

# The Disparity Between the Actual and Assumed Power of Self-Interest

Dale T. Miller and Rebecca K. Ratner  
Princeton University

Five studies examined the hypothesis that people overestimate the influence of self-interest on attitudes and behaviors. The results strongly supported the hypothesis. In Study 1, participants overestimated the impact that financial reward exerted on their peers' willingness to donate blood. In 4 subsequent studies, participants overestimated the impact that group membership had on their peers' attitudes (Studies 2, 3, and 4) and behaviors (Study 5). The tendency to overestimate the impact of self-interest on others was largely unrelated to the impact that it had on participants' own attitudes and behaviors. Implications of the lay person's belief in the power of self-interest are discussed.

How powerful is the motive of self-interest? All powerful, according to some of the most influential theories of human motivation. Evolutionary biology, neoclassical economics, behaviorism, and psychoanalytic theory all assume that people actively and single-mindedly pursue their self-interest, whether it takes the form of reproductive fitness, utility maximization, reinforcement, or the pursuit of pleasure (Schwartz, 1986). Mounting empirical evidence, on the other hand, tells a different story. Much of the most interesting social science research of the last 20 years points to inadequacy of self-interest models of behavior (for reviews, see Batson, 1991; Etzioni, 1988; Kohn, 1990; Lerner, 1980; Mansbridge, 1990; Sears & Funk, 1990, 1991; Sen, 1977; Tyler & Dawes, 1993). For example, we now know that people often care more about the fairness of the procedures they are subjected to than about the material outcomes these procedures yield (Tyler, 1990), that they often care more about their group's collective outcomes than about their personal outcomes (Dawes, van de Kragt, & Orbell, 1988), and that their attitudes toward public policies are often shaped more by their values and ideologies than by the impact these policies have on their material well-being (Sears & Funk, 1990, 1991).

## Lay Theories of Self-Interest

Despite its long history, debate concerning the power of self-interest has largely ignored the question of greatest social psychological relevance, namely, how powerful is the *assumption*

that self-interest is powerful? Self-interest may or may not qualify as a biological fact, but it certainly qualifies as a social fact (Durkheim, 1982). At least, belief in the power and sovereignty of self-interest looms large in the collective representations of cultures steeped in liberalism and the ideology of radical individualism (Miller & Ratner, 1996). Consider just three findings from an illustrative American survey: (a) 80% of respondents indicated that the tendency of people to look out only for their own interests was a serious problem in the United States; (b) two-thirds of the respondents indicated that Americans were more concerned with their own activities and interests than genuinely concerned about helping the needy; (c) almost two-thirds of respondents expressed the belief that people in our society are becoming less rather than more interested in helping one another (Wuthnow, 1991).

## The Present Research

The present research was designed to provide more systematic evidence of people's belief in the power of self-interest. In particular, we sought to demonstrate that people's belief in the power of self-interest leads them to overestimate its impact on the attitudes and behaviors of others. Our research builds upon the well-established finding that lay persons' predictions about others rely heavily on, and are systematically biased by, implicit theories—for example, theories about the relation between personality traits (Schneider, 1973), theories about the relation between traits and social categories (Judd & Park, 1993), and theories about the relation between actions and underlying traits (Reeder, 1985). The claim of the present research is that lay persons' predictions are also guided by implicit theories of human motivation: theories about the relation between motivational drives (e.g., the pursuit of self-interest) and attitudinal and behavioral propensities (Miller & Prentice, 1994).

We report five studies that share the same basic design. Each study elicited attitudes or behaviors from participants who either did or did not have a vested interest in a particular social issue. In addition, each study asked participants to estimate the attitudes or behaviors of peers who either did or did not have a vested interest in the issue. A comparison of the actual and predicted responses of participants enabled us to assess the accuracy of people's beliefs about the power of self-interest.

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Dale T. Miller and Rebecca K. Ratner, Department of Psychology, Princeton University.

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Correspondence concerning this article should be addressed to Dale T. Miller, Department of Psychology, Green Hall, Princeton University, Princeton, NJ 08544-1010. Electronic mail may be sent via the Internet to dmiller@princeton.edu.

Additionally, the within-subject feature of the designs used in four of the studies (Studies 1, 2, 3, and 5) enabled us to determine how people's predictions about the impact of self-interest on the responses of others relate to its impact on their own responses. The specific hypotheses that guided the present studies were (a) people will overestimate the power of self-interest on the attitudes and behavior of others and (b) people will overestimate the power of self-interest even when their own attitudes and behaviors diverge from the dictates of self-interest. The operationalization of self-interest took two forms in the present studies. Study 1 operationalized it in terms of financial incentive; Studies 2, 3, 4, and 5 operationalized it in terms of group membership.

### Study 1: The Impact of Financial Incentive on Willingness to Give Blood

How much is a person's willingness to undertake a pro-social act increased by the offer of a financial incentive? Study 1 examined this question. It also compared the actual impact of an incentive on willingness to act pro-socially (donate blood) with that predicted by the respondents. We hypothesized that irrespective of the actual impact of financial compensation on people's willingness to help, respondents would overestimate it. Further, we hypothesized that people's tendency to overestimate the impact of incentive would be independent of its impact on them.

#### Method

##### Participants

Participants were 56 undergraduate students at the State University of New York at Binghamton enrolled in introductory psychology classes. They received either extra course credit or \$5 for their participation.

##### Procedure

As part of a survey embedded in a questionnaire packet, participants were asked about their own willingness, along with that of their peers, to give blood for which they either would or would not receive financial remuneration. The precise wording of the appeal was as follows:

The blood supply in the United States has reached record lows in the past month. The American Red Cross will be coming to the Mandela Room of the student union for a blood drive in several weeks. They have asked us to get some sense of how many students will be willing to donate blood and what factors might make volunteering more attractive.

After reading this paragraph, participants were presented with each of the two versions of the incentive manipulation. In the first version, participants read that the Red Cross was considering paying \$15 to each student who donates blood. They were then asked whether they would donate blood if the Red Cross were to pay \$15 (*yes* or *no*) and what percentage of their peers they thought would donate blood for \$15. In the second version, subjects read that if the Red Cross were to collect donations in the typical way, students would not receive any financial compensation for their donations. Participants were then asked whether they would donate blood if they were not to be paid (*yes* or *no*) and what percentage of their peers would donate blood if they were not paid.

The presentation order of the two incentive descriptions and the two estimation questions was counterbalanced.

## Results and Discussion

### Actual Versus Estimated Impact of Self-Interest

We first assessed whether the offer of a financial incentive increased participants' expressed willingness to give blood. Thirty-five of the 56 participants (63%) indicated they would agree to give blood if not paid, and 41 of the 56 participants (73%) said they would agree to give blood if paid \$15. Stated differently, only 11% of participants indicated they would give blood for compensation but would not without it. Incentive clearly did not have a dramatic effect on participants' willingness to donate blood.<sup>1</sup>

We next assessed whether participants correctly estimated the impact of financial incentive on their peers' willingness to volunteer. Participants estimated that roughly twice as many students would agree to donate blood for \$15 as would agree to donate blood for free ( $M_s = 62.46\%$  vs.  $32.64\%$ ),  $t(55) = 12.38$ ,  $p < .0001$  (see Table 1). Consistent with predictions, these results revealed a dramatic overestimation of the impact of financial incentive on people's stated willingness to donate blood,  $t(55) = 7.94$ ,  $p < .0001$ .<sup>2</sup>

We also considered whether participants' estimates of the impact of financial incentive on others were related to the impact of incentive on their own attitudes. For the purpose of this analysis, participants were divided into two groups: those whose responses were congruent with the payment offered (i.e., those who were willing to donate in the payment condition but not in the no-payment condition) and those whose responses were incongruent (i.e., those whose willingness to donate did not vary across payment conditions). We found no difference between these two groups in their estimates of the impact of financial incentive on their peers,  $F(1, 54) < 1$ ,  $ns$  (see Table 2).

In summary, the findings of Study 1 strongly support the hypothesis that individuals believe that self-interest powerfully guides people's behavior. Financial incentive had only a minimal effect on participants' stated willingness to give blood, yet participants predicted that its effect would be considerable. Further, even participants whose own behavior was insensitive to incentive predicted that the behavior of others would be sensitive to it.

The next four studies provide further tests of the hypothesis that people overestimate the impact of self-interest (as defined by group membership) on social attitudes and behaviors. Three of the four studies also permitted tests of the hypothesis that

<sup>1</sup> Although the incentive effect is clearly small, we were unable to establish its nonsignificance through an appropriate statistical test because one of the response profiles (participants who agreed to volunteer for no payment but not for payment) had no entries.

<sup>2</sup> In all of the studies, we used a  $t$  test to assess the extent to which participants overestimated the impact of self-interest. Each participant's estimate of the impact of self-interest was compared to the actual impact of self-interest in each study.

**Table 1**  
*Study 1: Actual Versus Estimated Percentage of Individuals Volunteering to Give Blood for Payment or No Payment*

Incentive	Volunteer rate	
	Actual	Estimated
Payment	73.21	62.46
No payment	62.50	32.64

the tendency to overestimate the impact of self-interest on attitudes and behaviors persists even when the perceiver's own attitudes and behavior diverge from the dictates of self-interest.

### Study 2: The Impact of Gender on Attitudes Toward Abortion

This study examined the impact of gender on students' attitudes toward a proposed government health plan that covered abortion costs. We hypothesized that participants would perceive women to benefit more from such a plan and that they therefore would expect women to be more favorable to the plan. Further, and most relevant to our analysis, we hypothesized that participants' predictions would overestimate the magnitude of any gender difference that did emerge. Finally, we hypothesized that the strength of the link that participants predicted between gender and attitude in others would be unrelated to the degree of congruence between their own attitude and their gender's vested interest in the plan.

### Method

#### Participants

Participants were 121 undergraduate students (61 men, 60 women) at the State University of New York at Binghamton enrolled in introductory psychology classes. They received either extra course credit or \$5 for their participation.

#### Procedure

As part of an hourlong questionnaire study, respondents answered four questions concerning their attitudes toward full abortion coverage under what was alleged to be a new President Clinton-sponsored health plan. Participants were asked to indicate on 7-point scales whether they thought a new plan should include full coverage of abortions (1 = *strongly believe that the plan should not cover abortions* and 7 =

**Table 2**  
*Study 1: Effect of Congruence Between Own Behavior and Financial Incentive on Estimated Percentage of Peers Volunteering to Give Blood*

Own behavior	Estimated volunteer rate	
	Payment	No payment
Congruent	58.33	23.67
Incongruent	62.96	33.72

*strongly believe that the plan should cover abortions*), what they thought the opinion of the average male psychology student was, and what they thought the opinion of the average female psychology student was. In addition, participants were asked which sex they thought would benefit more from a plan that covered abortions.

### Results and Discussion

#### Perception of Vested Interest

Over 90% of the participants indicated that they believed that a health plan that provided abortion coverage would benefit women more than men. Only 11 of the 121 participants (6 men and 5 women) indicated either that men would benefit more or that neither sex would benefit more than the other.

#### Actual Versus Estimated Impact of Vested Interest

Despite the perception that women would benefit more than men from the proposed plan, gender did not predict respondents' attitudes toward the plan. The attitudes of both men and women were moderately positive and did not differ ( $M = 4.51$  vs.  $M = 4.27$ ),  $t < 1$ .

Women's attitudes toward the proposed health plan might have been no more favorable than those of men, but participants (at least those who thought that women were more vested than men) predicted they would be ( $M = 5.73$  vs.  $M = 4.33$ , respectively),  $t(109) = 9.25$ ,  $p < .0001$  (see Table 3). Furthermore, as hypothesized, the predicted effect of gender represented a significant overestimation of the actual (non)effect,  $t(109) = 10.84$ ,  $p < .0001$ .

Our analysis predicted that participants would expect women to be more favorable than men to the proposed policy irrespective of the position they themselves take. Thus, whether or not a participant's own attitude was congruent with his or her vested interest, he or she should have expected that the attitudes of others would be. To test this hypothesis, we divided participants into anticoverage and pro-coverage groups. Those with scores below the midpoint of the scale (4) were classified as anticoverage and those with scores above were classified as pro-coverage. Fourteen participants who indicated neutral attitudes (i.e., "4" on the 7-point scale) were excluded from this analysis. As Table 4 indicates, participants' predictions of their peers' attitudes were unrelated to their own attitude  $F(1, 105) < 1$ , *n.s.* Participants whose attitudes were incongruent with their vested interest (pro-coverage men and anticoverage women) predicted gender would influence their peers' attitudes as much as did participants

**Table 3**  
*Study 2: Actual Versus Estimated Attitudes of Women and Men Toward Health Plan Coverage for Abortion*

Gender	Attitude	
	Actual	Estimated
Female	4.27	5.73
Male	4.51	4.33

*Note.* Higher numbers indicate greater support for health plan.

Table 4  
*Study 2: Effect of Congruence Between Own Attitude and Vested Interest on Estimated Attitudes of Women and Men Toward Health Plan Coverage for Abortion*

Own attitude	Estimated attitude	
	Women	Men
Congruent	5.70	4.19
Incongruent	5.70	4.43

whose attitudes were congruent with their vested interest (anti-coverage men and pro-coverage women).

In summary, the results strongly supported the hypotheses. The majority of participants in this study perceived women to have a greater stake in, and to be more supportive of, a proposed health care plan than men. In fact, there was no difference in the degree of support expressed by men and women. Furthermore, the tendency to overestimate the impact of perceived group interest on attitudes was as strong among those whose attitudes diverged from the position dictated by their group's vested interest as among those whose attitudes conformed to it.

### Study 3: The Impact of Class Year on Attitudes Toward Campus Alcohol Policy

Study 3, like Study 2, focused on the impact of group membership on attitudes toward a social policy. However, the policy featured in this study was one that affected participants more personally than did the hypothetical issue used in Study 2. The issue was a Princeton University campus-wide ban on kegs of beer. The keg ban was imposed unilaterally by the president of Princeton University, who saw it largely as a symbolic act designed to demonstrate the university's concern about drinking on campus. The policy was immediately unpopular: Editorials appeared in the student newspaper and in other publications, and there was even protest from alumni groups (who would no longer be able to have kegs at reunions). Despite the general furor provoked by the keg ban, not everyone was equally affected by it. In general, this policy interfered more with the drinking of underclassmen than upperclassmen, because the latter, unlike the former, could (and generally did) belong to eating clubs unaffiliated with the university, where the ban did not apply.

The present study focused on the attitudes of Princeton University sophomores and seniors toward the keg ban. In addition to eliciting students' own attitudes toward the ban, we elicited students' perceptions of the attitudes of other sophomores and seniors, as well as their perceptions of the ban's relative influence on the two classes. We hypothesized that participants would perceive sophomores to be more adversely affected by this plan and therefore to be more opposed to the plan. Further, and most relevant to our analysis, we hypothesized that participants' predictions would overestimate the magnitude of any class difference that did emerge. Finally, we hypothesized that the strength of the link that participants predicted between class and attitude in others would be unrelated to the degree of congruence ex-

isting between their own attitude and their class's vested interest in the policy.

## Method

### Participants

Forty male and female sophomores and 40 male and female seniors enrolled at Princeton University participated in this study. They were randomly selected from a student directory and contacted by telephone.

### Procedure

Students were asked to participate in a telephone survey of students' attitudes toward the university's alcohol policies. The interviewer explained to participants that their telephone numbers had been chosen at random and that their responses would be completely anonymous. Over 90% of the students contacted agreed to participate. The interview began with several questions about the university's policies that are irrelevant to the present investigation. The critical questions asked of participants were as follows: "How do you feel about the university's new policy banning kegs on campus? (on a 9-point scale where 1 = *totally opposed* and 9 = *totally in favor*)" and "How do you think the average sophomore/senior feels about the university's new policy banning kegs on campus? (on the same 9-point scale)." Finally, the participants were asked, "Who do you think will be most personally affected by the policy? Sophomores, seniors, or both equally?"

## Results

### Perception of Vested Interest

Sixty-six (83%) of the eighty respondents indicated that sophomores would be more affected by the ban than would seniors. Eleven participants indicated that the two groups would be affected equally, and three participants indicated that seniors would be more affected than sophomores.

### Actual Versus Estimated Impact of Vested Interest

Despite the widely held belief that sophomores would be personally more affected than seniors by the policy, the two groups did not differ in their attitudes toward the keg ban,  $t(78) < 1$ . Both sophomores and seniors were moderately opposed to the policy ( $M_s = 3.75$  and  $3.68$ , respectively).

Participants who thought that sophomores would be more affected by the keg ban also predicted that sophomores would be more opposed to the keg ban,  $t(65) = 12.49$ ,  $p < .0001$  ( $M_s = 2.67$  and  $4.55$  for the sophomores and seniors, respectively). Furthermore, as hypothesized, the predicted effect of class represented a significant overestimate of its actual (non)effect,  $t(65) = 12.96$ ,  $p < .0001$  (see Table 5). It is important to note that

Table 5  
*Study 3: Actual Versus Estimated Attitudes of Sophomores and Seniors Toward Keg Ban*

Year	Attitude	
	Actual	Estimated
Sophomores	3.75	2.67
Seniors	3.68	4.55

Note. Higher numbers indicate greater support for keg ban.

those participants who thought that there was no difference in the vested interest of the two groups, or that seniors would be more affected than sophomores, did not predict any difference in attitudes between the two groups ( $M_s = 3.14$  and  $2.86$  for the sophomores and seniors, respectively),  $t(13) < 1$ .

As in the previous studies, we were interested in discovering whether the tendency to overestimate the impact of self-interest extended even to those participants who themselves held attitudes incongruent with their self-interest. To address this question, we divided the participants into anti- and pro-keg-ban groups. Those with scores below the midpoint of the scale (5) were classified as anti-keg ban and those with scores above were classified as pro-keg ban. The 9 respondents with scores of 5 were excluded from this analysis. A comparison of the two groups revealed that participants whose attitudes were incongruent with their vested interest (pro-keg-ban sophomores and anti-keg-ban seniors) predicted vested interest would affect attitudes as much as did those whose attitudes were congruent with their vested interest (anti-keg-ban sophomores and pro-keg-ban seniors),  $F(1, 69) < 1, ns$  (see Table 6).

In summary, the results strongly supported the hypotheses. The majority of participants in this study perceived Princeton sophomores to be more adversely affected by, and to be more opposed to, the keg ban than Princeton seniors. In fact, there was no difference in the opposition expressed by sophomores and seniors. Further, the tendency to overestimate the impact of class membership on attitudes was as strong among those whose attitudes diverged from the position perceived to be most congruent with their class's vested interest as among those whose attitudes conformed to it.

#### Study 4: The Impact of Smoking on Attitudes Toward Cigarette Tax and Smoking Restrictions

This study addressed two potential methodological limitations of the previous studies. The first of these pertains to the representativeness of the attitude domains examined. Studies 2 and 3 found no significant relationship between the attitudes assessed and vested interest. The relationships that participants were overestimating, therefore, were actually nonrelationships. In light of this, it seemed important to demonstrate the overestimation effect in a domain in which vested interest and attitudes actually are related. We do not claim that vested interest never affects attitudes, only that it does not affect attitudes as much as lay theories assume. To this end, we decided to focus on attitudes toward smoking policies—ones that previous research

has established are affected by vested interest (Green & Gerken, 1989). According to our analysis, the existence of an actual relationship between smoking status and smoking-related attitudes should not preclude a self-interest overestimation effect. We would still expect people to overestimate the impact of smoking status on attitudes toward cigarette taxes and smoking restrictions.

The second methodological issue addressed in the present study pertains to its design. In the three previous studies, all participants provided both their own attitudes or behavioral intentions and their estimates of the attitudes or behavioral intentions of others. The use of within-subject designs in these studies enabled us to assess the effect of the congruence between a person's own attitude and his or her self-interest on the participant's predictions about the attitudes of others. The within-subject feature of the design also created a potential problem, however. It is possible that having answered, or simply having been asked, a question about one target (either the self or others) affected participants' responses to the question about the other target. To rule out this possibility, and to reduce demand characteristics more generally, we asked participants in the present study to respond either to a question about their personal attitudes or a question about their perceptions of others' attitudes, but not both. In addition, participants who were asked to predict the attitudes of vested and nonvested others were asked to estimate the attitude of only one of these two groups.

### Method

#### Participants

Eighty-one male and female individuals participated in a short questionnaire study. Participants were approached by a female experimenter as they sat alone in various public areas either on or near the Princeton University campus.

#### Procedure

The experimenter approached individuals with the request to participate in a "study of smokers' and nonsmokers' attitudes toward smoking-related policies." Half of the participants completed a version of the questionnaire that asked them to indicate their support for various smoking-related policies and half completed a version that asked them to estimate the percentage of either smokers or nonsmokers who would support these policies. The questionnaire that focused on respondents' own attitudes first asked them to indicate whether or not they smoke (they were asked to check *yes* if they were a light, moderate, or heavy smoker). It next asked them whether they would support (a) an increase in taxes on cigarettes, (b) a complete ban on cigarette advertisement, and (c) a complete ban on smoking in public places. Participants were asked to respond to each of these questions by checking *support*, *oppose*, or *no opinion*. Next, respondents were asked whether there should be restrictions on smoking in restaurants, workplaces, buses and trains, airplanes, and hotels and motels. Participants were asked to respond to each of these questions by checking *yes*, *no*, or *no opinion*.

The second version of the questionnaire was designed to elicit participants' estimates of the percentage of smokers or nonsmokers who would support the target policies but did not ask participants to indicate their own smoking status. The specific instructions were as follows:

We are interested in how accurate people's estimates are of smokers' and nonsmokers' attitudes toward cigarette taxation and smok-

Table 6  
Study 3: Effect of Congruence Between Own Attitudes and Vested Interest on Estimated Attitudes of Sophomores and Seniors Toward Keg Ban

Own attitude	Estimated attitude	
	Sophomores	Seniors
Congruent	2.84	4.42
Incongruent	2.55	3.85

ing restrictions. We are asking both smokers and nonsmokers on or near the Princeton campus to indicate whether they would support a number of proposals (e.g., "Would you support or oppose an increase in taxes on cigarettes?"). We would like you to try to estimate as accurately as you can the percentage of smokers [nonsmokers] who indicate support for each of the following proposals. [Note: We asked light, moderate, and heavy smokers to classify themselves as smokers.]

Participants in these conditions were next asked to estimate the percentage of smokers (or nonsmokers) who indicated that they would support each of the proposals (e.g., "What percentage of smokers [nonsmokers] indicated that they would support 'an increase in taxes on cigarettes?'" Participants were told that the respondents had been asked to check either *support*, *oppose*, or *no opinion*.)

### Results and Discussion

The results replicated Green and Gerken's (1989) finding that nonsmokers are more favorable toward smoking restrictions than are smokers. In our sample, nonsmokers were more favorable than smokers toward five of the eight proposed smoking restrictions. (For two of these proposals, the difference between smokers and nonsmokers reached conventional levels of significance,  $p < .05$ , and for another three it approached significance,  $p < .10$ .)

By revealing a significant link between vested interest and attitudes, the present findings (see Table 7) diverge from those of Studies 2 and 3. They converge with those of the latter two studies, however, in what they reveal about people's estimates of the link between vested interest and attitudes. Here, as in the previous studies, participants overestimated the relationship. A comparison of significance levels for the actual and estimated effects of smoking status (see Rosenthal & Rubin, 1979) indi-

cated that participants overestimated the impact of smoking status on their peers' attitudes for 7 of 8 policy issues ( $ps < .05$ ).

In summary, the results supported the hypothesis: Smokers in this study were more opposed to policies that regulated smoking than were nonsmokers, but the impact of smoking status on expressed attitudes was significantly less than that predicted by respondents.

### Study 5: The Impact of Vested Interest on Willingness to Offer Public Support

This final study extended our examination of the real and predicted impact of self-interest in two ways. First, it departed from the practice of the previous studies and focused on the impact of self-interest on behavior rather than on attitudes. Second, in this study vested interest was experimentally manipulated rather than simply measured.

The study focused on individuals' willingness to voice their opposition to a pending government action that allegedly either did or did not pose a threat to their gender's health status. Specifically, participants were told of a funding cut that would delay research on a health disorder that afflicts either women or men. Subsequently, they were asked whether or not they would be willing to release a statement of their opinion on this issue to a local political organization. Finally, participants were asked to estimate the percentage of their male and female peers who would agree to release their statements. In addition to examining the actual relationship between participants' vested status and their willingness to release the statement, we examined participants' estimates of relationship between these two variables. We hypothesized that participants would overestimate the actual impact of vested interest on their peers' willingness to release their statements. We also hypothesized that the strength of the link that participants assumed between the vested interest and the actions of their peers would be unrelated to the degree of congruence between their own action and their group's vested interest.

### Method

#### Participants

Eighty-seven undergraduate and high school students were recruited to participate in a study concerning social and political attitudes. Individuals were paid for their participation. Eleven suspicious participants were excluded from the analyses.

#### Procedure

Participants participated in this study individually. At the beginning of the study, each participant was handed a brief questionnaire that contained descriptions of a real political issue followed by a description of the bogus target issue. Each participant was randomly assigned to the vested or nonvested condition.

*Vestedness manipulation.* Participants in the women-at-risk condition read the following description of the target issue:

Since 1990, scientists at the National Institutes of Health (NIH) have been conducting research pertaining to a particular set of gastrointestinal symptoms that develops in one out of twelve American women at some point in their lives. These symptoms appear to

Table 7

Study 4: Actual Versus Estimated Percentage of Smokers and Nonsmokers Supporting Smoking Policies

Policy	Actual support		Estimated support	
	Smokers	Nonsmokers	Smokers	Nonsmokers
Increase cigarette taxation	35.00	63.64	18.21	67.60
Ban cigarette ads	45.00	59.09	23.16	68.00
Ban smoking in public places	15.00	77.27	18.50	85.00
Restrict smoking in restaurants	85.00	95.45	27.63	84.40
Restrict smoking in work places	80.00	100.00	23.33	86.40
Restrict smoking on buses and trains	95.00	100.00	28.42	88.58
Restrict smoking on airplanes	85.00	100.00	35.26	93.15
Restrict smoking in hotels and motels	50.00	77.27	24.63	73.00

*Note.* Higher numbers indicate greater support for smoking restriction or tax increase.

be caused by an enzyme deficiency that is found only in women. The symptoms include painful digestion of certain foods, nausea, and an increased vulnerability to ulcers. NIH researchers are developing an imitation (or "agonist") of this enzyme to be taken by individuals who have the enzyme deficiency and symptoms. The NIH has made considerable progress and expects to have the enzyme supplement available within the next 2 years.

The House Appropriations Committee of the United States Congress is currently considering a proposal (Proposition 174) to reduce the NIH budget by 75% to provide money for a campaign sponsored by the Department of Transportation to increase seat belt use by putting the slogan "Don't Forget to Buckle Up" on highway billboards across the country. Opponents of this plan point out that the few regions that already have "Buckle Up" billboards do not show increased seat belt utilization rates.

Researchers at the NIH say that the proposed budget cut would slow down their research tremendously: with one-fourth of their original budget, the enzyme supplement would not be available for approximately 6-7 years.

Participants in the men-at-risk condition read the same description, but with the word *men* inserted where *women* appears in the paragraphs presented above.

*Attitude measures.* After reading about each issue, participants were asked to indicate on 7-point Likert-type scales how much they were in favor of the proposed plan and how wise they thought the plan would be. Most important to the present concerns, they also were asked how much the proposed plan could affect them personally (1 = *not at all*, 7 = *very much*).

*Written statement.* Once they had completed these attitude measures, participants were asked to provide a brief written statement of their opinion about the issue. They were provided with a half page of lined paper on which to do this.

*Releasing opportunity.* After participants completed the preliminary questionnaire and had provided written statements of their opinions, the experimenter told them that a local group was fighting the proposed budget change and was interested in obtaining copies of the statements that they had written. Participants were then given a form on which to indicate anonymously whether or not they would like to release their statement. To reduce self-presentational concerns, the experimenter left the room while the participant completed this task. In addition, participants were instructed to use code numbers rather than their names on the forms and to place the completed form through an opening in a sealed box.

*Follow-up questions.* Participants next were given a manipulation check to ensure that they had understood which sex was at risk for the health disorder. Finally, participants were asked to indicate the percentage of their male peers and the percentage of their female peers who would agree to release their statements.

## Results and Discussion

### Perception of Vested Interest

All participants correctly recalled which sex was at greater risk for the disorder. Furthermore, individuals indicated that the proposal was of greater personal relevance to them when theirs was the sex at greater risk for the disorder ( $M_s = 3.62$  and  $2.19$ , respectively),  $t(74) = 4.02$ ,  $p < .001$ .

### Actual Versus Estimated Impact of Vested Interest

Twenty-nine out of 34 vested participants (85%) and 34 out of 41 nonvested participants (81%) agreed to release their state-

ments,  $\chi^2 < 1$  ( $1, N = 75$ ). (Consistent with their comparably high releasing rates, the vested and nonvested participants also indicated comparably high degrees of opposition to the proposal on the two attitude measures, both  $F_s < 1$ .) Although there was no difference in the releasing rates of the two groups, participants predicted that a significantly greater percentage of their vested peers ( $M = 78.55$ ) than their nonvested peers ( $M = 62.77$ ) would agree to release their statements,  $t(74) = 5.54$ ,  $p < .0001$ . In fact, consistent with the findings of the previous studies, participants' predictions significantly overestimated the actual impact of self-interest on behavior,  $t(74) = 3.86$ ,  $p < .001$  (see Table 8). Unlike in the previous studies, however, we found that the estimated impact of vested interest on action was lower among those whose own action diverged from the interest of their group than among those whose own action conformed to it,  $F(1, 73) = 5.42$ ,  $p < .05$  (see Table 9).

In summary, the results generally supported the hypotheses. Although the vulnerability of participants' own sex to a health disorder had no effect on their willingness to undertake actions to combat it, participants predicted that it would. Indeed, parallel to the results of Studies 2, 3, and 4, participants significantly overestimated the impact of group interest on their peers' willingness to take relevant action.

## General Discussion

The present results illuminate many facets of the real and assumed impact of self-interest on attitudes and behavior. The results speak to the actual relationship between self-interest and attitudes, to people's predictions about the relationship between self-interest and attitudes, and to the impact that the congruence between people's own attitudes and their vested interest has on their assumptions about the general impact of self-interest. We consider each of these aspects of the results in turn.

### The Actual Power of Self-Interest

The present results replicate the general finding that self-interest is at best only a weak predictor of attitudes and behavior (Sears & Funk, 1990, 1991). In only one of the four studies that assessed the actual impact of self-interest (Study 4) did we find a self-interest effect. One frequent criticism of null effects in investigations of self-interest has focused on the definition of self-interest. Critics have charged that the failure to find a relation between self-interest and attitudes results from the failure to properly identify people's self-interest (Bobo, 1983; Kiewiet, 1983). This criticism, although inapplicable to Study 1,

Table 8  
Study 5: Actual Versus Estimated Percentage of Members of Vested and Nonvested Sex Willing to Release Statements

Sex	Willingness to release statement	
	Actual	Estimated
Vested	85.29	78.55
Nonvested	80.95	62.77

Table 9  
*Study 5: Effect of Congruence Between Own Behavior and Vested Interest on Estimated Percentage of Vested and Nonvested Peers Willing to Release Their Statements*

Own behavior	Estimated volunteer rate	
	Vested sex	Nonvested sex
Congruent	80.61	58.14
Incongruent	76.64	67.05

in which self-interest was indexed by financial remuneration, does bear examination in the context of Studies 2, 3, 4, and 5, in which self-interest was identified with group membership. Consider Study 2 as an example. On what authority, a skeptic might ask, can it be claimed that it is more in the interest of women than men for there to be the implementation of a health plan that provides for abortion coverage? Could not it be argued that men have as great, and perhaps even greater, stake in this policy than women? Possibly, but we did not rely on our own judgment in deciding who was more vested. Instead, we asked the respondents themselves. The overwhelming opinion of the respondents was that women would be more personally affected by the policy than would men. It was on the basis of this subjective classification, then, and not on an objective classification, that we deemed women to be more vested than men. Moreover, this seems the most appropriate strategy because presumably it is perceived, not objectively defined, self-interest that theorists have in mind when they speak of the power of self-interest. We followed a similar practice in Studies 3 and 5, but there, too, the use of a subjective definition of self-interest produced no evidence that self-interest powerfully, or even significantly, affected attitudes or behavior.

#### *The Perceived Power of Self-Interest*

Participants' actions and attitudes may not have revealed them to be ardent self-interested agents, but their predictions revealed them to be ardent self-interest theorists. Participants perceived there to be significant differences in vested interest across all the various target groups used in these studies, and they expected these differences to be accompanied by significant differences in attitudes and behaviors. In Study 2, for example, participants who judged women to have a greater stake than men in a proposed medical plan expected women to have more favorable attitudes toward the plan. In fact, a comparison of the predicted and actual impact of self-interest in the various studies revealed people to hold an exaggerated belief in the power of self-interest. In all five studies, self-interest—whether defined by financial incentive (Study 1) or group membership (Studies 2, 3, 4, and 5)—affected attitudes and behavior less than participants expected it to. We also found that the strength of people's belief in the power of self-interest was such that it guided their predictions even when it did not guide their own responses. In all but one case (Study 5), the predicted influence of self-interest on others was as great among those participants whose own attitudes were incongruent with their self-interest as it was among those whose self-interest and attitudes were congruent.

From our perspective, the fact that the predicted impact of self-interest was significantly greater than its actual impact is more critical than the fact that the actual impact of self-interest was generally nonsignificant. We certainly would not wish to conclude from our research, or from previous research, that self-interest plays no significant role in human affairs. It obviously does. However, as the present research and that of Sears and his colleagues (Sears & Funk, 1990, 1991) demonstrates, the role of self-interest is not as great as many formal theories assume. Neither, it appears from the present research, is its role as great as laypersons assume. Past research on the impact of self-interest has prompted the question, When does self-interest matter as much as rational choice theorists assume it does? The present research prompts an additional question: When does self-interest matter as much as laypersons assume it does? Researchers have begun to address the former question (Green & Cowden, 1992), but not, as of yet, the latter.

#### *Self-Presentational Influences*

We interpret the present results as indicating that people overestimate the power of self-interest. Another interpretation merits consideration, however. The observed discrepancy between the actual and estimated effects of self-interest could simply reflect a desire on the part of participants to appear less self-interested than they actually are. Such a self-presentational goal could conceivably bias participants' own responses as well as their estimates of the responses of others. While the possibility of self-presentational influences deserves careful scrutiny, we believe that there are a number of reasons why it is an unlikely account for the overestimation effects we observe. First, we failed to find self-interest effects on attitudes or behavioral intentions even when the responses were completely anonymous (Studies 1 and 2) and therefore had little potential for arousing self-presentational concerns. Second, although concealing one's self-interest would seem more costly if it involved taking an action rather than simply expressing an attitude or behavioral intention, we observed the same overestimation effect (and non-effect of self-interest) when an actual behavioral measure was included (Study 5) as we did when only behavioral intentions or attitudes were assessed (Studies 1, 2, 3, and 4).

A third reason to discount self-presentation concerns in the present context emerges from an examination of the pattern of overestimation effects. Consider Study 2 and the finding that participants overestimated the impact of gender on support for a health care plan that included abortion coverage. Inspection of the relevant means indicates that participants were most inaccurate in their estimates of the support found among women—those perceived to have the greatest vested interest. Men did not express more support than they were expected to (a result that might have reflected a desire to seem "politically correct"); women simply expressed less support.

Finally, it is important to note that we did not ask participants to predict their peers' "true" attitudes or feelings, only to predict how their peers would respond to the same measure to which they themselves had responded—encouraging them, in effect, to allow for the possibility of self-presentational influence. In Study 4, for example, one might be tempted to argue that participants' overestimation of the impact of self-interest

on smokers' and nonsmokers' support for smoking policies occurred because we considered only the respondents' expressed support for these policies (which could be vulnerable to self-presentational influences), and not their true support for them. However, we were careful to ask participants only for the responses that their smoking and nonsmoking peers would give to these questions, and not for their true beliefs. In effect, our results compared the actual impact of self-interest on self-reports with estimates of the impact of self-interest on self-reports.

### *Implications*

Of the many implications of our analysis, one of the most important may be its potential for shedding new light on the common finding that self-interest, although not predicting attitudes very well, does predict behavior very well (Sivacek & Crano, 1982; Green & Cowden, 1992; Regan & Fazio, 1977).<sup>3</sup> As an illustration, consider a study by Green and Cowden (1992) in which they reanalyzed two "busing" surveys conducted in the mid-1970s. Initial analyses of these surveys revealed little or no relation between self-interest and social attitudes; for example, Whites with children in the school system were no more likely to oppose busing than Whites without children in the school system. In their reanalysis, Green and Cowden (1992) examined the relation between self-interest and political action, the latter being indexed by participants' responses to a question that asked them to indicate the extent of their involvement in antibusing organizations. The results of this analysis were dramatic: Those whose self-interest was threatened by busing were much more likely to take action. For example, White parents of school-age children were much more likely than White nonparents to have participated in antibusing organizations.

One interpretation of the stronger relation between self-interest and social action than between self-interest and social attitudes focuses on the different thresholds that must be reached to express an attitude versus take an action. One might not need a vested interest in a cause to express an attitude supporting it, but one might require a level of motivation that only having a stake in the issue can provide to convert a supportive attitude into a supportive action. As Green and Cowden (1992) have argued, the prospect of behavioral involvement (unlike the request for an opinion) forces people to consider cost, and hence prompts self-interest reflection. In their words, the potential political actor must first ask him or herself, "Is it worth it?"

Green and Cowden's claim that survey research underestimates the "political wallop" of self-interest is certainly plausible. But our analysis and the results of the present studies suggest that there may be another reason why the link between self-interest and behavior is stronger than that between self-interest and attitudes. Rather than viewing those with a vested interest as benefiting from a facilitative push toward action, it may be more (or at least as) appropriate to view those without a vested interest as suffering from an inhibitory pull away from taking action. Specifically, we think it possible that those without vested interest are inhibited from acting not only because they perceive themselves to lack an incentive but because they perceive themselves to lack social support. People may fear they will be stigmatized if they take actions for which they lack a

clear incentive, possibly suspecting that they will be the only person of their nonvested status taking those actions. By this account, the question the political actor needs to answer is not "Is it worth it?" but "Is it appropriate?" In addition to proposing a novel account for the strong relation between self-interest and social action (but not attitudes), this analysis suggests how the myth of self-interest is perpetuated: The belief that only self-interested people will act leads only self-interested people to act.

There are other consequences of the myth of self-interest as well. For one thing, a belief in the power of self-interest appears to affect the accounts people offer to one another for their behavior. Robert Wuthnow (1991), in his book *Acts of Compassion*, examines how people talk about their motivations for helping others. According to Wuthnow, people engage in many acts of genuine compassion, but they do not explain these acts in terms of compassion. Rather, people seem most comfortable explaining their acts of compassion in language that emphasizes self-interest. People's accounts for giving to charity, for example, generally emphasize pragmatic or instrumental reasons: "It gave me something to do," "I liked the other volunteers," "It got me out of the house." People seem loathe to acknowledge that their behavior may have been motivated by genuine compassion or kindness.

People's penchant for emphasizing self-interest in their behavioral accounts can also be seen in the accounts they provide for their voting preferences. Sears and his colleagues have found that the relation between self-interest and voting behavior is much higher in exit polls than in either preelection or postelection surveys (Sears & Lau, 1983). The claim that people "vote their pocket book" may not be well substantiated by studies of actual voting behavior (Feldman, 1984), but it does receive strong support in people's accounts for their votes in exit polls (see also Stein, 1990). Whether people distort their votes in the direction of their self-interest or vice versa, it appears that people who have just cast a vote are motivated to tell a story that closely links their vote with their self-interest. This dynamic, like the others discussed above, serves to provide laypersons with even more evidence of the power of self-interest.

### Final Note

It appears that scientific theories and collective representations both may exaggerate the power of self-interest. Indeed, much of the power of self-interest in human affairs may derive from the power accorded it by our collective representations. Homo economicus is a social construction, not a biological entity. But myth or not, the image of humans as self-interested agents has powerful social and psychological consequences. Myths can create reality.

<sup>3</sup> Note that self-interest did not predict the willingness of participants in Study 5 to release a statement they had written. We deemed this a behavioral measure because it involved more than simply expressing an opinion about an issue. Nevertheless, choosing to release their statement required no effort and little commitment on the part of participants, which was certainly not the case for Green and Cowden's (1992) participants. The present account of the link between self-interest and behavior applies primarily to behaviors involving high effort and commitment.

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