeling proud.

A caveat to this, and a topic worthy of future investigation, lies in regard to the specific antecedents of this emotion. Since pride is closely tied to self-concepts and self-representations (Tracy & Robins, 2004a), successful performance on a given task might

be more or less likely to elicit pride if the domain in which that achievement occurred is highly gendered. At least two patterns might emerge. That is to say, females might glean a strong sense of pride from successes in a classically female domain whereas males may tend to derive pride from classically male domains (e.g., a male is proud of winning a basketball game; a female gleans pride from keeping a clean house). Conversely, it could be the case that males and females feel high amounts of pride when a success occurs in a domain in which their gender is not expected to excel (e.g., a woman derives pride from changing the oil in her automobile; a male is proud due to executing a complicated recipe). Future research should delineate situations in which men and women are likely to experience pride and also explore gender differences in behaviors stemming from such pride experiences.

Cross-cultural Differences in the Experience and Outcomes of Pride

Before turning to potential differences in the experience and outcomes of pride between cultures, it is important to note that there is quite a bit of similarity across cultures. Tracy and Robins (2008) have established that the set of nonverbal cues reliably identified as conveying pride in Western samples (see section on the nonverbal expression of pride in the Introduction) is reliably recognized among highly isolated, non-literate African samples. This is not to say, however, that pride is experienced or viewed equivalently or has similar behavioral outcomes across cultures.

One common dimension along which cultures are classified is collectivist vs. individualistic values. Collectivistic (e.g., Asian or Dutch) cultures are considered to be interdependent and to emphasize interpersonal relations, while individualistic (e.g., American) cultures emphasize independence and self-sufficiency (Markus & Kitayama,

1991). At the heart of these differences lies a fundamental disparity in the way that individuals conceptualize the self (Eid & Diener, 2001; Heine, 2004). It is highly likely that variability exists with regard to the antecedents, experience, and outcomes of emotions that are highly related to self-representations, including pride.

Indeed, many investigations on this topic have yielded data supporting the view that pride has differing elicitors, norms for expression, and frequency of expression between collectivist and individualistic cultures (Eid & Diener, 2001; Rodriguez Mosquera, Manstead, and Fisher, 2000; Scollon, Diener, Oishi, & Biswas-Diener, 2004; Stipek, 1998). Across the board, it seems that members of individualistic cultures describe the elicitors of pride as largely self-oriented, the expression of pride as acceptable, and the frequency of experienced pride to be higher as compared to reports from members of collectivist cultures. It seems that differences regarding how individuals conceive of themselves within their culture have direct implications for the psychological processes associated with self-conscious emotions, and pride in particular.

While this line of research has led to the conclusion that the phenomenology of pride is not invariant, these conclusions are based solely on self-report and may reflect only normative differences and not substantive differences regarding this emotion. Adapting the current paradigm to test actual behaviors among groups and individuals from different cultures would make a large contribution not only to the corpus of knowledge on pride, but also to the literature on cross-cultural differences in emotion.

That being said, the fundamental functions of pride should be largely the same across cultures. If the evolutionary explanation for pride's functionality in intra- and interpersonal settings is valid, there is little reason to expect drastically different

behavioral outcomes between cultures. While culture-specific display rules might affect the signal displayed by proud individuals, for instance, the signal value associated with the emotion should be much the same whether the individual in question is from a collectivist or individualistic culture.

An intriguing question arises when considering the form and function of pride in interpersonal situations involving individuals from more than one culture. Importantly, if individuals from collectivist cultures inhibit feelings and displays of pride, how are they granted status and social capital from individualist peers? What are the dynamics between individuals of different cultures in terms of the perceptions, impressions, and exhibited behaviors associated with pride? This line of research could be illuminating both in answering these questions, but also in its potential to speak to the evolutionary foundations of pride in the status attainment process.

Age Differences in the Experience and Outcomes of Pride

Aging is known to affect a wide variety of psychological mechanisms. Older adults experience declines in working and episodic memory (Nilsson, 2003; Salthouse, 1994) as well as impaired problem solving abilities (Diehl, Willis, & Schaie, 1995). While such cognitive effects of aging are detrimental, the effects of aging on affective and emotional processes appear to be largely positive. Older adults appear to regulate emotion, and anger in particular, better than younger adults (e.g., Gross et al., 1997; Phillips, Henry, Hosie, & Milne, 2006). Increased age is associated with better memory for positively-valenced events and stimuli, a phenomenon called the positivity effect (Mather & Carstensen, 2005), as well as a higher frequency of positive than negative emotions (Chipperfield, Perry, & Weiner, 2003). Also, with regard to affective

forecasting, older adults are less likely to make errors in anticipating responses to gains and losses than younger adults (Nielsen, Knutson, & Carstensen, 2008).

Such universally positive findings for affect and emotion processes in aged adults are brought into question, however, when self-conscious and social emotions are considered. There is reason to believe that self-conscious and social emotions are experienced differently among older adults, and that due to such differences, older adults occasionally act in more socially inappropriate ways.

Von Hippel (2007) has suggested that older adults might evidence higher levels of socially inappropriate behavior (e.g., prejudicial behaviors, inappropriate disclosure of personal detail) due to lowered executive functioning, which has been well-documented among older adults (e.g., Andrés, Guerrini, Phillips, & Perfect, 2008; Dempster, 1992). It is possible, however, that such inappropriate behaviors stem *also* from older adults' reduced capacity to experience social and self-conscious emotion. Research has demonstrated that Theory of Mind (ToM) capacities become more limited with increased age (Bailey & Henry, 2008; Maylor, Moulson, Muncer, & Taylor, 2002; Phillips, McLean, & Allen, 2002). ToM is central to successful experience of social and self-conscious emotion, as it allows for successful perspective-taking needed to account for others' reactions to the self (Premack & Woodruff, 1978), which is precisely a requisite ability for the experience of self-conscious and social emotion (Tracy & Robins, 2004a; Hareli & Parkinson, 2008). Thus, if older adults possess diminished ToM capabilities, as they appear to, then it is likely that they also experience self-conscious and social emotions differently (e.g., with less frequency and lower intensity). For pride in particular, this could be socially debilitating. If older adults no longer experience the

motivational push from experiencing this emotion, they are less likely to engage in goal pursuit, skill demonstration, or attain the respect or status that usually comes along with displaying this emotion. This avenue of research is one that I am currently pursuing and might contribute in a significant way to both the field of emotion and aging by illuminating the ways in which the functional role of pride changes over the course of life.

Potential for Maladaptive Outcomes of Pride

While I have made a strong argument here for pride's potentially adaptive role in interpersonal functioning, I have not yet addressed the possibility that in certain cases pride might have negative interpersonal outcomes. Two factors are likely to play a pivotal role in the adaptive vs. maladaptive nature of this emotion: (1) extent of generalization, and (2) features of social context.

The first factor refers to the extent to which the emotion pride is tied to a specific event rather than generalized (i.e., authentic vs. hubristic pride, cf. Tracy & Robins, 2007d). As has been shown here, when pride results from a specific successful event (e.g., performing highly on an ability-assessing task), it guides intra- and interpersonal behaviors in an adaptive way; proud individuals pursue valued goals, exhibit behaviors designed to disseminate knowledge associated with previous success, take on a leadership role in a group setting, and are granted higher esteem in both liking and status by group members. In essence, authentic pride engenders social capital.

The present data, however, do not speak to the interpersonal outcomes of pride that is more hubristic in nature. It is likely, however that this type of pride may not have such tangible positive interpersonal outcomes. Indeed, the psychological literature that

addresses hubristic pride has discussed and demonstrated its association with various negative attributes such as narcissism and lower prosocial orientations (M. Lewis, 2000; Tangney, 1999; Tracy & Robins, 2004a, 2007d).

It is plausible that the key to this distinction between the adaptive role of authentic pride and the maladaptive outcomes of hubristic pride has to do with overextension. Examples of the negative outcomes of overgeneralization of other emotional states abound: overgeneralized fear may lead to anxiety disorders and overgeneralized sadness can precipitate depression. In the case of pride, when the emotion is overgeneralized, or extended past the initial success, the usually positive outcomes may dissolve into negative effects. The strong link between hubristic pride and self-aggrandizing narcissism (Tracy & Robins, 2007d) would support just such an argument.

For example, if an individual is feeling hubristically, rather than authentically, proud, that emotional state may guide interpersonal behaviors akin to those demonstrated in the present study. However, since the emotion did not stem from a justified cause, or a specific success, the interpersonal behaviors observed with regard to authentic pride (e.g., leadership on a group task) may not be viewed in such a positive light. Especially over repeated interactions, peers might note the unjustified nature of associated behaviors and be wary of granting the hubristic individual increased regard or esteem. Hubristically proud individuals consistently risk being “outed” for unsubstantiated assertions of status. Research elucidating the boundary conditions of the adaptive nature of pride with regard to the distinction between authentic and hubristic pride would likely be fruitful.

The second factor that may lead to negative outcomes of pride deals with situational or contextual features. While in general it may be adaptive for pride to guide

interpersonal behaviors, there are likely social situations in which this may not be the case. One candidate for such a situational factor is that of competition. If exerting leadership or dominance in a particular situation is seen as a threat by peers, gains in social capital associated with pride that drives such behaviors are unlikely. In fact, emotional reactions of envy or anger might be elicited among those peers. Take, for example, a student that is proud of performing highly on an exam. Among classmates who did particularly poorly, displaying pride may not be viewed positively. In fact, motivated efforts at dominance and leadership may be received with antipathy. Future lines of research might explore such situational factors; Study 2 presented a cooperative, rather than competitive, task to the group.

In sum, while the present view of pride asserts the *potential* for pride to have positive, adaptive interpersonal outcomes, there are multiple cases in which such outcomes may not obtain. At least in the case of authentic pride that drives behaviors in a cooperative setting, though, the emotion appears to play a functional role that aids in the establishment of social capital. Admittedly, evidence for the boundary conditions of such outcomes is needed.

Translational Aspects of Pride

Applications of this research to health and clinical settings are numerous and potentially highly valuable from a societal standpoint. The present findings could join a variety of other findings from the social psychological literature that have had direct implications for improving viability of adoption of health behaviors (e.g., message framing, Detweiler, Bedell, Salovey, Pronin, & Rothman, 1999).

From a motivational perspective, fostering pride among individuals striving to engage in positive health behaviors might help engender perseverance toward treatment goals and lower attrition rates in treatment programs. For example, doctors, counselors, or clinicians trying to engage patients in healthy dieting programs might strive to elicit pride in incremental steps towards the larger goal (e.g., by giving social acclaim upon benchmark weight-loss goals or small progresses in exercise regimens). Given the strongly interpersonal nature of the functions of pride, such techniques might best be utilized in group settings, where patients can interact with one another, share expertise and skills, and allow one another to gain respect and status in particular domains.

Whether applied to health, clinical, or at-risk populations, approaches that utilize appropriate induction and fostering of pride among participants are likely to have positive effects, both intra- and interpersonally. Specific techniques have yet to be developed, but this promises to be a research domain that potentially has high impact.

Conclusion

All in all, the present work supports a view of pride that is much more virtuous than vicious. Pride serves a key role in the process by which individuals attain valued skills, share those skills with others, and gain merit, status, and social capital for those same skills. Stemming from valued successes, this emotion plays two functional roles. Pride motivates behaviors that lead to goal pursuit (Williams & DeSteno, 2008), expertise-sharing (Study 1), and leadership yoked with interpersonal regard (Study 2). Pride has been shown to be distinct from related psychological constructs, such as self-esteem, self-efficacy, and generalized positive affect. Importantly, in all of the presented findings, pride plays a causal role in driving behaviors and interpersonal perceptions.

This work provides an important piece to the puzzle of elucidating the myriad mechanisms involved in successful intra- and interpersonal functioning, yet also opens doors to numerous and potentially highly valuable veins of research. Future lines of study will help to delineate potential differences in pride's functionality among different personality types, cultures, ages, and genders.

So, what of the negative reputation of pride? While the present studies do not test the delineating factors that might come into play, it is likely, given recent theorizing and empirical evidence (e.g., M. Lewis, 2000; Tracy & Robins, 2007d), that the maladaptive nature of pride stems from hubristic pride. The functional roles of pride as presented may only hold for the type induced in the present studies (i.e., authentic pride). Many questions remain regarding the circumstances and processes by which pride can lead to negative interpersonal outcomes. Even so, it is clear that pride is not to be dismissed as sinful, wholly negative, or to be shunned completely, as it plays a crucial role in positive interpersonal functioning and flourishing.

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Footnotes

¹ Tracy and Robins (2004a) provide a delineation of the details of such cognitive attributions. Stability refers to the permanence of the cause of the success; stable causes are trait-like and generally not under the control of the individual (e.g., intelligence), while unstable causes are state-like and usually controllable (e.g., expended effort). Globality, on the other hand, refers to allocation of causal explanation to the whole self or just to a part of the self. For example, successful performance at a tennis match could be attributed globally (*I am a great athlete*) or specifically (*I am a great tennis player*). Note that both authentic and hubristic pride stem from attributions of an internal cause for successes relevant to self-representations.

² Low self-esteem has been theoretically and empirically tied to discrete emotional states as well. Embarrassment has been suggested and shown to track transient states of low-self esteem (Edelmann, 1987; Modigliani, 1971; but also Keltner & Buswell, 1997). In addition, low state self-esteem has been linked to both sadness and anxiety (e.g., Leary, Tambor, Terdal, & Downs, 1995; Heatherton & Polivy, 1991).

³ Functional accounts do not claim that emotionally-driven responses and outcomes will *always* be adaptive. Indeed, many psychological disorders stem from less-than-optimal emotional responding (e.g., fear responses can become chronic phobias; low level anxiety can morph into anxiety disorders; sadness can evolve into debilitating depression). If emotional responses occur outside of the context in which they originally evolved, it is not necessarily the case that the response will be adaptive. Also, if emotional responses are over-generalized or bleed into responses to similar but not identical situations, as in the case of many mood disorders, normal functioning can be impaired.

⁴ A consistent link has been found between hubristic pride and narcissism (Tracy & Robins, 2007b, 2007d), which backs M. Lewis' theorizing on the potential for negative outcomes of pride. Individuals who tend to experience hubristic pride score highly on personality measures of narcissism (i.e., NPI). Tracy and Robins (2004a) propose a regulatory process that governs this relationship. Narcissists possess high explicit self-esteem but low implicit self-esteem. In trying to maintain positive views of themselves, narcissists pathologically over-enhance successes, which brings about hubristic pride, and disregard failures, which precludes feeling shame. In this light, it is clear that hubristic pride might lead to severely negative outcomes; narcissists tend to be envious, exploitative, lacking in empathy and maladjusted (Fiscalini, 1993).

⁵ Responses to the suspicion check were screened for indication that participants had guessed the nature of the study. Neither did participants in the pride condition mention the manipulation, nor did any participants guess the dependent measure of interest. Most participants repeated a variation of the cover story when guessing what the study was about.

⁶ Pride correlated highly with reported happiness, $r(64) = .47, p < .001$; pride also correlated highly with reported levels of subjective relative performance, $r(64) = .38, p = .002$.

⁷ Using logistic regression analysis, intensity of pride was not a significant predictor of likelihood of engaging in technique sharing, log-odds $\beta = -.27, p > .05$. Thus, neither the manipulation nor levels of pride independent of the manipulation significantly affected the propensity for participants to agree to share techniques for the Word Association Task.

⁸ The results and analysis of this study have been published elsewhere (Williams & DeSteno, 2009).

⁹ Data from one dyad were removed from this analysis because of an aberrantly low dominance score.

¹⁰ The b coefficients examined here refer to the slopes across individuals for regressing time on the potential predictors while controlling for nested dependencies. They stem from a 2-level HLM model in which individual-level data were nested within dyads.

¹¹ In order to verify the presence of an interaction between emotion and target identity on liking, we utilized a 3-level HLM analysis in which likeability ratings for individuals (i.e., partner vs. confederate) were nested within participants, which were subsequently nested within dyads. As expected, results confirmed that neutral individuals, as compared with proud individuals, evidenced greater differences in liking between the two targets, or, put differently, evidenced steeper slopes for the level-1 variable indexing the effect of target identity on liking, $b = -.51, t(120) = 3.39, p = .001$.

¹² Brody and Hall (1993) describe a study evidencing differences between males and females in propensity to feel pride. While Collins and Frankenhaeuser (1978) did demonstrate that male engineering students reported higher levels of subjective performance than female engineering students during a task at which both genders performed equally well, it is not clear that this difference reflects differences in the experience of pride. Indeed, their dependent measure seems more akin to subjective relative performance, or cognitive awareness of efficacy, than pride. In fact, the findings reported by Collins and Frankenhaeuser (1978) fit well with the pattern observed in the present research whereby subjective relative performance does not lead to behavioral differences: despite higher judgments of performance, males did not subsequently perform better. I would guess that if pride were to be the mechanism here, performance differences might have obtained.

Appendix A

Word Associates Task (adapted from Remote Associates Test) from Study 1

Stimulus Sets

Item 1:	Shelf	Read	End
Item 2:	Flame	Light	Birthday
Item 3:	Chocolate-Chip	Fortune	Jar
Item 4:	Shoe	Mail	Tissue
Item 5:	Skate	Cube	Water
Item 6:	Sea	Flu	Home
Item 7:	Sail	Show	Row
Item 8:	Mouse	Blue	Swiss

Solutions

Item 1: Book
Item 2: Candle
Item 3: Cookie
Item 4: Box
Item 5: Ice
Item 6: Sick
Item 7: Boat
Item 8: Cheese

Appendix B

Sample Mental Rotation Images and Snake Puzzle used in Study 2

