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Reflected Appraisal Through a 21st Century Looking Glass

The concept of reflected appraisal—also known as reflected self-appraisal or the looking-glass self—refers to the processes by which peoples' self-views are influenced by their perceptions of how others view them.[1] Reflected appraisal is reflected in the metaphor that people use others as a mirror, i.e. looking glass, for judging themselves, and also in the sense that others' judgments are reflected in self-judgments. The concept refers simultaneously to Person A's self-appraisal and Person A's appraisal of Person B's appraisal of Person A. These appraisals exert reciprocal influence: Self-views affect judgments of others' views, and judgments of others' views affect self-views. In short, reflected appraisal can be viewed as a cycle of mutually influential judgments.[2]

Psychologists, sociologists, and communication scholars have routinely acknowledged the role of reflected appraisal in self-concept development since James (1890), Cooley (1902), and Mead (1934) articulated its importance. The volume of published studies offering direct or indirect evidence for reflected appraisal is overwhelming. Mere correlation between the content of self-views held and social feedback received could be construed as evidence for reflected appraisal, but one need not rely on correlational data to conclude that perceptions of others' appraisals can influence self-perception. Many experiments that have randomly assigned participants to receive social feedback have reported whether self-appraisals changed as a result of such feedback, and a subset of these studies also report perceptions of others' perspectives that may have mediated feedback-induced self-concept change. Such sources of reflected appraisal evidence are often modestly framed as manipulation checks designed to show that feedback had the intended impact. We assume that the volume of published studies offering direct or indirect evidence for reflected appraisal is considerably larger than the already impressive number of

studies that explicitly address reflected appraisal, because researchers now have little incentive to call attention to basic replications of reflected appraisal phenomena that have long been taken for granted.

Reviews of reflected appraisal research have previously been published (e.g., Felson, 1993; Lundgren, 2004; Shrauger & Schoeneman, 1979; Tice & Wallace, 2003), but most have either been sidebars in papers written to address other issues or have focused narrowly on one subcomponent of reflected appraisal. For this chapter, we sought to extend the reflected appraisal literature by offering an up-to-date review of empirical evidence relevant to each stage of the reflected appraisal cycle. We start by analyzing people's impressions of others' impressions of them, then examine how impressions of others influence self-views. We conclude by highlighting challenges faced by reflected appraisal researchers and considering how new technology is changing the study and nature of reflected appraisal.

Perceptions of Others' Appraisals

The stage of reflected appraisal in which people form subjective impressions of others' views of them is commonly called metaperception.[3] When discussing the psychological consequences of reflected appraisal, one is obliged to clarify that the process is driven by the *perception* of others' views, which may or may not resemble the reality of others' views. The theme of disconnection between metaperception and reality has been revisited often in reflected appraisal research (e.g., Shrauger & Schoeneman, 1979). Myriad factors can undermine individuals' empathic accuracy, i.e., their ability to correctly imagine others' perspectives (Ickes, 1997). Metaperception usually requires making inferences based on an incomplete, ambiguous set of cues. Assessing how one is viewed by other people is easy only to the extent that others communicate their perspective clearly, directly, and honestly. Of course, people generally avoid

revealing the details of their appraisals to the people they appraise, especially if the details could be hurtful or offensive (Blumberg, 1972; DePaulo & Bell, 1996).

The mere availability of cues that convey the perspective of another does not guarantee that person perceivers will use them (O'Conner & Dyce, 1993). One explanation relates to individuals' limited ability and motivation to attend to and reflect upon relevant available information about other people. For example, the act of intentionally managing the impression one presents to others diverts attention that could otherwise be focused on noting others' responses (e.g., Baumeister, Hutton, & Tice, 1989). Furthermore, the process of actively trying to understand others can encourage top-down information processing, causing tunnel vision (e.g., Gilbert, Jones, & Pelham, 1987; Gilbert & Krull, 1988). Even when people receive and pay attention to concrete evidence about others' views of them, they may still reject or minimize the importance of this information if it conflicts with their expectations (e.g., Jones, 1986) and preferences (e.g., Sanitioso & Wlodarski, 2004).

Self-appraisals steer metaperceptions

To convey the difficulty of deducing others' views, Shrauger and Shoeneman (1979) adopted the phrase "through a looking glass darkly" to emphasize the opaqueness of the looking glass. However, as Murray, Holmes, MacDonald, and Ellsworth (1998) recognized, the same phrase could also be used to describe the excessive pessimism that characterizes some people's metaperceptions. Consistent with self-consistency models of self-evaluation, individuals with chronically low or insecure self-esteem sometimes struggle to accept evidence that others really do think well of them (e.g., Campbell, Simpson, Boldry, & Kashy, 2005; Lemay & Dudley, 2009; McNulty, 2008; Murray, Holmes, Griffin, Bellavia, & Rose, 2001). As Murray, Rose, Bellavia, Holmes, and Kusche (2002) put it, people with low self-esteem are more likely to

"make mountains out of molehills" by assuming that minor criticisms from others signal overall negative appraisals. Moreover, the social norm of communicating compliments while withholding criticism magnifies the impact of critical feedback that does get expressed and can even lead people to perceive neutral social feedback as negative (e.g., Leary, Haupt, Strausser, & Chokel, 1998).

Still, people who underestimate the positivity of others' impressions of them seem to be more the exception than the rule. The self-enhancement bias that pervades self-evaluations (e.g., see research on optimistic bias and better-than-average effects described in Alicke's chapter in this volume) is also evident in metaperceptions—especially when the risk of encountering disconfirming evidence is minimal (Preuss & Alicke, 2009). Most people have positive overall self-esteem (Baumeister, Tice, & Hutton, 1989) and are prone to self-flattering interpretations of social feedback (see review by Baumeister, 1998). For example, Murray and colleagues showed that high self-esteem individuals respond to esteem-threatening events by increasing their confidence in others' positive views of them (Murray, Griffin, Rose, & Bellavia, 2003; Murray et al., 1998). Even unbiased person perceivers should tend to overestimate others' opinion of them simply because positive appraisals are more commonly expressed than negative appraisals (DePaulo & Bell, 1996).

The evidence just presented indicates that existing self-views affect interpretation of information regarding others' views, but sometimes self-views are the primary or only source of metaperceptions, not merely a filter. An impressive body of evidence indicates that metaperception, like other categories of social judgment, often relies more on egocentric projections of self-views than on assessments of external information (see reviews by Felson, 1993; Krueger, 1998; 2007). Self-views can dominate judgments of others for several reasons.

Social cognition research has repeatedly demonstrated that chronically accessible self-views influence social judgments automatically and unconsciously (see review by Baldwin, 1992). Epley, Keysar, VanBoven, and Gilovich (2004) concluded that basing judgments of others' views on self-views constitutes the first stage of the perspective taking process—an initial default judgment that can be overridden only if circumstances allow and encourage more thorough information processing. Mere awareness of one's own views can interfere with one's ability to correctly gauge others' perspectives (Chambers, Epley, Savitsky, & Windschitl, 2008). Moreover, people can justify interjecting self-views into judgments of others' views because they assume that others share their views. The false consensus effect describes the tendency for people to overestimate the overlap between their views and those of others (Marks & Miller, 1987; Ross, Greene, & House, 1977). People are also prone to the illusion of transparency—overestimating the extent to which their feelings are evident to others (Gilovich, Savitsky, & Medvec, 1998), especially if they feel self-conscious (Vorauer & Ross, 1999).

Although the impact of self-views on metaperceptions is typically large, it is not inevitable. People are less likely to assume that another person shares their views when the other person is noticeably different from them (Kenny & DePaulo, 1993), an outgroup member (Clement & Krueger, 2002; Frey & Tropp, 2006), or someone who is not emotionally close (Ames, 2004a, b). People are also more apt to take a systematic, bottom-up approach to evidence analysis in judging other people’s views of them, rather than relying on self-views or other judgment heuristics, if they think the judgment is relevant to their personal future (Kaplan, Santuzzi, & Ruscher, 2009). In general, if information about others' views is salient and unambiguous, people are more likely to use it when assessing others, rather than to rely only on self-views or other heuristics (e.g., Baron, Albright, & Malloy, 1995; Jussim, Soffin, Brown, Ley,

& Kohlhepp, 1992). Perspective-taking aids can also reduce self-projection in metaperception: Albright and Malloy (1999) showed that participants' metaperception accuracy improved if they were first shown a videotape of their own behavior.

Metaperception accuracy

In the past 25 years, measurement and statistical innovations have allowed researchers to assess metaperception accuracy with more sophistication. In their seminal review of this topic, Kenny and DePaulo (1993) concluded that individuals can judge how people in general view them with reasonable accuracy, but they overestimate the uniformity of others' views because they cannot accurately distinguish the perspectives of specific other people. This perspective fits well with the notion of the "generalized other" proposed by Mead (1934). The generalized other concept assumes that reflected appraisal processes are insensitive to differences between others' appraisals—other people get lumped together into a collective whole, so it does not matter whether the metaperceptions driving the reflected appraisal process are judgments of the views of one person or many people (see discussion by Felson, 1989).

More recent studies have confirmed people's ability to recognize how most others view them, but several have also determined that people are sometimes quite capable of judging the views of specific others (e.g., Carlson & Furr, 2009; Levesque, 1997; Oltmanns, Gleason, Klonsky, & Turkheimer, 2005). At first glance, the notion that metaperception is often reasonably accurate (see Jussim, 1993; Jussim, Harber, Crawford, Cain, & Cohen, 2005 for endorsements of this perspective) might seem difficult to reconcile with the aforementioned evidence that multiple factors distort judgments of others' views. To an extent, debates about metaperception accuracy boil down to different interpretations of the same statistics—a 75% level of metaperception accuracy could be framed as an impressive or lousy performance.

Another explanation is that bringing attention to factors that challenge people's ability to grasp others' perspectives suggests that these factors undermine perspective taking more consistently and to a greater degree that is actually the case. In other words, accuracy in perspective taking might be typical, but the exceptions are compelling and therefore attract disproportionate research attention (see discussion by Jussim, 2005). Yet another possibility is that metaperception accuracy occurs *despite* people's reliance on self-views for judging others' views.

Although people exaggerate the extent of overlap between views of themselves and others, one could argue that people's social views on the whole tend to be more similar than different, at least regarding ingroup-relevant topics. This makes sense, because an individual's self-views are partly based on the same behavior and outcomes that determine others' views of that individual (Albright, Forest, & Reiseter, 2001; Chambers et al., 2008; Malloy, Albright, & Scarpati, 2007). If a person is viewed similarly by that person and by others, the same metaperceptions should result from either pure projections of self-views or from unbiased perspective taking. Metaperception accuracy should presumably be relatively high for judgments of self-dimensions that are tied to discrete, observable actions (e.g., basketball free-throw skill), and relatively low for more abstract self-dimensions (e.g., basketball court awareness). Considering the challenges involved in deciphering others' perspectives, using one's own perspective to estimate other people's perceptions may sometimes yield more reliably accurate judgments than trying to exercise empathy and carefully analyze external evidence (e.g., DiDinato, Ullrich, & Krueger, 2011); however, this argument is challenged by evidence that people can be surprisingly clueless about their own strengths and weaknesses (Dunning, 2005).

In summary, research demonstrates that people's judgments of how others view them derive, at least in part, from extrapolation and imposition of existing self-views. Injecting one's

own self-views into judgments of how one is viewed by others can compromise the accuracy of these judgments, yet people's assessments of how others view them seem to be fairly accurate despite or perhaps even because of this egocentrism. In the next section, we shift from examining how people's self-views influence metaperceptions to examining how people's self-views are influenced by metaperceptions.

Effects of Metaperception on Self-perception

Self-concept change resulting from reflected appraisal may entail a fundamental shift in one's global self-appraisal, or it could be restricted to a minor, trivial subcomponent of the self-concept. The point that self-appraisals can be influenced by perceptions of others' appraisals may seem obvious, [4] but the extent of this influence was probably underappreciated before Leary and colleagues introduced sociometer theory (Leary & Baumeister, 2000; Leary, Tambor, Terdal, & Downs, 1995). Sociometer theory offers a convincing explanation for why self-views are so susceptible to influence from perceptions of others' evaluations: People care about others' views because their good or bad feelings about themselves directly depend on how they think others feel about them. Individuals share a fundamental need for assurance of connection with people who accept them (Baumeister & Leary, 1995). The sociometer model asserts that self-esteem is essentially an index of perceived social acceptance. Even anticipating change to one's social acceptance status impacts self-appraisal (Leary et al., 1995). Self-esteem is particularly sensitive to negative metaperceptions that threaten minimum standards for belongingness; positive metaperceptions that merely reinforce one's sense of being accepted have relatively less impact on self-esteem (Leary et al., 1995; see Baumeister, Bratslavsky, Finkenauer, & Vohs, 2001; Fenigstein, 1979 for more confirmation that negative social feedback packs more punch than positive feedback).[5]

The process by which metaperceptions become integrated into one's self-concept is mostly automatic (for reviews, see Chen, Boucher, & Tapias, 2006; Higgins & Pittman, 2008). Baldwin, Carrell, and Lopez (1990) demonstrated this fact by showing that priming students to think about authority figures associated with disapproval (the Pope or the department chair) caused their self-views to become more negative. Additional evidence can be drawn from Shah's (2003a, b) finding that one person's exposure to other people's views about the goals that person should pursue caused that person's goals to shift automatically to fit other people's perspectives. Effects of exposure to others' appraisals extend beyond the window of time in which exposure occurred. For example, Weisbuch, Sinclair, Skorinko, and Eccleston (2009) showed that encountering an experimenter wearing a t-shirt promoting tolerance of different body sizes led female participants to experience higher state self-esteem when interacting with this experimenter (now wearing a message-free shirt) one week later.

The same self-affirmation and self-enhancement biases that guide the formation of metaperceptions are also evident in the integration of metaperceptions into self-views. People embrace and assimilate social feedback into self-views more rapidly if the feedback is consistent with their existing self-views and the implications are positive (e.g., Shrauger, 1975). People also selectively recall metaperception details that match or bolster preferred self-views (e.g., Sanitioso & Wlodarski, 2004). Swann, Bosson, and Pelham (2002) found that people can even expand the boundaries of their self-concepts to incorporate desirable social feedback. Choice of social environment provides a good example of how individuals can exert control over reflected appraisal outcomes. People want to feel good, or at least not feel bad, about themselves, so they choose to spend time with people who reinforce their current or ideal self-appraisals (e.g., McNulty & Swann, 1994; Swann & Read, 1981). Although much of the bias observed in

reflected appraisal is best characterized as automatic and passive, people also play an active role in shaping the reflected appraisal process, and to some degree they do so with awareness and intention.

Moderators of and mediators of metaperception internalization

By definition, demonstrations of reflected appraisal effects highlight the instability and conditionality of people's self-appraisals. Reflected appraisal susceptibility indicates a self-concept that is not fully formed, or at least not held with confidence. In general, research has linked self-concept instability and contingency with more psychological problems than benefits (e.g., Crocker, Luhtanen, & Sommers, 2004; Kernis, Paradise, Whitaker, Wheatman, & Goldman, 2000). The same could be said for the psychological correlates of sensitivity to reflected appraisal. Perceptions of others' appraisals exert more influence on the self-appraisals of people who have low self-esteem (e.g., Murray, Holmes, & Griffin, 1996), anxious avoidant attachment (e.g., Srivastava & Beer, 2005), a record of low achievement, (e.g., Madon, Jussim, & Eccles, 1997), or stigmatized personal features (e.g., Cioffi, 2000; Khanna, 2010; Santuzzi & Ruscher, 2002). The tendency for individuals with low self-esteem to make mountains out of molehills also applies to their response to critical social feedback (Murray et al., 2002). Compared to people with high self-esteem, people with low self-esteem have more difficulty confining the self-evaluative consequences of specific criticism to the narrow facets of self directly implicated by the feedback. Unfortunately, the people whose self-esteem fluctuates most dramatically with perceived social approval also tend to be evaluated less favorably by others (Harter, Stocker, & Robinson, 1996).

Cultural differences in the degree to which people’s self-concepts are affected by reflected appraisal have been observed, most notably in comparisons between collectivistic East

Asian cultures and individualistic Western cultures. Collectivism prioritizes interconnections between oneself and others, and Suh (2007) confirmed that self-views of East Asians are more contingent on perceptions of others' appraisals than self-views of individuals from Western cultures. In Suh's words, the "perspective of others very often becomes the default position of the East Asian self" (p. 1327). This conclusion dovetails with research showing that the Chinese are much better at perspective taking than Americans (Wu & Keysar, 2007). Heine, Takemoto, Moskalenko, Lasaleta, and Henrich (2008) found that Japanese participants were insensitive to the presence of a mirror that caused North American participants to become more self-aware, an outcome suggesting that North Americans are less accustomed to considering how they appear to others. People display more confidence in other people's ability to judge them if they live in East Asian cultures (Tafarodi, Lo, Yamaguchi, Lee, & Katsura, 2004) or report attitudes reflecting a collectivistic orientation (Vorauer & Cameron, 2002). This connection between individualism and the belief that others cannot accurately judge may help to explain the comparatively high levels of self-esteem found in Western cultures: Individualistic people should find it easier to rationalize their rejection of undesired social feedback.

Reflected appraisal outcomes partly depend on one’s perception of the other person’s characteristics. As Cooley (1902) proposed, perceptions of another person's appraisal are more likely to become assimilated into the self-concept if the other person is considered relevant, important, valued, desired, and an ingroup member (e.g., Cast, Stets, & Burke, 1999; Rosenberg, 1973; Sinclair, Huntsinger, Skorinko, & Hardin, 2005; Turner & Onorato, 1999). Sinclair et al. (2005) found that pondering other people's appraisals could even push self-views in the opposite direction of others' appraisals if the other people were undesirable relationship partners. However, not all evidence neatly corresponds with the principle that reflected appraisals of important

others matter more. Harter (1999) confirmed that self-appraisals of children are most affected by perceived appraisals of their parents, but her finding that teens and adults are more affected by the appraisals of peers than family members or their closest friends is harder to square with other evidence regarding effects of metaperception target importance. Harter explained this apparent contradiction by speculating that people view the appraisals of their closest family and friends as biased and therefore less credible.

Metaperceptions can influence self-views directly or they can alter self-views indirectly by inducing behavior change. People adjust their behavior, whether strategically or unintentionally, in response to their sense of how others currently view them or in response to their expectations for how others will view them after observing the behavior. People's perceptions of others' appraisals of their capabilities automatically affect their goal setting, performance, and responses to performance outcomes (Shah, 2003a, b). The impact of people's metaperceptions on their behavior is best exemplified by research on self-fulfilling prophecy and stereotype threat. Self-fulfilling prophecy describes how receiving information about others' expectations of them can cause people to behave in a manner that confirms others' expectations (see reviews by Jussim & Harber, 2005; Rosenthal & Rubin, 1978). Stereotype threat refers to fear of confirming negative stereotypes about the abilities of one’s group—a fear that often undermines performance, thus confirming the stereotype (see review by Schmader, Johns, & Forbes, 2008). Explanations of self-fulfilling prophecy generally emphasize that internalization of others' expectancies precedes expectancy-confirming behavior, which reinforces the internalization process. In contrast, the stereotype threat literature emphasizes that when negative stereotypes regarding the capabilities of some group are made salient, members of that group generally underachieve whether they accept the validity of the stereotype or not.[6]

The behavior that metaperceptions influence can affect self-appraisals through self-perception or by causing metaperceptions to change. Self-perception, the process by which one's self-appraisals adjust according to the implications of one's own behavior, can partly be explained by people's preference for self-consistency, but this explanation alone cannot account for evidence that people are more likely to internalize their behavior when it was also observed by other people (Kelly & Rodriguez, 2006; Schlenker, Dlugolecki, & Doherty, 1994; Tice, 1992). People often behave in ways that conflict with personal attitudes and values, but public commitment to such behavior dramatically increases the consequences for their self-concept—especially if the audience is perceived to have a personal interest in the behavior (Harter, 1999; Pasupathi & Rich, 2005). People have reason to recognize or at least assume that observers tend to attribute behavior to the stable personal qualities of the individual engaging in the behavior, rather than viewing the behavior as an abberation or as the product of forces outside of the individual (see review by Gilbert & Malone, 1995). Indeed, when people disclose unflattering personal information or publicly humiliate themselves, they usually overestimate the negative impact on others' views of them (e.g., Gromet & Pronin, 2009). Therefore, engaging in uncharacteristic behavior may cause people to amend their judgment of an observer's appraisal of them, which may in turn cause them to change their self-views. In short, metaperception can shape behavior, which in turn can shape metaperception.

The real-world consequences of the connections between metaperceptions and behavior, as well as the outcomes of self-appraisals, could potentially be profound. For example, Murray and colleagues have shown that the actions of people who view their partners with rose colored glasses elevate their partner's self-appraisals, which in turn promotes behavior worthy of positive appraisal (e.g., Murray et al., 1996). Murray's findings have been extended by research on the

Michelangelo effect (Drigotas, Rusbult, Wieselquist, & Whitton, 1999), which describes the process by which close relationship partners shape each other's behavior and self-appraisals toward desired ideals. The Michelangelo effect essentially highlights a form of self-fulfilling prophecy—treating others as if they possessed the traits that you wished they had actually leads others to feel that they possess those traits and to engage in behavior consistent with the desired traits.

Kelly's (2000) research on secret disclosure in psychotherapy provides another example of how reflected appraisal effects can be mediated by people's behavior. Kelly's work suggests that people routinely withhold shameful secrets from their therapist in order to project a more positive self-image. By restricting negative self-disclosure, people can more easily accept that their therapist truly holds them in high regard and has positive expectations for their future (see also Lemay & Clark, 2008). Although hiding personal information from others has been linked with negative psychological outcomes in some contexts (e.g., Uysal, Lin, & Knee, 2010), Kelly (2000) concluded that downsides of avoiding full self-disclosure in therapy may be offset by advantages associated with people's ability to internalize their positive self-presentation and their perception of being viewed positively by their therapist.

In summary, research confirms that metaperceptions change self-views directly or by inducing behavior that people internalize. When self-views change, the cycle of reflected appraisal repeats: Change in self-appraisal is likely to produce change in people's metaperceptions.

Research Challenges and Opportunities

Studying reflected appraisal presents several challenges. Perhaps the biggest is the fact that reflected appraisal is not one but rather an interlocking series of processes (see Figure 1). To

date, most of the empirical evidence relevant to reflected appraisal has emerged from studies designed to test hypotheses relevant to a single component of reflected appraisal. Capturing the nuances of each element of the reflected appraisal cycle for all participants in a single study is impractical, if not implausible, but the lack of such studies leaves open the possibility that the reality of reflected appraisal as a whole could be different than the sum of evidence from studies addressing narrow slices of reflected appraisal would indicate.

Reflected appraisal researchers also face methodological challenges in trying to distinguish between competing explanations for outcomes observed. For example, as discussed earlier, mere correspondence between self-appraisals and metaperceptions could reflect judgments of oneself influencing judgments of others, judgments of others influencing judgments of oneself, or independent judgments of oneself and others. Another challenge is distinguishing the influence of others' real or perceived appraisals on self-appraisal from self-broadcasting—the influence of self-appraisal on others' appraisals (see discussions by Felson, 1993; Kenny & DePaulo, 1993; Srivastava & Beer, 2005). Moreover, it is not always easy to isolate reflected appraisal effects from less complex, more direct sources of social influence such as social comparison, mimicry (e.g., Dijksterhuis & Bargh, 2001), and perceived self-other overlap (e.g., Aron, Aron, Tudor, & Nelson, 1991).

The fact that multiple mechanisms can account for the impact of one's social environment on self-views raises the question of whether reflected appraisal plays a relatively major or minor role when compared with alternative forms of social influence. Sedikides and Skowronski (1995) determined that social comparisons influenced self-appraisals more than reflected appraisal, but the reality of reflected appraisal has never really been challenged, at least not when reflected appraisal definitions specify that subjective perceptions of others drive the process. People seem

to believe that reflected appraisal is an important factor in their self-appraisals (Harter et al., 1996). In recent years, some businesses have begun trying to increase their employees' productivity and psychological health through the use of reflected appraisal interventions such as the "360 degree exercise" or the "reflected best self exercise" that encourage participants to understand their strengths by viewing themselves through the perspective of their peers (e.g., Roberts, Dutton, Spreitzer, Heaphy, & Quinn, 2005).

It may be a cliché to note that rapidly improving neuroscience techniques hold high promise for enhancing knowledge of psychological processes, but neuroscience has already advanced reflected appraisal research. An examination of the neurological underpinnings of reflected appraisal is beyond the scope of this chapter, but a study by Pfeifer et al. (2009) offers an example of how neuroscience can help. Prior research had established that teens were sensitive to reflected appraisal (e.g., Harter et al., 1996), but had not directly compared reflected appraisal for teens and adults. Pfeifer et al. used functional magnetic resonance imaging to probe the brain activity of adult and adolescent samples during a self-reflection task. They found that teen brains showed significantly more activity than adult brains in the area at the intersection of the inferior parietal lobule and posterior superior temporal gyrus—a brain region that has been linked with third-person perspective-taking. This evidence allowed Pfeifer et al. to conclude that reflected appraisal does indeed affect the self-appraisals of adolescents more than adults.

Internet-mediated reflected appraisal

Having established that technology innovations can benefit the study of reflected appraisal, we now consider the intriguing possibility that one relatively new technology—the internet—has already significantly changed reflected appraisal processes and outcomes. For the first time in history, face-to-face interaction now is not necessarily the dominant means by which

people assess and are assessed by others (Zhao, 2006). The telephone reduced people's reliance on face-to-face communication, but the emergence of the internet has truly been a game changer for social interaction. People now routinely use computers to present themselves and provide feedback to others via personal webpages, e-mail, and—to an increasing degree—social networking sites. In 2010, Americans were spending a greater percentage of internet time using social networking sites and blogs than e-mail (23% vs. 8%; Nielsen, 2010). The Pew Research Center reported that nearly three-quarters of the teens and young adults in the world with internet access were using social networking sites in 2009 (Lenhart, Purcell, Smith, & Zickuhr, 2010) . It also found that 55% of adults aged 18-25 visited social networking sites at least once a day (Taylor & Keeter, 2010). Researchers have not had enough time to fully grasp the psychological consequences of the movement toward electronic social networking (partly because the favored mode of internet communication keeps changing), but we suspect that Zhao (2005) was on target in observing that internet communication partners “constitute a distinctive 'looking glass' that produces a 'digital self' that differs from the self formed offline" (p. 387).

The internet gives people the ability to elicit and gather social feedback around the clock. Pew Research found that 83% of young adults report always keeping their cellphones (which today typically offer text message if not internet capability) within arm’s length when sleeping (Taylor & Keeter, 2010). The increasing extent to which people are connected to social feedback raises the possibility that people's self-views may be more affected by reflected appraisal now than they used to be. Before cell phone and internet use became common, researchers (Schoeneman, 1981; Sedikides & Skowronski, 1995) concluded that self-concept is more strongly influenced by self-reflection than reflected appraisal. But when these studies were conducted, self-reflection had less competition. Today, instead of engaging in self-reflection

during moments of downtime, people may choose instead to call or text a friend, or log on to the internet.

Different channels of internet communication could have different implications for reflected appraisal, but we will focus on the compelling example of the Facebook social networking website. At this point in time, Facebook is by far the most popular option for computer-mediated communication, with 500 million users (Facebook, 2011). One longitudinal diary study found that students at an American college spent an average of 30 minutes per day on Facebook (Pempek, Yermolayeva, & Calvert, 2009). Facebook users create self-descriptive personal profile homepages that they link to the profiles of other Facebook users (linked users are called "friends" in Facebook lingo). When Facebook users log on, they can easily view others' profile updates and new messages sent. Facebook privacy settings allow users to decline another user's request to be linked as a friend, or to remove a link to an existing friend, but the fact that Facebook users are commonly linked to more than 200 friends (e.g., Pempek et al., 2009; Tong, van der Heide, Langwell, & Walther, 2008) hints that users are often not particularly selective in filtering friend requests.

The flattering Facebook looking glass

Facebook-mediated reflected appraisal probably differs from traditional paths of reflected appraisal in a number of ways, but in our view the most important difference is that Facebook appears more likely to promote positive self-appraisals by allowing people to present their preferred self-image, cultivate a large network of "friends," and dodge signs of others' negative appraisals. To be sure, like any communication medium, Facebook can and has been used as a tool for hurting other people. But on the whole, the features and norms of Facebook promote self-esteem bolstering more than bashing.

From a self-presentation standpoint, communicating through Facebook rather than during live interactions allows people more opportunities to subtly craft their public identity through written communications and by selectively displaying photos and links to favored people, places, and things (Gonzalez & Hancock, 2011; Zhao, Grasmuch, & Martin, 2008). Internet self-presentation is rarely blatantly untruthful (e.g., Back et al., 2010; Bargh, McKenna, & Fitzsimons, 2002), but it surely involves selective disclosure. Zhao et al. (2008) found that all of the 60 college student Facebook pages they studied projected a socially desirable identity.

Because Facebook enhances users' ability to project a positive impression of themselves, they have reason to expect their Facebook friends to think well of them. Although observers who form impressions of Facebook users discount forms of self-presentation that can easily be manipulated (Walther, 2009), impression managers are likely to assume that others accept the details of their self-presentation at face value. This assumption is bolstered by evidence that people overestimate the degree to which their e-mail messages achieve their communication goals (Kruger, Epley, Parker, & Ng, 2005), and pre-Facebook evidence that owners of personal webpages judge that others form more positive impressions of them by viewing their webpage than through face-to-face interaction (Sherman et al., 2001).

Facebook not only allows people to boost their self-esteem by internalizing the complimentary self-presentations they craft, but it also gives people chronic access to self-affirming feedback from others. We have already discussed how social norms in general encourage people to express their positive views of others but not their criticisms, but internet social network environments may stack the deck even further in favor of positive social feedback. One reason why users of Facebook and other social networking sites may expect to receive flattering social feedback relates to the previously mentioned ability of users to regulate their

communications to fit their sense of what would be socially appropriate or advantageous. Just as Facebook users have the power to present themselves to others in ways that emphasize personal strengths, other users also have the ability to hide their real feelings if expressing them could be hurtful or counterproductive. In real-time face-to-face interactions, suppressing knee-jerk expressions of negative feelings (annoyance, disgust, frustration, etc.) toward others or their actions should be more difficult to manage. Facebook also offers self-esteem maintenance advantages when users do receive criticism from Facebook friends. Users can escape esteem-threatening feedback by logging off, re-reading more supportive messages posted previously, or by just removing the offenders from their list of friends, thereby blocking future critical postings.

Three features of Facebook's default settings warrant attention for steering people toward positive feelings and supportive commentary. First, personal pages automatically display the total number of Facebook friends one has accumulated, so users receive reassurance of social acceptance (usually by hundreds of friends) whenever they log on. Second, as Twenge and Campbell (2009) noted, the Facebook "friends" label confers undeserved status to relationships between people who often barely know each other. Third, the Facebook default screen includes a "Like" button that allows people to quickly express their endorsement or appreciation for comments or content that others post, but the default screen does not include a parallel "Dislike" or "Hate" button that would make it easier for people to express criticism.

Facebook allows people to simultaneously show off and obtain self-affirming feedback—two features that narcissists should find especially appealing. Studies by Buffardi and Campbell (2008) and Mehdizadeh (2010) both found that narcissism predicted quantity of Facebook activity, and although Bergman, Fearrington, Davenport, and Bergman (2011) did not find the same relationship, they did show that narcissists were more likely to report using Facebook for

self-promotion. Buffardi and Campbell proposed that exposure to others' narcissism on Facebook causes people to present themselves in a more narcissistic manner; perhaps it is no coincidence that students today are generally more narcissistic than college students in prior generations (Twenge, Konrath, Foster, Campbell, & Bushman, 2008).

Gonzales and Hancock (2011) gathered the strongest evidence to date for the notion that Facebook provides a self-flattering looking glass. Their research randomly assigned participants either to view a mirror, their personal Facebook page, or someone else's Facebook page. Participants who saw their own Facebook page subsequently had higher self-esteem than participants assigned to other experiment conditions. Gonzales and Hancock interpreted their results as evidence of the benefits of being able to personally craft one's Facebook image, but their results could also be attributed to benefits of exposure to the supportive virtual presence of Facebook friends.

Although Facebook should be a valuable social resource for people who are sociable by nature, the people who seem to gain the most from the alternative social interface offered by Facebook and other internet social networking options are those who have the most trouble interacting with people in face-to-face meetings. All people may benefit from connections with accepting others, but some people struggle to overcome fears related to social exposure and interaction. Individuals who are socially anxious, shy, or lack self-esteem tend to feel more comfortable engaging with others through an internet environment that allows them to control their self-presentation more easily without being overwhelmed by having to simultaneously grasp and respond to the complex interpersonal cues exchanged in face-to-face interactions (e.g., Baker & Oswald, 2010; Ellison, Steinfield, & Lampe, 2007; Joinson, 2004).[7]

Of course, social networking does not guarantee self-esteem advantages. The Facebook norm of socially supportive feedback probably does not extend to the minority of users whose self-presentations violate standards of social appropriateness. Also, true masters of the art of face-to-face interaction have less to gain from the movement toward internet-based forms of communication. In some cases, self-esteem benefits of reflected appraisal via Facebook may be cancelled out by the upward comparison threats posed by exposure to seemingly thriving Facebook friends (e.g., Jordan et al., 2011).

Closing thoughts

When compared to the history of research on some other topics relevant to self and identity, the reflected appraisal literature is relatively uncontentious. Early accounts of reflected appraisal offered by James, Cooley, and Mead have largely withstood decades of scientific scrutiny. Nonetheless, although consensus on the big picture of reflected appraisal has remained fairly stable, the complex details of reflected appraisal processes are now far better understood. The nature and direction of numerous biases common to reflected appraisal have been isolated, as have relevant individual differences in the people viewing their reflection and in those serving as mirrors. It will be interesting to learn whether some of the established principles of reflected appraisal processes will need to be revised when researchers catch up to the recent revolutionary changes in the tools people use to appraise themselves and others.

References

Albright, L., Forest, C., & Reiseter, K. (2001). Acting, behaving, and the selfless basis of metaperception. *Journal of Personality and Social Psychology, 81*(5), 910-921.

Albright, L., & Malloy, T. E. (1999). Self-observation of social behavior and metaperception. *Journal of Personality and Social Psychology, 77*(4), 726-734.

Ames, D. R. (2004a). Inside the mind reader's tool kit: Projection and stereotyping in mental state inference. *Journal of Personality and Social Psychology, 87*(3), 340-353.

Ames, D. R. (2004b). Strategies for social influence: A similarity contingency model of projection and stereotyping in attribute prevalence estimates. *Journal of Personality and Social Psychology, 87*(5), 573-585.

Aron, A., Aron, E. N., Tudor, M., & Nelson, G. (1991). Close relationships as including other in the self. *Journal of Personality and Social Psychology, 60*(2), 241-253.

Back, M. D., Stopfer, J. M., Vazire, S., Gaddis, S., Schmukle, S. C., Egloff, B., & Gosling, S. D. (2010). Facebook profiles reflect actual personality, not self-idealization. *Psychological Science, 21*(3), 372-374.

Baker, L. R., & Oswald, D. L. (2010). Shyness and online social networking services. *Journal of Social and Personal Relationships, 27*(7), 873-889.

Baldwin, M. W. (1992). Relational schemas and the processing of social information. *Psychological Bulletin, 112*(3), 461-484.

Baldwin, M. W. (1996). Self-esteem and "if...then" contingencies of interpersonal acceptance. *Journal of Personality and Social Psychology, 71*(6), 1130-1141.

Baldwin, M. W., Carrell, S. E., & Lopez, D. F. (1990). Priming relationship schemas: My advisor and the Pope are watching me from the back of my mind. *Journal of Experimental Social Psychology, 26*, 435-454.

Bargh, J. A., McKenna, K. Y. A., & Fitzsimons, G. M. (2002). Can you see the real me? Activation and expression of the "true self" on the internet. *Journal of Social Issues, 58*(1), 33-48.

Baron, R. M., Albright, L., & Malloy, T. E. (1995). Effects of behavioral and social class information on social judgment. *Personality and Social Psychology Bulletin, 21*(4), 308-315.

Baumeister, R. F. (1998). The self. In D. T. Gilbert, S. T. Fiske, & G. Lindzey (Eds.), *Handbook of social psychology* (4th ed., pp. 680-740). New York: McGraw-Hill.

Baumeister, R. F., Bratslavsky, E., Finkenauer, C., & Vohs, K. D. (2001). Bad is stronger than good. *Review of General Psychology, 5*(4), 323-370.

Baumeister, R. F., Hutton, D. G., & Tice, D. M. (1989). Cognitive processes during deliberate self-presentation: How self-presenters alter and misinterpret the behavior of their interaction partners. *Journal of Experimental Social Psychology, 25*(1), 59-78.

Baumeister, R. F., & Leary, M. R. (2005). The need to belong: Desire for interpersonal attachments as a fundamental human motivation. *Psychological Bulletin, 117*(3), 497-529.

Baumeister, R. F., Tice, D. M., & Hutton, D. G. (1989). Self-presentational motivations and personality differences in self-esteem. *Journal of Personality, 57*, 547-579.

Bergman, S. M., Fearrington, M. E., Davenport, S. W., & Bergman, J. Z. (2011). Millennials, narcissism, and social networking: What narcissists do on social networking sites and why. *Personality and Individual Differences, 50*, 706-711.

Blumberg, H. H. (1972). Communication of interpersonal evaluations. *Journal of Personality and Social Psychology, 23*(2), 157-162.

Buffardi, L. E., & Campbell, W. K. (2008). Narcissism and social networking web sites. *Personality and Social Psychology Bulletin, 34*(10), 1303-1314.

Campbell, L., Simpson, J. A., Boldry, J., & Kashy, D. A. (2005). Perceptions of conflict and support in romantic relationships: The role of attachment anxiety. *Journal of Personality and Social Psychology, 88*(3), 510-531.

Carlson, E. N., & Furr, R. M. (2009). Evidence of differential meta-accuracy: People understand the different impressions they make. *Psychological Science, 20*(8), 1033-1039.

Cast, A. D., Stets, J. E., & Burke, P. J. (1999). Does the self conform to the views of others? *Social Psychology Quarterly, 62*, 68-82.

Chambers, J. R., Epley, N., Savitsky, K., & Windschitl, P. D. (2008). Knowing too much: Using private knowledge to predict how one is viewed by others. *Psychological Science, 19*(6), 542-548.

Chen, S., Boucher, H. C., & Tapias, M. P. (2006). The relational self revealed: Integrative conceptualization and implications for interpersonal life. *Psychological Bulletin, 132*(2), 151-179.

Cioffi, D. (2000). The looking-glass self revisited: Behavior choice and self-perception in the social token. In T. F. Heatherton, R. E. Kleck, M. R. Hebl, & J. G. Hull (Eds.), *The social psychology of stigma* (pp. 184-219). New York: Guilford.

Clement, R. W., & Krueger, J. (2002). Social categorization moderates social projection. *Journal of Experimental Social Psychology, 38*(3), 219 - 231.

Cooley, C. H. (1902). *Human nature and the social order*. New York: Scribner.

Crocker, J., Luhtanen, R. K., & Sommers, S. R. (2004). Contingencies of self-worth: Progress and prospects. *European Review of Social Psychology, 75*, 133-181.

DePaulo, B. M., & Bell, K. L. (1996). Truth and investment: Lies are told to those who care. *Journal of Personality and Social Psychology, 71*(4), 703-716.

DiDonato, T. E., Ullrich, J., & Krueger, J. I. (2011). Social perception as induction and inference: An integrative model of intergroup differentiation, ingroup favoritism, and differential accuracy. *Journal of Personality and Social Psychology, 100*(1), 66-83.

Dijksterhuis, A., & Bargh, J. A. (2001). The perception-behavior expressway: Automatic effects of social perception on social behavior. In M. P. Zanna (Ed.), *Advances in experimental social psychology* (Vol. 33, pp. 1-40). San Diego, CA: Academic Press.

Drigotas, S. M., Rusbult, C. E., Wieselquist, J., & Whitton, S. W. (1999). Close partner as sculptor of the ideal self: Behavioral affirmation and the Michelangelo phenomenon. *Journal of Personality and Social Psychology, 77*, 293-323.

Dunning, D. (2005). *Self-insight: Roadblocks and detours on the path to knowing thyself*. New York: Psychology Press.

Ellison, N. B., Steinfield, C., & Lampe, C. (2007). The benefits of Facebook "friends:" Social capital and college students' use of online social network sites. *Journal of Computer-Mediated Communication, 12*, 1143-1168.

Epley, N., Keysar, B., Van Boven, L., Gilovich, T. (2004). Perspective taking as egocentric anchoring and adjustment. *Journal of Personality and Social Psychology, 87*(3), 327-339.

Facebook press release. http://www.facebook.com/press/info.php?statistics, accessed March 11, 2011.

Felson, F. B. (1989). Parents and the reflected appraisal process: A longitudinal analysis. *Journal of Personality and Social Psychology, 56*(6), 965-971.

Felson, R. B. (1993). The (somewhat) social self: How others affect self-appraisals. In J. M. Suls (Ed.), *The self in social perspective* (pp. 1-26). Hillsdale, NJ: Erlbaum.

Fenigstein, A. (1979). Self-consciousness, self-attention, and social interaction. *Journal of Personality and Social Psychology, 37*(1), 75-86.

Frey, F. E., & Tropp, L. R. (2006). Being seen as individuals versus as group members: Extending research on metaperception to intergroup contexts. *Personality and Social Psychology Review, 10*(3), 265-280.

Gilbert, D. T., & Krull, D. S. (1988). Seeing less and knowing more: The benefits of perceptual ignorance. *Journal of Personality and Social Psychology, 54*(2), 193-202.

Gilbert, D. T., Jones, E. E., & Pelham, B. W. (1987). Influence and inference: What the active perceiver overlooks. *Journal of Personality and Social Psychology, 52*(5), 861-870.

Gilbert, D. T., & Malone, P. S. (1995). The correspondence bias. *Psychological Bulletin, 117*(1), 21-38.

Gilovich, T., Savitsky, K., & Medvec, V. H. (1998). The illusion of transparency: Biased assessments of others' ability to read one's emotional states. *Journal of Personality and Social Psychology, 75*(2), 332-346.

Gonzales, A. L., & Hancock, J. T. (2011). Mirror, mirror on my Facebook: Effects of exposure to Facebook on self-esteem. *Cyberpsychology, Behavior, and Social Networking, 14*, 79-83.

Gromet, D. M., & Pronin, E. (2009). What were you worried about? Actors' concerns about revealing fears and insecurities relative to observers' reactions. *Self and Identity, 8*, 342-364.

Harter, S. (1999). *The construction of self*. New York: Guilford.

Harter, S., Stocker, C., & Robinson, N. S. (1996). The perceived directionality of the link between approval and self-worth: The liabilities of a looking glass self-orientation among young adolescents. *Journal of Research on Adolescence, 6*(3), 285-308.

Heine, S. J., Takemoto, T., Moskalenko, S., Lasaleta, J., & Henrich, J. (2008). Mirrors in the head: Cultural variation in objective self-awareness. *Personality and Social Psychology Bulletin, 34*(7), 879-887.

Higgins, E. T., & Pittman, T. S. (2008). Motives of the human animal: Comprehending, managing, and sharing inner states. *Annual Review of Psychology, 59*, 361-385.

Ickes, W. J. (1997). *Empathic accuracy*. New York: Guilford.

James, W. (1890). *The principles of psychology*. New York: Holt.

Joinson, A. N. (2004). Self-esteem, interpersonal risk, and preference for E-mail to face-to-face communication. *CyberPsychology and Behavior, 7*(4), 472-478.

Jones. E. E. (1986). Interpreting interpersonal behavior: The effects of expectancies. *Science, 234*, 41-46.

Jordan, A. H., Monin, B., Dweck, C. S., Lovett, B. J., John, O. P., & Gross, J. J. (2011). Misery has more company than people think: Underestimating the prevalence of others' negative emotions. *Personality and Social Psychology Bulletin, 37*(1), 120-135.

Jussim, L. (1993). Accuracy in interpersonal expectations: A reflection-construction analysis of current and classic research. *Journal of Personality, 61*(4), 637-668.

Jussim, L. (2005). Accuracy in social perception: Criticisms, controversies, criteria, components, and cognitive processes. In M. P. Zanna (Ed.), *Advances in experimental social psychology* (Vol. 37, pp. 1-93). San Diego, CA: Elsevier.

Jussim, L., & Harber, K. D. (2005). Teacher expectations and self-fulfilling prophecies: Knowns and unknowns, resolved and unresolved controversies. *Personality and Social Psychology Review, 9*(2), 131-155.

Jussim, L., Harber, K. D., Crawford, J. T., Cain, T. R., & Cohen, F. (2005). Social reality makes the social mind: Self-fulfilling prophecy, stereotypes, bias, and accuracy. *Interaction Studies, 6*(1), 85-102.

Jussim, L., Soffin, S., Brown, R., Ley, J., & Kohlhepp, K. (1992). Understanding reactions to feedback by integrating ideas from symbolic interactionism and cognitive evaluation theory. *Journal of Personality and Social Psychology, 62*(3), 402-421.

Kaplan, S. A., Santuzzi, A. M., & Ruscher, J. B. (2009). Elaborative metaperceptions in outcome-dependent situations: The diluted relationship between default self-perceptions and metaperceptions. *Social Cognition, 27*(4), 601-614.

Kelly, A. E. (2000). Helping construct desirable identities: A self-presentational view of psychotherapy. *Psychological Bulletin, 126,* 475-494.

Kelly, A. E., & Rodriguez, R. R. (2006). Publicly committing oneself to an identity. *Basic and Applied Social Psychology, 28*(2), 185-191.

Kenny, D. A., & DePaulo, B. M. (1993). Do people know how others view them? An empirical and theoretical account. *Psychological Bulletin, 114*(1), 145-161.

Kernis, M. H., Paradise, A. W., Whitaker, D. J., Wheatman, S. R., & Goldman, B. N. (2000). Master of one's psychological domain? Not likely if one's self-esteem is unstable. *Personality and Social Psychology Bulletin, 26*(10), 1297-1305.

Khanna, N. (2010). "If you're half black, you're just black": Reflected appraisals and the persistence of the one-drop rule. *Sociological Quarterly, 51*, 96-121.

Kraut, R. E., Patterson, M., Lundmark, V., Kiesler, S., Mukhopadhyay, T., & Scherlis, W. (1998). Internet paradox: A social technology that reduces social involvement and psychological well-being? *American Psychologist, 53*(9), 1017-1032.

Krueger, J. I. (1998). On the perception of social consensus. In M. P. Zanna (Ed.), *Advances in experimental social psychology* (Vol. 30, pp. 163-240). San Diego, CA: Elsevier.

Krueger, J. I. (2007). From social projection to social behavior. *European Review of Social Psychology, 18*, 1-35.

Kruger, J., Epley, N., Parker, J., & Ng, Z. (2005). Egocentrism over E-mail: Can we communicate as well as we think? *Journal of Personality and Social Psychology, 89*(6), 925-936.

Leary, M. R., & Baumeister, R. F. (2000). The nature and function of self-esteem: Sociometer theory. In M. P. Zanna (Ed.), *Advances in experimental social psychology* (Vol. 32, pp. 1-62). San Diego, CA: Academic Press

Leary, M. R., Haupt, A. L., Strausser, K. S., & Chokel, J. T. (1998). Calibrating the sociometer: The relationship between interpersonal appraisals and state self-esteem. *Journal of Personality and Social Psychology, 74*(5), 1290-1299.

Leary, M. R., Tambor, E. S., Terdal, S. K., & Downs, D. L. (1995). Self-esteem as an interpersonal monitor: The sociometer hypothesis. *Journal of Personality and Social Psychology, 68*(3), 518-530.

Lemay, E. P., & Clark, M. S. (2008). "Walking on eggshells": How expressing relationship insecurities perpetuates them. *Journal of Personality and Social Psychology, 95*(2), 420-441.

Lemay, E. P., & Dudley, K. L. (2009). Implications of reflected appraisals of interpersonal insecurity for suspicion and power. *Personality and Social Psychology Bulletin, 35*(12), 1672-1686.

Lenhart, A., Purcell, K., Smith, A., & Zickuhr, K. Social media and young adults. Pew Internet & American Life Project, February 3, 2010, http://www.pewinternet.org/Reports/2010/Social-Media-and-Young-Adults.aspx, accessed on March 11, 2011.

Levesque, M. J. (1997). Meta-accuracy among acquainted individuals: A social relations analysis of interpersonal perception and metaperception. *Journal of Personality and Social Psychology, 72*(1), 66-74.

Lundgren, D. C. (2004). Social feedback and self-appraisals: Current status of the Mead-Cooley hypothesis. *Symbolic Interaction, 27*(2), 267-286.

Madon, S., Jussim, L., & Eccles, J. (1997). In search of the powerful self-fulfilling prophecy. *Journal of Personality and Social Psychology, 72*(4), 791-809.

Malloy, T. E., Albright, L., Scarpati, S. (2007). Awareness of peers' judgments of oneself: Accuracy and process of metaperception. *International Journal of Behavioral Development, 31*(6), 603-610.

Marks, G., & Miller, N. (1987). Ten years of research on the false-consensus effect: An Empirical and theoretical review. *Psychological Bulletin, 102*(1), 72-90.

McNulty, J. K. (2008). Neuroticism and interpersonal negativity: The independent contributions of perceptions and behaviors. *Personality and Social Psychology Bulletin, 34*(11), 1439-1450.

McNulty, S. E., & Swann, W. B. (1994). Identity negotiation in roommate relationships: The self as architect and consequence of social reality. *Journal of Personality and Social Psychology, 67,* 1012-1023.

Mead, G. H. (1934). *Mind, self, and society*. Chicago: University of Chicago Press.

Mehdizadeh, S. (2010). Self-presentation 2.0: Narcissism and self-esteem on Facebook. *Cyberpsychology, Behavior, and Social Networking, 13*(4), 357-364.

Murray, S. L., Griffin, D. W., Rose, P., & Bellavia, G. M. (2003). Calibrating the sociometer: The relational contingencies of self-esteem. *Journal of Personality and Social Psychology, 85*(1), 63-84.

Murray, S. L., Holmes, J. G., & Griffin, D. W. (1996). The self-fulfilling nature of positive illusions in romantic relationships: Love is not blind, but prescient. *Journal of Personality and Social Psychology, 71,* 1155-1180.

Murray, S. L., Holmes, J. G., Griffin, D. W., Bellavia, G., & Rose, P. (2001). The mis-measure of love: How self-doubt contaminates relationship beliefs. *Personality and Social Psychology Bulletin, 27*(4), 423-436.

Murray, S. L., Holmes, J. G., MacDonald, G., & Ellsworth, P. C. (1998). Through the looking glass darkly? When self-doubts turn into relationship insecurities. *Journal of Personality and Social Psychology, 75*(6), 1459-1480.

Murray, S. L., Rose, P., Bellavia, G. M., Holmes, J. G., & Kusche, A. G. (2002). When rejection stings: How self-esteem constrains relationship-enhancement processes. *Journal of Personality and Social Psychology, 83*(3), 56-573.

NielsenWire. What Americans do online: Social media and games dominate activity, August 2, 2010. http://blog.nielsen.com/nielsenwire/online_mobile/what-americans-do-online-social-media-and-games-dominate-activity/, accessed March 11, 2011.

O'Connor, B. P., & Dyce, J. (1993). Appraisals of musical ability in bar bands: Identifying the weak link in the looking-glass self chain. *Basic and Applied Social Psychology, 14*(1), 69-86.

Oltmanns, T. F., Gleason, M. E. J., Klonsky, E. D., & Turkheimer, E. (2005). Meta-perception for pathological personality traits: Do we know when others think that we are difficult? *Consciousness and Cognition, 14*, 739-751.

Pasupathi, M., & Rich, B. (2005). Inattentive listening undermines self-verification in personal storytelling. *Journal of Personality, 73*(4), 1051-1085.

Pempek, T. A., Yermolayeva, Y. A., & Calvert, S. L. (2009). College students' social networking experiences on Facebook. *Journal of Applied Developmental Psychology, 30*, 227-238.

Pfeifer, J. H., Masten, C. L., Borofsky, L. A., Dapretto, M., Fuligni, A. J., & Liberman, M. D. (2009). Neural correlates of direct and reflected self-appraisals in adolescents and adults: When social perspective-taking informs self-perception. *Child Development, 80*(4), 1016-1038.

Preuss, G. S., & Alicke, M. D. (2009). Everybody loves me: Self-evaluations and metaperceptions of dating popularity. *Personality and Social Psychology Bulletin, 35*(7), 937-950.

Roberts, L. M., Dutton, J. E., Spreitzer, G. M., Heaphy, E. D., & Quinn, R. E. (2005). Composing the reflected best-self portrait: Building pathways for becoming extraordinary in work organizations. *Academy of Management Review, 30*(4), 712-736.

Rosenberg, M. (1973). Which significant others? *American Behavioral Scientist, 16*, 829-860.

Rosenthal, R., & Rubin, D. B. (1978). Interpersonal expectancy effects: The first 345 studies. *Behavioral and Brain Studies, 1*(3), 377-415.

Ross, L., Greene, D., & House, P. (1977). The false consensus effect: An egocentric bias in social perception and attribution processes. *Journal of Experimental Social Psychology, 13*(3), 279-301.

Sanitioso, R. B., & Wlodarski, R. (2004). In search of information that confirms a desired self-perception: Motivated processing of social feedback and choice of social interactions. *Personality and Social Psychology Bulletin, 30*(4), 412-422.

Santuzzi, A. M., & Ruscher, J. B. (2002). Stigma salience and paranoid social cognition: Understanding variability in metaperceptions among individuals with recently-acquired stigma. *Social Cognition, 20*(3), 171-197.

Schlenker, B. R., Dlugolecki, D. W., & Doherty, K. (1994). The impact of self-presentations on self-appraisals and behavior: The power of public commitment. Personality *and Social Psychology Bulletin, 20*, 20-33.

Schmader, T., Johns, M., & Forbes, C. (2008). An integrated process model of stereotype threat effects on performance. *Psychological Review, 115*(2), 336-356.

Schoeneman, T. J. (1981). Reports of the sources of self-knowledge. *Journal of Personality, 49*(3), 284-294.

Sedikides, C., & Skowronski, J. J. (1995). On the sources of self-knowledge: The perceived primacy of self-reflection. *Journal of Social and Clinical Psychology, 14*(3), 244-270.

Shah, J. (2003a). Automatic for the people: How representations of significant others implicitly affect goal pursuit. *Journal of Personality and Social Psychology, 84*(4), 661-681.

Shah, J. (2003b). The motivational looking glass: How significant others implicitly affect goal appraisals. *Journal of Personality and Social Psychology, 85*(3), 424-439.

Sherman, R. C., End, C., Kraan, E., Cole, A., Campbell, J., Klausner, J., & Birchmeier, Z. (2001). Metaperception in cyberspace. *CyberPsychology and Behavior, 4*(1), 123-129.

Shrauger, J. S. (1975). Responses to evaluation as a function of initial self-perceptions. *Psychological Bulletin, 82*(4), 581-596.

Shrauger, J. S., & Schoeneman, T. J. (1979). Symbolic interactionist view of self-concept: Through the looking glass darkly. *Psychological Bulletin, 86*(3), 549-573.

Sinclair, S., Huntsinger, J., Skorinko, J., & Hardin, C. D. (2005). Social tuning of the self: Consequences for the self-evaluations of stereotype targets. *Journal of Personality and Social Psychology, 89*(2), 160-175.

Srivastava, S., & Beer, J. S. (2005). How self-evaluations relate to being liked by others: Integrating sociometer and attachment perspectives. *Journal of Personality and Social Psychology, 89*(6), 966-977.

Suh, E. M. (2007). Downsides of an *overly* context-sensitive self: Implications from the culture and subjective well-being research. *Journal of Personality, 75*(6), 1321-1343.

Swann, W. B., Bosson, J. K., & Pelham, B. W. (2002). Different partners, different selves: Strategic verification of circumscribed identities. *Personality and Social Psychology Bulletin, 28*(9), 1215-1228.

Swann, W. B., & Read, S. J. (1981). Acquiring self-knowledge: The search for feedback that fits. *Journal of Personality and Social Psychology, 41*(6), 1119-1128.

Tafarodi , R. W., Lo, C., Yamaguchi, S., Lee, W., & Katsura, H. (2004). The inner self in three countries. *Journal of Cross-Cultural Psychology, 35*(1), 97-117.

Taylor, P., & Keeter, S. Millennials: A portrait of generation next. Pew Internet & American Life Project, February, 2010, http://pewsocialtrends.org/files/2010/10/millennials-confident-connected-open-to-change.pdf, accessed on March 11, 2011.

Tice, D. M. (1992). Self-presentation and self-concept change: The looking-glass self is also a magnifying glass. *Journal of Personality and Social Psychology, 63*, 435-451.

Tice, D. M., & Wallace, H. M. (2003). The reflected self: Creating ourselves as (you think) others see you. In M. R. Leary & J. P. Tangney (Eds.), *Handbook of self and identity* (pp. 91-105). New York: Guilford.

Tong, S. T., van der Heide, B., Langwell, L., & Walther, J. B. (2008). Too much of a good thing? The relationship between number of friends and interpersonal impressions on Facebook. *Journal of Computer-Mediated Communication, 13*, 531-549.

Turner, J. C., & Onorato, R. S. (1999). Social identity, personality, and the self-concept: A self-categorization perspective. In T. R. Tyler, R. M. Kramer, & O. P. John (Eds.), *The psychology of the social self* (pp. 11-46). Mahwah, NJ: Erlbaum.

Twenge, J. M., & Campbell, W. K. (2009). *The narcissism epidemic: Living in the age of entitlement*. New York: Free Press.

Twenge, J. M., Konrath, S., Foster, J. D., Campbell, W. K., & Bushman, B. J. (2008). Further evidence of an increase in narcissism among college students. *Journal of Personality, 76*(4), 919-928.

Uysal, A., Lin, H. L., & Knee, C. R. (2010). The role of need satisfaction in self-concealment and well-being. *Personality and Social Psychology Bulletin, 36*(2), 187-199.

Vorauer, J. D., & Cameron, J. J. (2002). So close, and yet so far: Does collectivism foster transparency overestimation? *Journal of Personality and Social Psychology, 83*(6), 1344-1352.

Vorauer, J. D., & Ross, M. (1999). Self-awareness and feeling transparent: Failing to suppress one's self. *Journal of Experimental Social Psychology, 35,* 415-440.

Walther (2009). Self-generated versus other-generated statements in computer-mediated communication: A test of warranting theory using Facebook. *Communication Research, 36*(2), 229-253.

Weisbuch, M., Sinclair, S. A., Skorinko, J. L., & Eccleston, C. P. (2009). Self-esteem depends on the beholder: Effects of a subtle social value cue. *Journal of Experimental Social Psychology, 45,* 143-148.

Wu, S., & Keysar, B. (2007). The effect of culture on perspective taking. *Psychological Science, 18*(7), 600-606.

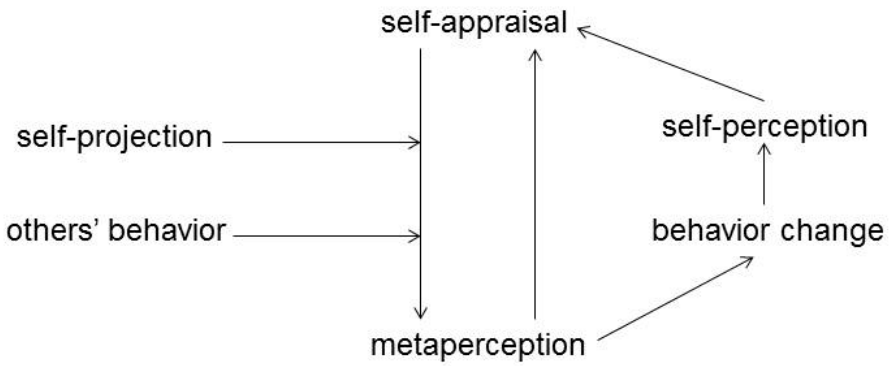
Zhao, S. (2005). The digital self: Through the looking glass of telecopresent others. *Symbolic Interaction, 28*(3), 387-405.

Zhao, S. (2006). The Internet and the transformation of the reality of everyday life: Toward a new analytic stance in sociology. *Sociological Inquiry, 76*(4), 458-474.

Zhao, S., Grasmuch, S., & Martin, J. (2008). Identity construction on Facebook: Digital empowerment in anchored relationships. *Computers in Human Behavior, 24,* 1816-1836.

Figure Caption

Figure 1. Components of reflected appraisal.



Footnotes

[1] Reflected appraisal is typically framed as a subcomponent or manifestation of symbolic interactionism, but the terms are sometimes used interchangeably.

[2] Scholars have rarely focused on distinctions between cognitive and emotional dimensions of reflected appraisal; this chapter likewise infers both dimensions in referring to views, judgments, and appraisals of and by self and others.

[3] Some authors have used the reflected appraisal label narrowly to refer to metaperception; our broader conceptualization of reflected appraisal encompasses both metaperception and the self-appraisals that influence and result from metaperception.

[4] One might question how self-views could be changed by metaperceptions if the metaperceptions were based on self-views. In this case, concluding that others share one's views of self should change self-views by strengthening the confidence with which they are held.

[5] As Murray et al. (1998) noted, if low self-esteem is indeed a symptom of not feeling socially accepted, it is sadly ironic that low self-esteem individuals have such difficulty accepting the validity of others' expressions of acceptance.

[6] The terms "self-stereotyping" or "metastereotyping" are sometimes used to describe cases of reflected appraisal in which people judge themselves in accordance with the stereotypes they associate with the group(s) to which they belong.

[7] Some early research on the psychological consequences of internet use—before internet use became mainstream behavior—suggested that the socially skilled benefit more from the internet than the socially inept (e.g., Kraut et al., 1998), but the opposite pattern has typically been found in more recent research.