

A Battle of Wills: Self-Verification Versus Behavioral Confirmation

William B. Swann, Jr., and Robin J. Ely
University of Texas at Austin

When a perceiver forms an expectancy about a target individual that is discrepant with that target's self-conception, whose viewpoint will triumph? Although research on behavioral confirmation argues that perceivers will "win" by causing targets to confirm the expectancy, research on self-verification argues that targets will "win" by bringing perceivers to treat them in a manner that confirms their self-conceptions. The research reported here sought to reconcile these competing viewpoints by considering the certainty of perceivers' expectancies and targets' self-conceptions. Perceivers first formed relatively certain or uncertain expectancies about targets that were inconsistent with targets' self-conceptions. They then interacted with targets, who possessed relatively certain or uncertain self-conceptions, in a series of three successive interview sessions. Analyses of the behavior of targets indicated that self-verification always occurred when targets were certain of their self-conceptions. Self-verification also tended to occur when both perceivers and targets were uncertain of their beliefs. Behavioral confirmation tended to occur only when perceivers were certain of their expectancies and targets were uncertain of their self-conceptions. At the end of the experiment, perceivers had generally abandoned their expectancies, but targets revealed no self-rating change. The conditions under which self-verification versus behavioral confirmation occur are discussed.

The image is both familiar and compelling: gladiators fighting to the death, chess masters vying for position, tennis players struggling to sweep the set. Although the battles of will in which most of us participate are ordinarily of a somewhat less graphic variety, they are nevertheless enormously consequential. Some of the most consequential of these clashes are fought in the social arena, when one individual mistakes the identity of another. The nature and outcome of such battles will be the focus of this article.

When one person (the perceiver) develops an erroneous expectancy about another person (the target), one of at least two outcomes may

result. On the one hand, the perceiver may prevail by forcing the target to behave in ways that confirm the expectancy. On the other hand, the target may carry the day by causing the perceiver to revise the expectancy in favor of one that is more in keeping with the target's self-view. These competing outcomes are represented by two independent lines of research. Research favoring the perceiver has been conducted under the banner of the self-fulfilling prophecy or *behavioral confirmation*. Research favoring the target has been dubbed *self-verification*.

Behavioral Confirmation: The Perceiver Prevails

This research and the preparation of this article were supported by grants to William B. Swann, Jr., from the National Institute of Mental Health (MH 37598-01) and from the University of Texas Research Institute. We thank Nancy Hazen, Robin Vallacher, Daniel Wegner, and two anonymous reviewers for their comments on this research and Margaret Sullivan, Randy Batiste, and Kim Woznicki for their assistance in the empirical phases of this investigation.

Requests for reprints should be sent to William B. Swann, Jr., Department of Psychology, University of Texas at Austin, Austin, Texas 78712.

R. K. Merton (1957) introduced the term *self-fulfilling prophecy* to refer to instances in which simply believing something to be true could lead people to behave in ways that cause the belief to come true, even if it was false in the beginning. Rosenthal and his colleagues (for reviews, see Rosenthal, 1976; Rosenthal & Rubin, 1978) were among the first to document the self-fulfilling prophecy in social interaction. Rosenthal and Jacobson (1968), for

example, performed a series of studies in which they informed teachers that some of their pupils were highly gifted. They found that teachers adopted much more effective teaching strategies with the ostensibly gifted pupils. As a result, the "gifted" pupils later outperformed those not so labeled.

Although Rosenthal's teacher-expectancy studies evoked considerable incredulity at first (e.g., Barber & Silver, 1968; Elashoff & Snow, 1971), his findings have been replicated by a number of other investigators in both laboratory investigations (e.g., Meichenbaum, Bowers, & Ross, 1969; Swann & Snyder, 1980; Zanna, Serras, Cooper, & Shaw, 1975) and field studies (e.g., Crano & Mellon, 1978; Seaver, 1973). Moreover, other researchers have shown that such self-fulfilling prophecies are not limited to highly structured interactions in which perceivers have higher status and greater power than do targets. Snyder, Tanke, & Berscheid (1977), for instance, found that men were more friendly and sociable toward women whom they believed to be attractive as compared to unattractive. Women reciprocated the relatively positive or negative overtures of men, thereby providing behavioral confirmation for men's stereotypes associated with physical attractiveness (see also Jones & Panitch, 1971; Kelley & Stahelski, 1970; Kuhlman & Wimberley, 1976; Miller & Holmes, 1975; Snyder & Swann, 1978a, 1978b; Word, Zanna, & Cooper, 1974; Zanna & Pack, 1975).

We shall refer to this process whereby perceivers' expectancies may channel their beliefs about targets so that targets confirm perceivers' beliefs as *behavioral confirmation* (e.g., Snyder et al., 1977). We use behavioral confirmation rather than the more general term *self-fulfilling prophecy* because we wish to restrict our analysis to self-fulfilling prophecies that are mediated by interpersonal mechanisms. The term *self-fulfilling prophecy* is less desirable in this regard because some authors (see, e.g., McArthur & Baron, 1983) have used it to refer to intrapsychic as well as interpersonal phenomena.

Self-Verification: The Target Prevails

Targets obviously do not always confirm the expectancies of perceivers. Consider that peo-

ple's self-concepts serve as an important means of predicting and controlling their social worlds, especially the reactions of others (e.g., Mead, 1934). Insofar as self-conceptions play this important role, people will become invested in seeing to it that these conceptions do not change in any radical way. Lecky (1945), for example, has argued that because an individual's self-concept "is his only guarantee of security, its preservation soon becomes a goal in itself. He seeks the type of experience that confirms and supports the unified attitude and rejects experiences which seem to promise a disturbance of this attitude" (p. 123).

In the spirit of Lecky's (1945) contentions, there is evidence that people resist social feedback that is threatening to their self-conceptions. Early demonstrations of this tendency for targets to resist false social perceptions assumed that such resistance was motivated by ego-defensive or self-enhancement processes (e.g., Jones, 1973). Consistent with this reasoning, researchers showed that targets sought to invalidate *negative* social labels (e.g., Dutton & Lake, 1973; Farina, Allen, & Saul, 1968; Steele, 1975). The proposition that targets might take active steps to resist *positive* evaluations received much less attention.

Recent work has suggested that the critical issue is not whether the self-discrepant label is positive or negative. Instead, the reactions of targets to the expectancies of perceivers appear to hinge on whether the label confirms or disconfirms the self-conceptions of targets. For example, Swann and Hill (1982) showed that when perceivers were induced to form erroneous beliefs about targets who saw themselves as either dominant or submissive, targets quickly provided perceivers with corrective feedback. Whereas self-conceived dominants who had been construed as submissive became all the more assertive, self-conceived submissives who had been mislabeled became all the more docile. Similarly, Swann and Read (1981a, Study 2) reported that just as people who regarded themselves as likable acted to undermine negative appraisals, those who saw themselves as dislikable tended to behave so as to undermine positive appraisals. Indeed, people even go so far as to insulate themselves against self-discrepant feedback by actively soliciting feedback that supports their self-

views (e.g., Swann & Read, 1981b).¹ Therefore, this research on self-verification suggests that targets will work to ensure that perceivers view them in a manner that is consistent with their self-conceptions (for reviews, see Secord & Backman, 1965; Swann, 1983, in press-b).

Certainty of Perceivers' Expectancies and Targets' Self-Conceptions

Given this evidence of both behavioral confirmation and self-verification, the obvious question is, When a perceiver's expectancy disagrees with a target's self-conception, under what conditions will the target behave in ways that confirm the self-view and under what conditions will the target behave so as to confirm the expectancy of the perceiver?

Although there are surely many factors that influence these processes, the *certainty* of perceivers' expectancies about targets may be one especially important factor (cf. Bruner's [1951] early analysis of hypothesis strength). Consider, for example, the widespread assumption that people rely on their expectancies and beliefs as a means of predicting and controlling their social worlds (e.g., Ichheiser, 1949; Kelley, 1971; Kelly, 1955; Mead, 1934). Because highly certain expectancies are presumably better able to serve this prediction and control function than are uncertain ones, people theoretically should be more invested in such beliefs and consequently work harder to sustain them.

There is some evidence that the certainty of perceivers' expectancies influences the manner in which they act on their expectancies. Snyder and Swann (1978b, Investigation 3), for example, found that people who were uncertain of their expectancies were less inclined to seek evidence to support those expectancies than were those who were certain of their expectancies, although this tendency was not statistically reliable. The effects of the certainty variable may have been somewhat muted in this study because perceivers were required to choose from a list of highly leading and presumptuous questions, thereby forcing them to search for evidence that would either clearly confirm or clearly disconfirm their expectancies. In fact, Swann and Giuliano (1983a) obtained convincing support for the

effects of the certainty variable using a procedure in which perceivers were able to choose questions that were much less leading and constraining than those devised by Snyder and Swann. Whereas participants who were certain of their expectancies displayed a strong preference for evidence that was compatible with their expectancies, those who were uncertain of their expectancies displayed no such preference.

What determines the extent to which perceivers are certain of their expectancies? One factor may be the consistency of the evidence perceivers possess regarding the target's characteristics. As the consistency of the evidence supporting the expectancy increases, the certainty of the expectancy should increase. This should cause perceivers to be more persistent in soliciting evidence that will confirm the expectancy, even in the face of discrepant information.

The certainty variable may also be an influential determinant of how targets react to the overtures of perceivers. Given that people theoretically strive to verify their self-conceptions because these conceptions allow them to make predictions concerning the nature of their social worlds, they should work to verify particular self-views only insofar as these views allow them to make such predictions (e.g., Swann, 1983, in press-b). Therefore, if people are highly certain of a given self-conception they should struggle to ensure its survival, because such conceptions presumably offer confident and clear-cut predictions about their social worlds. For example, they should be reluctant to behave in ways that clash with a self-conception that is high in certainty. In contrast, targets who are uncertain of a self-conception should be less motivated to pre-

¹ Of course, in our society it is much more common for targets to resist negative as compared to positive labels. This is probably due to a tendency for most people to possess relatively positive self-concepts (e.g., Swann, Griffin, & Ely, 1983), which may in turn reflect the fact that people in our society generally refrain from giving negative feedback to others (e.g., Blumberg, 1972; Tesser & Rosen, 1975). But whether people's self-conceptions are positive or negative, the important thing is that people attempt to verify them by working to ensure that others see them as they see themselves (see also Swann, in press-b).

serve that self-conception when it is challenged, because such conceptions offer only relatively tentative predictions concerning the nature of social reality. Thus targets who are uncertain of a self-conception may be relatively willing to behave in ways that disconfirm that conception if prompted to do so.

If the relative certainty of perceiver expectancies and target self-conceptions determines whether behavioral confirmation or self-verification occurs, then it is important to specify whether there is an overall tendency for people to be more certain of their expectancies or their self-conceptions. We suspect that most adults generally will be relatively more certain of their self-conceptions because they typically possess more evidence regarding their self-conceptions than their expectancies.² Whereas targets typically can draw on a lifetime of experience in formulating their self-conceptions, perceivers often must fashion expectancies on the basis of relatively meager or scattered evidence. For example, in deciding how extroverted they are, targets usually may sift through a veritable mountain of evidence, including the way they have behaved in countless social situations over the years as well as how people have reacted to them in these situations. In contrast, perceivers must often base their expectancies concerning the extroversion of targets on such limited evidence as the target's occupation, style of clothing, or a casual remark made by an acquaintance of the target. This reasoning suggests that when perceivers' expectancies clash with target's self-conceptions, targets may often possess an advantage.

To test these hypotheses, we conducted a study in which some individuals ("perceivers") sought to learn about other individuals ("targets") by asking them a series of questions. Our procedure was based on the one developed by Snyder and Swann (1978b), with one noteworthy modification. This modification was prompted by recent evidence from our own laboratory (Swann & Giuliano, 1983b) indicating that the interview questions that perceivers spontaneously generate in learning about targets are less constraining than are the ones developed by Snyder and Swann (1978b). That is, in Snyder and Swann's research, perceivers were asked to test for extroversion or introversion by choosing from a list of highly leading and presumptuous questions, such as

"What would you do to liven things up at a party?"³ The questions that Swann and Giuliano's participants wrote were much less constraining and presumptuous, such as "Would you be inclined to liven things up at a party?" To ensure that our participants' queries were representative of those that most undergraduates might ask, we presented our participants with questions that had been generated by a separate sample of individuals who wrote a series of questions to learn about a target individual's extroversion/introversion.

Before choosing questions to ask targets, perceivers in the high-certainty condition received either converging evidence indicating that the target was extroverted or converging evidence indicating that the target was introverted. Perceivers in the low-certainty condition received either mixed evidence that the target was extroverted or mixed evidence that the target was introverted. Regardless of level of certainty, the perceiver's expectancies always conflicted with the target's self-conceptions.

After these manipulations of expectancy and certainty, perceivers interviewed targets in a series of three successive sessions. Some targets viewed themselves as extroverted, whereas others viewed themselves as introverted. Also, some targets were relatively certain of their self-conceived extroversion, and some were relatively uncertain of their self-conceived extroversion. After the final session, both the perceiver and the target rated the target's extroversion. Finally, upon completion of the experimental phase of this research, a group of naive judges rated the extent to which targets appeared extroverted during each session. We anticipated that the following would occur:

1. During Session 1, all perceivers would tend to ask questions that probed for evidence of the expectancy that they had developed (e.g.,

² Some exceptions to this generalization are considered in the General Discussion section of this article.

³ This distinction is important, because targets who are asked the highly constraining questions developed by Snyder and Swann are enjoined by rules of discourse (Grice, 1975) to supply evidence that verifies the premises inherent in the questions. In fact, targets in Snyder and Swann's research almost always accepted the premises inherent in the questions—even when by so doing they answered in ways that were not representative of their true personalities (for a further analysis, see Swann, Giuliano, & Wegner, 1982).

Snyder & Swann, 1978b) but that this tendency would be stronger for those who were highly certain of their expectancies.

2. During Session 1, the behavior of targets would be consistent with their self-conceptions rather than perceiver expectancies because of an overall tendency for the certainty of target self-conceptions to be higher than the certainty of perceiver expectancies. We expected that this would be especially true if targets were highly certain of their self-conceptions.

3. During Session 2, perceivers would curtail their efforts to uncover expectancy-consistent evidence to the extent that they failed to elicit such evidence in Session 1. This should be especially true if their expectancies were low in certainty or target self-conceptions were high in certainty.

4. During Session 2, targets would continue to provide evidence that disconfirmed perceiver expectancies, especially if they were certain of their self-conceptions.

5. During Session 3, perceivers would completely abandon their efforts to uncover evidence to confirm their expectancies because of their lack of success in this pursuit in Sessions 1 and 2.

6. During Session 3, targets would continue to disconfirm the expectancies of perceivers, especially if they were highly certain of their self-conceptions.

Method

Participants

One hundred and twenty eight undergraduate women at the University of Texas at Austin participated in this experiment for credit in their introductory psychology course. Men were excluded from the sample as a matter of convenience; when this research was initiated, relatively more women were available. Pairs of previously unacquainted participants reported to separate waiting rooms. The experimenter possessed no information concerning the perceiver but did possess measures of the target's self-perceived extroversion and associated self-certainty.

Procedure

The initial measures of target self-conception and self-certainty. During a pretesting session at the beginning of the semester, targets rated themselves on ten 5-point bipolar scales designed by Snyder and Swann (1978b) to tap introversion-extroversion. These scales included the following items: talkative-quiet, unsociable-sociable, friendly-unfriendly, poised-awkward, introverted-extroverted, enthusiastic-apatetic, shy-outgoing, energetic-relaxed, cold-warm, and unconfident-confident. The in-

ternal consistency of this index was .80, as assessed by coefficient alpha. Participants then completed the measure of self-certainty by rating how certain they were of their standing on each of these 10 scales. They made these ratings on 5-point scales ranging from 1 (*extremely uncertain*) to 5 (*extremely certain*).⁴ Scores on each of the two scales were divided at the median, thereby allowing us to classify each target as either a self-conceived extrovert or introvert and also as either high or low in self-certainty. When all the items in each scale were averaged, the median for the self-conceived extroversion scale was 3.5; the median for the certainty of self-conception scale was 4.0.

Manipulation of perceiver expectancy and certainty. While the target waited in a separate room, a female experimenter introduced the perceiver to a study of the interview process. The experimenter explained that the participant would be interviewing another individual who had ostensibly served in an earlier study. During this earlier study, the experimenter alleged, several individuals had rated the interviewee, including members of the interviewee's family, several of her friends, and some clinical psychologists who had observed her. On the basis of this information, an attempt was made to characterize the interviewee's personality.

The experimenter then delivered the manipulations of certainty and expectancy. She informed perceivers in the high-certainty condition that the raters of the interviewee were highly consistent; in fact, all of the raters were alleged to have judged the interviewee as either extroverted or introverted. The experimenter then provided perceivers with a single "Personality Summary Sheet," which described the interviewee personality categorization and asserted that 100% of the raters concurred in their impressions. In contrast, perceivers in the low-certainty condition learned that the raters were inconsistent; whereas 60% of the raters rated the interviewee in a manner that was consistent with the expectancy, 40% of the raters expressed precisely the opposite viewpoint. The experimenter provided these perceivers with two Personality Summary Sheets that indicated this lack of consensus. The experimenter explained that the disagreement probably arose because different people are generally exposed to unique information about any given individual. She noted that in these instances the judgments of the majority probably provided the best estimate of the interviewee's personality.

⁴ Our data indicate that this measure of certainty of self-conception is internally consistent (coefficient $\alpha = .85$) and stable over approximately 2 months, $r = .92$. Other research conducted by Vallacher, Bennett, Griffin, and Swann (1983) suggests that self-certainty is closely associated with the amount of evidence people believe that they can recall relevant to their standing on the trait dimension ($r_s = .58$ to $.73$, $mdn = .65$) as well as the perceived consistency of the evidence they could recall ($r_s = .43$ to $.73$, $mdn = .57$). Certainty was only modestly associated with importance ($r_s = .14$ to $.49$, $mdn = .32$) and there was a nonreliable tendency for people to be more certain of a self-concept if they were relatively extreme on that dimension. These later data suggest that self-certainty is related to but distinct from Markus's (1977) concept of schematicity, which varies as an interactive function of importance and extremity.

The personality characterization was based on the descriptions of extroverts and introverts used by Snyder and Swann (1978b). It always conflicted with the target's self-conception (i.e., it indicated introversion if the subject's self-view was extroverted and extroversion if the target's self-view was introverted).

After delivering the expectancy and certainty manipulations, the experimenter informed the perceiver that her task would be to learn either if the interviewee was extroverted (extrovert expectancy) or introverted (introvert expectancy) by asking the interviewee a series of questions. The experimenter then presented the perceiver with a list of 12 questions and instructed her to choose the 5 she would most like to ask. Six of the questions on the list probed for evidence of extroversion (e.g., Do you like to go to big parties? Give reasons for your answer.) and six questions probed for evidence of introversion (e.g., Do you have trouble meeting people and making friends? Give reasons for your answer.). The experimenter then seated perceivers at a table in the experimental cubicle. A partition had been installed on the table to prevent perceivers from seeing targets before and during the interview. This procedure eliminated any possible impact of the target's physical appearance on the perceiver's question-asking strategies.

While the perceiver was choosing her questions, the experimenter went to the target's cubicle and told her that she was going to be interviewed by another person as part of a study of the interview process. The experimenter then escorted the target to the experimental room and seated her across from the perceiver. The experimenter indicated that during the interview, the perceiver should ask the questions she chose without elaboration and that the target should answer the questions honestly and in as much detail as possible. Both participants learned that the experimenter would monitor and tape record the interview. The experimenter then left the experimental room. Participants proceeded with the five question-answer interchanges that constituted Session 1 of the experiment.

After Session 1, the experimenter escorted the target out of the experimental room, leaving the perceiver with instructions to choose 5 more questions from a new list of 12 questions. The new list was identical in general content to the first list (six questions probing for evidence of extroversion and six probing for evidence of introversion) but the specific content of the questions was novel. When the perceiver was ready, the target reentered, and Session 2 of the interview took place in exactly the same manner as in Session 1. Upon completion of Session 2, this procedure was repeated for the third and final interview session.

Following the third interview session, the perceiver rated the target on Snyder and Swann's (1978b) 10 extraversion scales. The perceiver also rated how certain she was of her ratings of the target's extroversion on scales ranging from 1 (*extremely uncertain*) to 7 (*extremely certain*). Meanwhile, the target completed the same measures of self-perceived extroversion and associated self-certainty that they had completed several weeks earlier during the pretest. All participants were assured that their ratings would remain completely confidential.

Naive judges' ratings of targets' responses. When the experimental phase of this investigation was completed, a group of four undergraduates listened to tape recordings of the interviews. After listening to the dialogue between perceivers and targets during each session, they rated the

target's extroversion on Snyder and Swann's (1978b) 10 extroversion scales. The order in which judges listened to the tapes was completely randomized (i.e., by condition and interview-session number). Interrater reliabilities were assessed by intraclass correlation coefficients. They were .92, .89, and .92 for Sessions 1, 2, and 3, respectively.

Results and Discussion

To assess the effects of perceiver expectancy, perceiver certainty, target self-conception, and target certainty on the activities of perceivers and targets, we conducted three successive waves of analyses, one for each of three interview sessions.⁵

Session 1

Perceiver interview strategies. We expected that perceivers would probe for evidence to confirm their expectancies, especially when they were certain of their beliefs about the target. The means displayed in Figure 1a indicate that this was the case. In particular, there was an overall tendency for perceivers who suspected that the target was extroverted to ask more extroverted questions (and fewer introverted questions) than those who suspected that the target was introverted. Planned comparisons revealed that perceivers' preference for expectancy-consistent information was statistically weak and nonreliable among perceivers who were low in certainty, $F < 1$, but strong among perceivers high in certainty, $F(1, 60) = 8.35, p < .01$. These findings suggest that the tendency for perceivers to probe for

⁵ Because we wished to test a series of specific, theoretically derived hypotheses simply and directly, we performed planned comparisons that are appropriate under these conditions (discussions of the conditions under which planned comparisons are called for can be found in Hays, 1973, p. 582; Keppel, 1973, p. 90; Winer, 1971, p. 384). We did do two overall analyses to test the hypothesis that the effects of our independent variables changed over time. We entered our measures of perceiver and target behavior into separate, 2 (perceiver expectancy or target self-conception) \times 2 (perceiver certainty) \times 2 (target certainty) \times 3 (session number, a within-subjects factor) analyses of variance. The analysis of perceiver behavior revealed a main effect of session ($p = .02$), an interaction between session and perceiver expectancy ($p = .007$), and a triple interaction between session, perceiver expectancy, and target certainty ($p = .05$). The analysis of target behavior revealed a main effect of target self-conception ($p = .000$) and interactions between self-conception and session ($p = .011$), self-concept and target certainty ($p = .000$), and perceiver certainty and target certainty ($p = .09$).

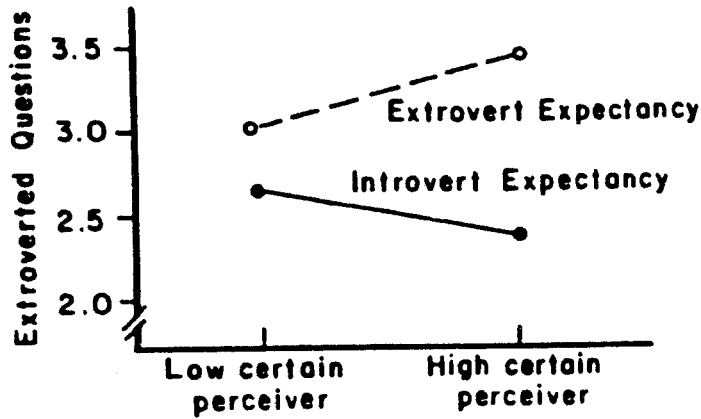
expectancy-consistent evidence will be strongest when perceivers are relatively certain of their expectancies and minimal when they are relatively uncertain of their expectancies.

Target responses. Because we assumed that there would be an overall tendency for targets to be more certain of their self-conceptions than perceivers were of their expectancies, we anticipated that targets would tend to confirm their self-conceptions rather than perceiver ex-

pectancies, especially if they were high in self-certainty. The results supported this prediction. The means plotted in Figure 1b indicate that the behaviors of targets who were low in certainty were generally more in keeping with their self-conceptions than with perceiver expectancies. However, planned comparisons revealed that perceiver certainty made a difference among these targets: Whereas self-conceived extraverts displayed more extroversion

PERCEIVER QUESTIONS

Figure 1a



JUDGES' RATINGS OF TARGET BEHAVIORS

Figure 1b

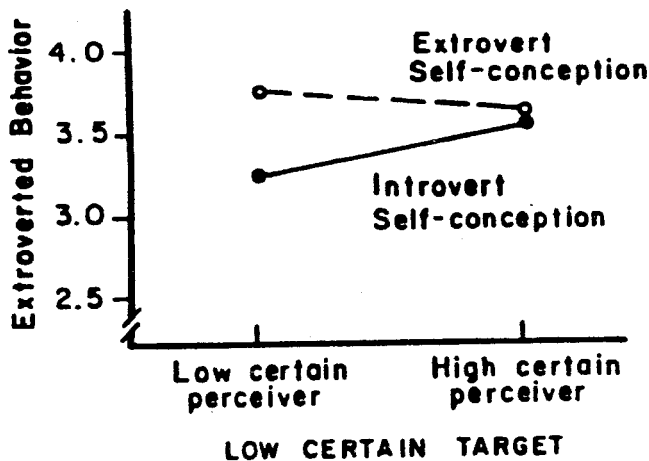


Figure 1c

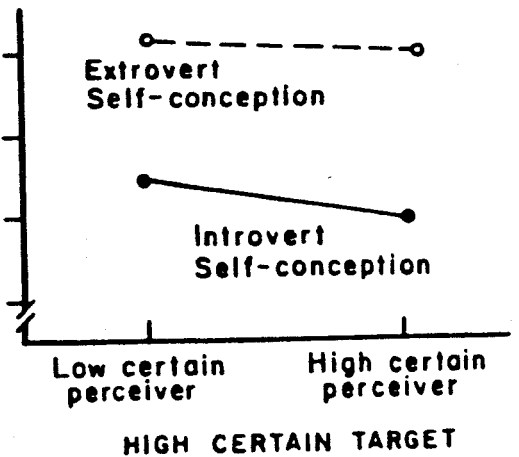


Figure 1. Perceiver and target behaviors during Session 1.

than self-conceived introverts when perceiver certainty was low, $F(1, 56) = 6.25, p < .025$, there were no reliable differences between the two groups when perceiver certainty was high, $F < 1$.

Figure 1c indicates that targets who were high in certainty displayed a much stronger tendency to behave in ways that were consistent with their self-conceptions rather than perceiver expectancies. These targets behaved in a self-consistent manner whether perceiver certainty was high, $F(1, 56) = 26.52, p < .001$, or low, $F(1, 56) = 18.32, p < .001$.

These data indicate that even though most perceivers solicited expectancy-consistent information from targets during Session 1, they generally failed to elicit this information. Their greatest success occurred when they were certain of their expectancies and targets were uncertain of their self-conceptions. Even in this case, however, they did not actually bring targets to confirm their expectancies. Instead, they simply induced self-conceived extroverts to behave in much the same way as self-conceived introverts.

Session 2

Perceiver interview strategies. To understand perceivers' question-asking strategies in the second session, one must first contemplate the events of Session 1. Consider perceivers whose expectancies were relatively low in certainty. The question-asking strategies that these individuals used in Session 1 were only modestly (and nonreliably) influenced by their expectancies. As a result, they failed to elicit confirmatory responses from targets, especially if targets were relatively certain of their self-conceptions. In light of this, we expected them to shift their question-asking strategies and begin to probe for expectancy-inconsistent evidence in Session 2, especially when they were dealing with targets who were high in certainty. The means in Figure 2a suggest that this was true. Planned comparisons, however, revealed that the apparent tendency for these perceivers to probe for evidence inconsistent with their original expectancies was not reliable if targets were low in certainty, $F < 1$, but was reliable if targets were high in certainty, $F(1, 56) = 4.2, p < .05$.

Turning to perceivers who held expectancies that were high in certainty, recall that although these individuals did probe for expectancy-consistent evidence in Session 1, their efforts bore only slightly more fruit than those of low-certain perceivers. Furthermore, their relative success was limited to interactions with targets who were low in certainty. Consequently, we expected these perceivers to suspend or at least diminish their efforts to unearth expectancy-consistent evidence from targets in Session 2. Just such a pattern of means are displayed in Figure 2b. High-certain perceivers displayed no reliable preference for expectancy-consistent evidence whether targets were low or high in self-certainty, $F_s < 1$.

Target responses. The behaviors of targets in Session 2 were similar to their behaviors in Session 1. Figure 2c indicates that among targets who were low in certainty, perceiver certainty again made a slight, nonreliable difference. The means suggest that targets behaved in a manner that was consistent with their self-conceptions if perceiver certainty was low, but consistent with perceiver expectancies if perceiver certainty was high. This latter finding deviates slightly from the comparable finding in Session 1, because here the means are actually in the direction of a behavioral-confirmation effect. Planned comparisons, however, revealed that these means were not reliably different from one another, whether perceiver certainty was low, $F(1, 56) = 1.8, ns$, or high, $F < 1$.

Among targets high in certainty, self-conceived extroverts appeared more extroverted than did self-conceived introverts. Figure 2d indicates that this was true regardless of whether perceiver certainty was low, $F(1, 56) = 15.05, p < .001$, or high, $F(1, 56) = 19.71, p < .001$.

The results of Session 2 testify to the impact of target self-conceptions on perceivers' question-asking strategies, especially in those instances in which targets were highly certain of their self-conceptions or perceivers were uncertain of their expectancies. Support for the impact of perceiver expectancies on target behavior was considerably more modest. Indeed, perceivers only came close to eliciting behavioral confirmation for their initial expectancies when they held highly certain expectancies and

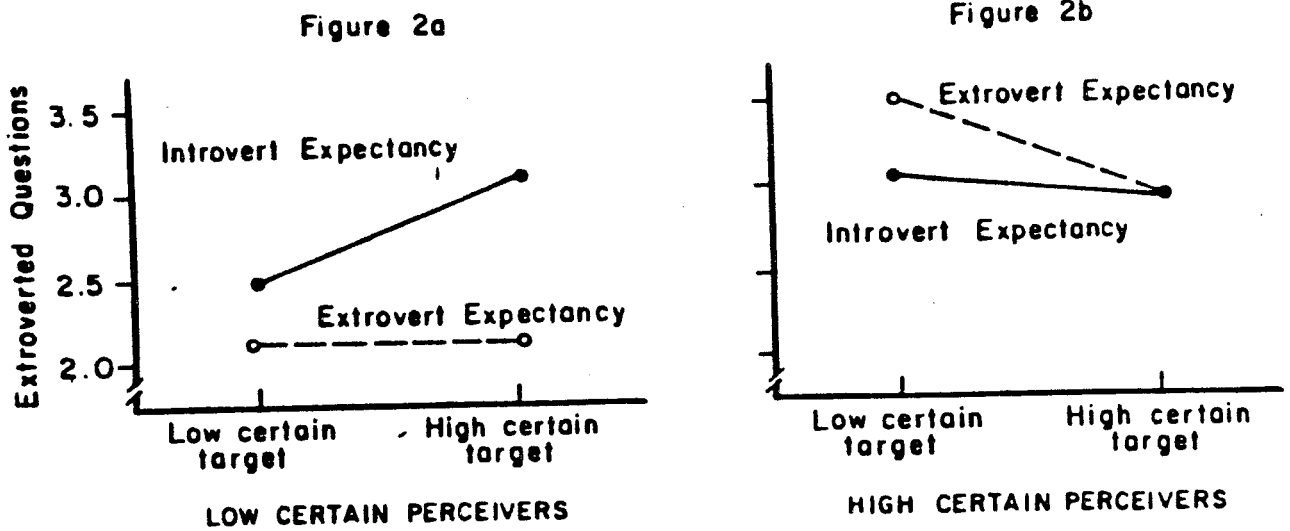
targets were uncertain of their self-conceptions. Even in this instance, however, the tendency for targets to provide expectancy-consistent evidence was not statistically reliable.

perceivers with expectancy-consistent evidence in the first two sessions, we suspected that perceivers would abandon efforts to elicit such information in Session 3. This was the case; the questions perceivers asked in Session 3 did not differ as a function of their expectancies, whether targets were high or low in certainty, all $F_s(1, 56) < 2.66, ns$. The relevant means are shown in Figure 3a and 3b.

Session 3

Perceiver interview strategies. In light of the steadfast refusal of most targets to provide

PERCEIVER QUESTIONS



JUDGES' RATINGS OF TARGET BEHAVIORS

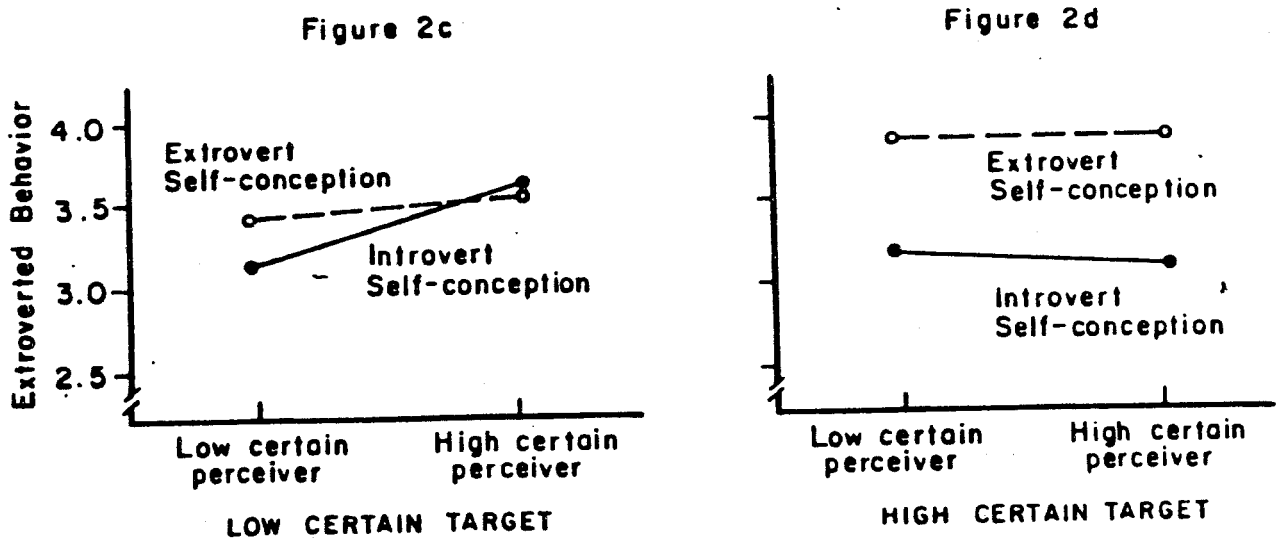


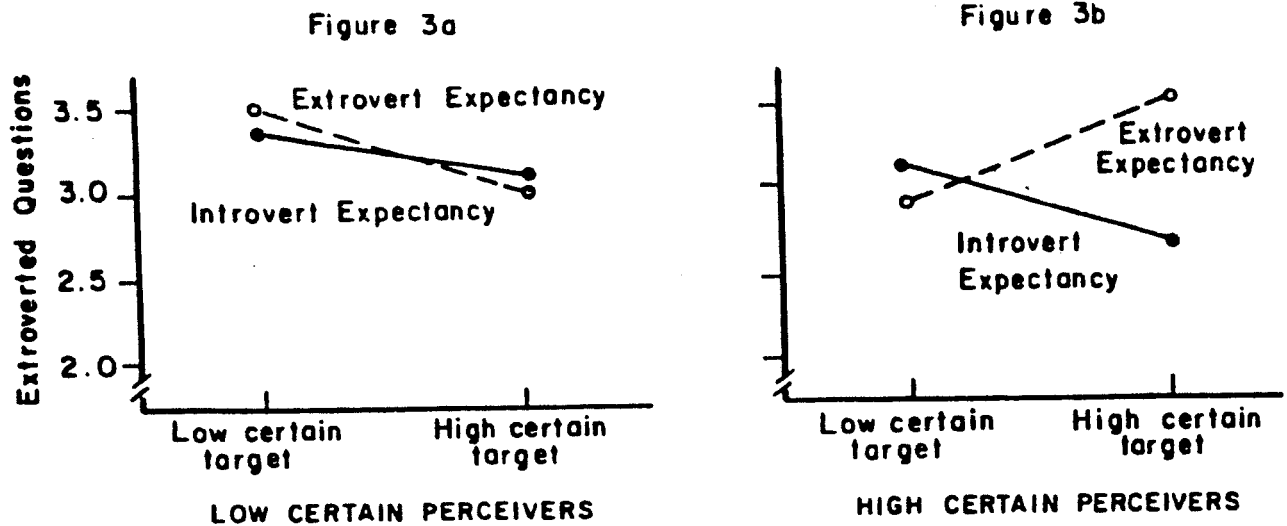
Figure 2. Perceiver and target behaviors during Session 2.

Target responses. In Session 3, targets displayed the same pattern of behavior as they had in Session 2. Figure 3c features the means for targets who were low in certainty. As in Session 2, the means suggest that these targets behaved in a manner that was consistent with their self-conceptions when perceivers were uncertain of their expectancies, and in a manner that was consistent with perceiver expectancies when perceivers were certain of their expectancies.

However, these trends were not reliable, whether perceivers' certainty was low, $F(1, 56) = 2.02, ns$, or high, $F < 1$.

Figure 3d reveals that targets who were high in certainty always behaved in a manner that confirmed their self-conceptions, whether perceiver certainty was low, $F(1, 56) = 6.81, p < .01$, or high, $F(1, 56) = 12.32, p < .01$.

PERCEIVER QUESTIONS



JUDGES' RATINGS OF TARGET BEHAVIORS

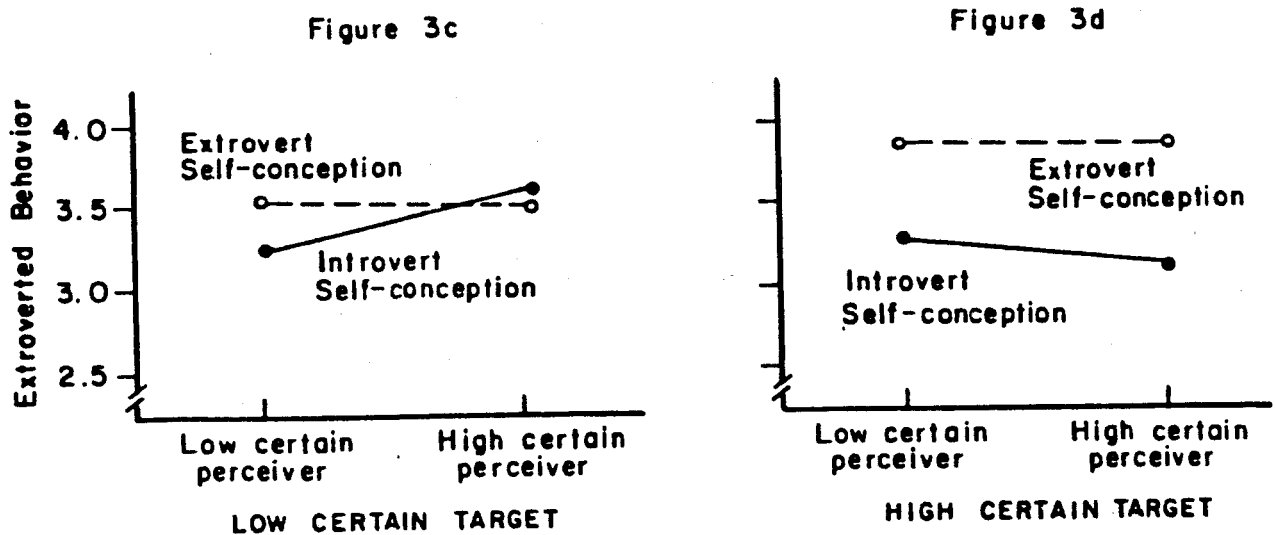


Figure 3. Perceiver and target behaviors during Session 3.

Postinterview Measures

Perceivers' final impressions of targets. In light of the complex transactions that occurred between perceivers and targets during the three interview sessions and the impossibility of specifying the extent to which perceivers' final ratings of targets might be biased due to selective attention, encoding or interpretation, we were unable to predict how they would rate targets after Session 3. Lacking such a priori predictions, we entered the perceivers' postinterview ratings of the targets into a $2 \times 2 \times 2$ (perceiver certainty \times target trait \times target certainty) least squares analysis of variance. This analysis revealed an interaction between target self-conception and perceiver certainty, $F(1, 56) = 5.04, p < .03$. Simple effects analyses showed that perceivers low in certainty completely revised their beliefs about targets so that they attributed more extroversion to self-conceived extroverts than to self-conceived introverts, $M_s = 4.66$ and 4.09 , respectively, $F(1, 56) = 11.76, p < .005$. Although perceivers high in certainty did adjust their initial expectancies in the direction of target self-conceptions, they did not adjust their ratings as much as did their counterparts who were low in certainty. Specifically, they rated self-conceived extroverts only slightly and nonreliably more extroverted than did self-conceived introverts, $M_s = 4.4$ and 4.35 , respectively, $F < 1$. No other effects emerged in this analysis, all $F_s < 1.66, ns$.

Analysis of the certainty of perceiver expectancies after the experiment revealed a marginally reliable main effect of target certainty only, $F(1, 58) = 3.38, p = .07$, such that perceivers were less certain of their expectancies when they had interacted with targets who were low as compared to high in certainty.

Targets' final self-ratings. Analyses of the postinterview target measures revealed no reliable changes in target self-ratings toward perceiver expectancies as a function of perceiver certainty, target certainty, or the interaction between the two. There was, however, a nonreliable effect of perceiver certainty, $F(1, 58) = 2.93, p < .09$, such that targets shifted slightly in the direction of perceiver expectancies when perceiver certainty was high and slightly toward their initial self-conceptions when perceiver

certainty was low. Self-conception change summed across all conditions was away from perceiver expectancies. Likewise, there was no change in target self-certainty, all $F_s < 1$.

Changes in Perceiver and Target Behaviors Over Time⁶

Increases in the certainty of perceiver expectancies and target self-conceptions were associated with increases in the stability of their behavior. When we computed correlations between the number of extraverted questions perceivers asked in each of the three sessions, we found that the average correlation was reliable among perceivers high in certainty, $r(30) = .39, p < .05$, but unreliable among perceivers low in certainty, $r(30) = .05, ns$. Similarly, when we averaged the judges' ratings of target behaviors across the three interview sessions, we found that targets who were relatively certain of their self-conceptions displayed slightly more behavioral stability, average $r(30) = .83$, than did those who were relatively uncertain of their self-conceptions, average $r(30) = .66$. Both of these correlations were statistically different from zero but not from each other.

To assess the relative impact of perceiver expectancies on the behavior of targets, we computed correlations between the number of extraverted questions perceivers asked and the extent to which judges rated targets as extraverted. Over the three sessions, the average correlation was $.09, ns$, indicating that the questions perceivers asked had little direct impact on how extraverted targets appeared in the eyes of objective raters.

Additional analyses suggested that the flow of influence in the interactions between perceivers and targets was primarily target-to-perceiver rather than the other way around. In particular, targets showed little change in the amount of extraversion they displayed from Session 1 to Session 3, $r(62) = .81, p < .001$, whereas perceivers shifted their search strategies considerably from Session 1 to Session

⁶ Some related statistical analyses can be found in Footnote 5.

3, $r(62) = .235$, *ns*. The difference between these two correlations was highly reliable, $z = 3.73$, $p < .001$.

General Discussion

When a perceiver forms an expectancy about a target that is at odds with the target's view of the self, what factors determine whether the perceiver's expectancy or the target's self-conception prevails? Our findings indicate that the certainty of perceivers' expectancies and targets' self-conceptions will play a pivotal role in determining whether perceivers or targets emerge victorious from such conflicts. In this investigation, targets who were relatively certain of their self-conceptions always behaved in ways that were compatible with their self-conceptions, whether perceivers were relatively certain or uncertain of their expectancies. In contrast, targets who were uncertain of their self-conceptions tended to behave in a self-consistent manner only when perceivers were relatively uncertain of their expectancies. When perceivers were relatively certain of their expectancies, targets low in self-certainty displayed a nonreliable tendency to confirm perceiver expectancies and disconfirm their self-conceptions, at least in the last two interview sessions.

Perhaps the most direct and compelling answer to the question of who won the battle of wills in our experiment is provided by the correlational evidence. These data clearly suggest that it was the targets who triumphed—whereas targets continued to behave in a self-consistent manner despite pressure to behave otherwise from perceivers, perceivers abandoned their efforts to uncover evidence to support their expectancies. In light of this, it is not surprising that targets emerged from the experiment with their self-conceptions intact, whereas perceivers eschewed their expectancies in favor of impressions of targets that were more in keeping with targets' self-conceptions.

Our data will surely tempt some readers to conclude that targets generally will "win" when perceivers challenge their self-conceptions and that previous demonstrations of the self-fulfilling consequences of perceiver expectancies (e.g., Darley & Fazio, 1980; Rosenthal, 1976; Snyder, 1981) are somehow flawed or mistaken. Such a conclusion, however, is not in

the spirit of our analysis nor is it warranted by our data. Note, for example, that the research design used in our investigation was quite different from those used by self-fulfilling prophecy researchers. Whereas previous researchers have typically allowed target self-conceptions to vary at random, we deliberately pitted target self-conceptions against perceiver expectancies. Conceivably, in the earlier research perceiver expectancies worked more by bringing individuals who possessed expectancy-consistent self-concepts to behave in ways that exemplified their self-views than by bringing those who possessed expectancy-discrepant self-concepts to behave in ways that conflicted with their self-views.

In any event, we believe that the real contribution of our research resides in pointing to some of the key variables that determine the outcome of clashes between perceiver expectancies and target self-conceptions. In what follows, we offer a preliminary theoretical analysis of several of these variables and how they may operate.

Certainty of Perceiver Expectancies and Target Self-Conceptions

In our research, targets who were highly certain of their self-conceptions offered little in the way of behavioral evidence to support the erroneous expectancies of perceivers. Even targets who were low in certainty offered minimal support for erroneous expectancies, although there was a slight, nonreliable tendency for them to do so if perceivers were highly certain of their expectancies. This finding has important implications, because, if targets are able to resist efforts to change their behavior in this manner, they may be immune to the self-concept change that may sometimes accompany change in their overt behavior (e.g., Fazio, Effrein, & Falender, 1981; Snyder & Swann, 1978a). In line with this, it is interesting to note that our participants displayed substantial stability in their self-ratings as well as in their behaviors.

The tendency for our targets' self-conceptions to prevail over perceiver expectancies may reflect the fact that most of our targets were quite certain of their self-conceptions. For example, the median certainty score in our sample was 4.0 on a 5-point scale. We suspect that

people are often more certain of their self-conceptions than they are of their expectancies. After all, whereas people often possess a lifetime of evidence on which to base their views of the self, their expectancies may often dangle on a precariously thin thread of evidence. In addition, because people's self-conceptions theoretically occupy a central position in their knowledge system (e.g., Epstein, 1973), over time these self-conceptions probably become intertwined with a large number of related beliefs. In such integrated knowledge systems, each belief tends to be supported by its neighbors, thereby bolstering the plausibility and certainty of individual beliefs and self-conceptions.

Nevertheless, there is a large and important class of instances in which perceivers are more apt to be certain of their expectancies than targets are of their self-conceptions. For example, consider the elementary school teacher who learns that a pupil has scored exceptionally well or poorly on an aptitude test. Such teachers may develop an extremely certain expectancy about the pupil's native ability due to the alleged diagnosticity of the test. Add to this the fact that pupils will probably possess relatively uncertain self-conceptions with respect to academic ability because they lack experience, and one will have created an optimal set of conditions for the operation of expectancy effects (for empirical evidence, see Rosenthal & Jacobson, 1968).

Perceivers are also likely to be highly certain of expectancies for which they receive a great deal of consensual validation. At times, perceivers may receive such validation from a small but important subset of interaction partners. Clinicians, for example, may become highly certain of the links between particular behaviors and associated diagnostic categories because they receive a great deal of support for their expectancies from their colleagues. They may therefore diligently probe for evidence that will support their expectancies during therapy (e.g., Frank, 1973). Furthermore, because people who enter therapy may often do so out of feelings of uncertainty about themselves, therapists may often find that their clients are eager to offer evidence to support their expectancies—even if these expectancies were false in the beginning.

At other times, perceivers may develop

highly certain expectancies in response to consensual validation from a large segment of society, as in the case of social stereotypes. Witness the fact that some of the most compelling demonstrations of behavioral confirmation have involved expectancies concerning stereotypes, such as those associated with physical attractiveness (e.g., Snyder et al., 1977) and sex roles (e.g., Skrypnek & Snyder, 1982, Zanna & Pack, 1975). In such instances, the pervasiveness of an expectancy will encourage perceivers to behave in ways that cause the expectancy to come true.

Structure of the Interpersonal Relationship

The relationships between perceivers and targets studied in this investigation were in many ways ideally suited for self-verification, because targets could provide perceivers with explicit verbal feedback concerning the validity of perceivers' expectancies. We suspect that whenever it is so easy for targets to provide perceivers with corrective feedback, expectancy effects will be rare.

Of course, the structure of many interpersonal relationships prevents targets from providing perceivers with explicit corrective feedback. First, if perceivers form expectancies of targets that are negative, they simply may avoid them in the future, thereby making it impossible for targets to provide them with corrective feedback (cf. Wegner & Vallacher, 1977). Second, if the perceiver is highly credible or has high status, targets may be unwilling or unable to challenge their viewpoint. This may be one factor underlying the reported prevalence of expectancy effects in teaching (e.g., Rosenthal & Jacobson, 1968) and therapy situations (e.g., Frank, 1973). Third, targets will sometimes be unable to refute a perceiver's expectancy due to logical paradox (e.g., Watzlawick, Weakland, & Fisch, 1974). For instance, the man whose wife asserts that he is not sufficiently spontaneous can do little to undermine her expectancy, because she may attribute any signs of spontaneity on his part to simple compliance rather than to "true" spontaneity. Finally, if the relationship is structured so that most communication takes place nonverbally, then explicit verbal feedback will be relatively ineffective.

If any of the four factors discussed prevent targets from providing perceivers with explicit corrective feedback, then it becomes likely that perceivers will persist in their expectancies and continue to solicit expectancy-consistent evidence from targets. To be sure, targets may provide perceivers with relatively subtle, non-explicit feedback. Perceivers, however, may assimilate such subtle feedback to their initial expectancies (e.g., Bruner, 1957; Langer & Abelson, 1974; Rosenhan, 1973; Zadny & Gerard, 1974), thereby undermining the potential corrective value of such feedback.

Goals of Perceivers and Targets

Perceivers and targets may bring a wide variety of goals with them to their interactions that may determine whether perceiver expectancies or target self-conceptions prevail (cf. Jones & Thibaut, 1958). In our investigation, perceivers were induced to formulate accurate impressions of targets. Although formulating accurate impressions is surely a common goal, it is not the only one that perceivers bring with them to their interactions. At times, perceivers may be motivated to maintain a certain expectancy about a target (e.g., the new bride who has a positive impression of her spouse). At other times, perceivers may have every reason to revise an expectancy (e.g., the new parents who suspect that their child is dullwitted). And as Swann (in press-a) has argued, even in those instances in which perceivers are motivated to form accurate images of targets, there may be important differences in the range of contexts in which those images must accurately predict the actions of targets. For example, perceivers may sometimes be more concerned with predicting how targets will behave in their presence (personal accuracy) than with how targets will behave in the presence of all the perceivers they encounter (transpersonal accuracy). Similarly, perceivers may wish to predict the behavior of targets within a single context (contextual accuracy) or across several different contexts (transcontextual accuracy).

Targets may also work to perpetuate or undermine expectancies as a function of the goals they bring with them to the interaction. We suspect that targets are generally motivated to ensure that perceivers view them accurately. One reason for this is that if they succeed, they will be assured of self-confirmatory feedback, which should stabilize their self-conceptions

and enhance their perceptions of control (e.g., Swann, 1983, in press-b). In addition, targets who bring perceivers to view them accurately will make themselves predictable to perceivers. As Athay and Darley (1981) note, targets must make themselves predictable to perceivers lest perceivers decide that targets are unmanageable and leave the interaction. Being predictable, then, is a prerequisite for sustaining interactions long enough to attain interaction goals such as gaining someone's favor, maintaining a relationship, or changing someone's opinion (see also Goffman, 1959). From this perspective, our procedure of instructing targets to answer the queries of perceivers as accurately as possible may have fostered orientations that were representative of the orientations that they characteristically possess in their everyday interactions.

Of course, there are instances in which targets behave in ways that encourage perceivers to misconstrue them. Sometimes they may do so innocently, as when they misrepresent their personalities to perceivers in an effort to follow rules of conversation. Grice (1975), for example, has noted that people engaged in conversation characteristically attempt to follow the cooperative principle, which stipulates that participants accept the premises inherent in the questions and statements of their interaction partners and respond accordingly (see Swann et al., 1982, for a further discussion). At other times targets may deceive perceivers in the service of less admirable motives; the confidence man, the pool shark, and the dishonest politician offer all-too-familiar examples of such individuals. What makes these deliberate misrepresentations of self so effective is that they occur so rarely; indeed, if everyone were in the business of presenting themselves inaccurately to others, it is unlikely that anyone would gain from such efforts.

Conclusions

Over the last two decades researchers have provided fairly compelling evidence that perceivers' expectancies about targets sometimes lead them to treat targets in ways that cause targets to provide behavioral confirmation for their initial expectancies (e.g., Rosenthal, 1976; Snyder, 1981). More recent research has shown that people's beliefs about themselves also have self-fulfilling properties; in particular, target individuals self-verify by soliciting feedback

from perceivers that is consistent with their self-conceptions (e.g., Swann, 1983, in press-b). Much of the time, these behavioral-confirmation and self-verification processes work hand in hand; while perceivers formulate veridical impressions of targets and treat them accordingly, targets welcome the self-confirmatory feedback that perceivers send their way (e.g., Boissevain, 1974; Boissevain & Mitchell, 1973; Goffman, 1959). On some occasions, however, something goes awry, and perceivers form beliefs about targets that are at odds with targets' self-views. Under these conditions a battle of wills may ensue, with perceivers struggling to confirm their expectancies and targets striving to verify their self-conceptions.

The research reported here sought to identify some of the critical factors that determine who prevails in such battles of will. Our data suggest that the certainty of perceiver expectancies and target self-conceptions are two such factors. Self-verification occurred whenever targets were certain of their self-conceptions and, to a somewhat lesser extent, when both perceivers and targets were uncertain of their beliefs. Behavioral confirmation tended to occur when perceivers were certain of their expectancies and targets were uncertain of their self-conceptions. These findings indicate that when perceivers and targets lock horns, the certainty variable will be a major determinant of who emerges the victor.

References

- Athay, M., & Darley, J. M. (1981). Toward an interaction centered theory of personality. In N. Cantor & J. F. Kihlstrom (Eds.), *Personality, cognition, and social interaction* (pp. 281-308). Hillsdale, NJ: Erlbaum.
- Barber, T. X., & Silver, M. J. (1968). Pitfalls in data analysis and interpretation: A reply to Rosenthal. *Psychological Bulletin*, 70, 48-62.
- Blumberg, H. H. (1972). Communication of interpersonal evaluations. *Journal of Personality and Social Psychology*, 23, 157-162.
- Boissevain, J. (1974). *Friends of friends: Networks, manipulators and coalitions*. Oxford, Blackwell.
- Boissevain, J., & Mitchell, J. C. (1973). *Network analysis: Studies in human interaction*. The Hague, The Netherlands: Mouton.
- Bruner, J. S. (1951). Personality dynamics and the process of perceiving. In R. R. Blake & G. V. Ramsey (Eds.), *Perception—an approach to personality* (pp. 121-147). New York: Ronald Press.
- Bruner, J. S. (1957). On perceptual readiness. *Psychological Review*, 64, 123-152.
- Crano, W. D., & Mellon, P. M. (1978). Causal influence of teachers' expectations on children's academic performance: A cross-lagged panel analysis. *Journal of Educational Psychology*, 70, 39-49.
- Darley, J. M., & Fazio, R. H. (1980). Expectancy confirmation processes arising in the interaction sequence. *American Psychologist*, 35, 867-881.
- Dutton, D. G., & Lake, R. A. (1973). Threat of own prejudice and reverse discrimination in interracial situations. *Journal of Personality and Social Psychology*, 28, 94-100.
- Elashoff, J. D., & Snow, R. E. (1971). *Pygmalion reconsidered*. Worthington, OH: Charles A. Jones.
- Epstein, S. (1973). The self-concept revisited: Or a theory of a theory. *American Psychologist*, 28, 404-416.
- Farina, A., Allen, J. G., & Saul, B. (1968). The role of the stigmatized person in affecting social relationships. *Journal of Personality*, 36, 169-182.
- Fazio, R. H., Effrein, E. A., & Falender, V. J. (1981). Self-perceptions following social interaction. *Journal of Personality and Social Psychology*, 41, 232-242.
- Frank, J. D. (1973). *Persuasion and healing: A comparative study of psychotherapy*. Baltimore, MD: Johns Hopkins University Press.
- Goffman, E. (1959). *The presentation of self in everyday life*. New York: Anchor Books.
- Grice, H. P. (1975). Logic in conversation. In P. Cole & J. L. Morgan (Eds.), *Syntax and semantics* (Vol. 3, pp. 41-58). New York: Academic Press.
- Hays, W. L. (1973). *Statistics for the social sciences* (2nd ed.). New York: Holt, Rinehart & Winston.
- Ichheiser, G. (1949). Misunderstanding in human relations: A study in false social perception. *American Journal of Sociology*, 55, 1-70.
- Jones, E. E., & Thibaut, J. W. (1958). Interaction goals as bases of inference in interpersonal perception. In R. Tagiuri & L. Petrullo (Eds.), *Person perception and interpersonal behavior* (pp. 151-178). London: Oxford University Press.
- Jones, S. C. (1973). Self- and interpersonal evaluations: Esteem theories versus consistency theories. *Psychological Bulletin*, 79, 185-199.
- Jones, S. C., & Panitch, D. (1971). The self-fulfilling prophecy and interpersonal attraction. *Journal of Experimental Social Psychology*, 7, 356-366.
- Kelley, H. H. (1971). Attribution in social interaction. In E. E. Jones, D. Kanouse, H. H. Kelley, R. E. Nisbett, S. Valins, & B. Weiner (Eds.), *Attribution: Perceiving the causes of behavior* (pp. 1-26). New York: General Learning Press.
- Kelley, H. H., & Stahelski, A. J. (1970). The social interaction basis of cooperators' and competitors' beliefs about others. *Journal of Personality and Social Psychology*, 16, 66-91.
- Kelly, G. A. (1955). *The psychology of personal constructs*. New York: Norton.
- Keppel, G. (1973). *Design and analysis: A researcher's handbook*. Englewood Cliffs, NJ: Prentice-Hall.
- Kuhlman, D. M., & Wimberley, P. L. (1976). Expectations of choice behavior held by cooperators, competitors, and individualists across four classes of experimental gain. *Journal of Personality and Social Psychology*, 34, 69-81.
- Langer, E. J., & Abelson, R. P. (1974). A patient by any other name. . . : Clinician group difference in labeling bias. *Journal of Consulting and Clinical Psychology*, 42, 4-9.

- Lecky, P. (1945). *Self-consistency: A theory of personality*. New York: Island Press.
- Markus, H. (1977). Self-schemata and processing information about the self. *Journal of Personality and Social Psychology*, *35*, 63-78.
- McArthur, L. Z., & Baron, R. M. (1983). Toward an ecological theory of social perception. *Psychological Review*, *90*, 215-238.
- Mead, G. H. (1934). *Mind, self, and society*. Chicago: University of Chicago Press.
- Meichenbaum, D. H., Bowers, K. S., & Ross, R. R. (1969). A behavioral analysis of teacher expectancy effects. *Journal of Personality and Social Psychology*, *13*, 306-313.
- Merton, R. K. (1957). *Social theory and social structure*. Glencoe, IL: Free Press.
- Miller, D. T., & Holmes, J. G. (1975). The role of situational restrictiveness on self-fulfilling prophecies: A theoretical and empirical extension of Kelley and Stahelski's triangle hypothesis. *Journal of Personality and Social Psychology*, *31*, 661-673.
- Rosenhan, D. L. (1973). On being sane in insane places. *Science*, *179*, 250-258.
- Rosenthal, R. (1976). *Experimenter effects in behavioral research*. New York: Appleton-Century-Crofts.
- Rosenthal, R., & Jacobson, L. (1968). *Pygmalion in the classroom*. New York: Holt.
- Rosenthal, R., & Rubin, D. B. (1978). Interpersonal expectancy effects: The first 345 studies. *The Behavioral and Brain Sciences*, *3*, 377-415.
- Seaver, W. B. (1973). Effects of naturally induced teacher expectancies. *Journal of Personality and Social Psychology*, *28*, 333-342.
- Secord, P. F., & Backman, C. W. (1965). An interpersonal approach to personality. In B. A. Maher (Ed.), *Progress in experimental personality research* (Vol. 2, pp. 91-125). New York: Academic Press.
- Skrypnik, B. J., & Snyder, M. (1982). On the self-perpetuating nature of stereotypes about men and women. *Journal of Experimental Social Psychology*, *18*, 277-291.
- Snyder, M. (1981). On the self-perpetuating nature of social stereotypes. In D. L. Hamilton (Ed.), *Cognitive processes in stereotyping and intergroup behavior* (pp. 277-303). Hillsdale, NJ: Erlbaum.
- Snyder, M., & Swann, W. B., Jr. (1978a). Behavioral confirmation in social interaction: From social perception to social reality. *Journal of Experimental Social Psychology*, *14*, 148-162.
- Snyder, M., & Swann, W. B., Jr. (1978b). Hypothesis-testing processes in social interaction. *Journal of Personality and Social Psychology*, *36*, 1202-1212.
- Snyder, M., Tanke, E. D., & Berscheid, E. (1977). Social perception and interpersonal behavior: On the self-fulfilling nature of social stereotypes. *Journal of Personality and Social Psychology*, *35*, 656-666.
- Steele, C. M. (1975). Name-calling and compliance. *Journal of Personality and Social Psychology*, *31*, 361-369.
- Swann, W. B., Jr. (1983). Self-verification: Bringing social reality into harmony with the self. In J. Suls & A. G. Greenwald (Eds.), *Social psychological perspectives on the self* (Vol. 2, pp. 33-66). Hillsdale, NJ: Erlbaum.
- Swann, W. B., Jr. (in press-a). The quest for accuracy in person perception: A matter of pragmatics. *Psychological Review*.
- Swann, W. B., Jr. (in press-b). The self as architect of social reality. In B. Schlenker (Ed.), *The self and social life*. New York: McGraw-Hill.
- Swann, W. B., Jr., Griffin, J. J., & Ely, R. (1983). *Self-certainty and self-regard*. Manuscript in preparation, University of Texas at Austin.
- Swann, W. B., Jr., & Giuliano, T. (1983a). *Belief certainty and strategies of information seeking*. Unpublished manuscript, University of Texas at Austin.
- Swann, W. B., Jr., & Giuliano, T. (1983b). *Confirmatory search strategies in social interaction: Why, how, and with what consequences*. Manuscript in preparation, University of Texas at Austin.
- Swann, W. B., Giuliano, T., & Wegner, D. M. (1982). Where leading questions can lead: The power of conjecture in social interaction. *Journal of Personality and Social Psychology*, *42*, 1025-1035.
- Swann, W. B., Jr., & Hill, C. A. (1982). When our identities are mistaken: Reaffirming self-conceptions through social interaction. *Journal of Personality and Social Psychology*, *43*, 59-66.
- Swann, W. B., Jr., & Read, S. J. (1981a). Acquiring self-knowledge: The search for feedback that fits. *Journal of Personality and Social Psychology*, *41*, 1119-1128.
- Swann, W. B., Jr., & Read, S. J. (1981b). Self-verification processes: How we sustain our self-conceptions. *Journal of Experimental Social Psychology*, *17*, 351-372.
- Swann, W. B., Jr., & Snyder, M. (1980). On translating beliefs into action: Theories of ability and their application in an instructional setting. *Journal of Personality and Social Psychology*, *38*, 879-888.
- Tesser, A., & Rosen, S. (1975). The reluctance to transmit bad news. In L. Berkowitz (Ed.), *Advances in experimental social psychology* (Vol. 8, pp. 193-232). New York: Academic Press.
- Vallacher, R. R., Bennett, J., Griffin, J. J., & Swann, W. B., Jr. (1983). [Self-certainty and related constructs]. Unpublished raw data.
- Watzlawick, P., Weakland, J. H., & Fisch, R. (1974). *Change: Principles of problem formation and problem resolution*. New York: Norton.
- Wegner, D. M., & Vallacher, R. R. (1977). *Implicit psychology: An introduction to social cognition*. New York: Oxford University Press.
- Winer, B. J. (1971). *Statistical principles in experimental design* (2nd ed). New York: McGraw-Hill.
- Word, C. O., Zanna, M. P., & Cooper, J. (1974). The nonverbal mediation of self-fulfilling prophecy effects in interracial interaction. *Journal of Experimental Social Psychology*, *10*, 109-120.
- Zadny, J., & Gerard, H. B. (1974). Attributed intentions and informational selectivity. *Journal of Experimental Social Psychology*, *10*, 34-52.
- Zanna, M. P., & Pack, S. J. (1975). On the self-fulfilling nature of apparent sex differences in behavior. *Journal of Experimental Social Psychology*, *11*, 583-591.
- Zanna, M. P., Sheras, P., Cooper, J., & Shaw, C. (1975). Pygmalion and Galatea: The interactive effect of teacher and student expectancies. *Journal of Experimental Social Psychology*, *11*, 279-287.

Received August 8, 1983

Revision received November 2, 1983 ■