

Monkey See, Monkey Do: The Influence of Work Groups on the Antisocial Behavior of Employees



Sandra L. Robinson; Anne M. O'Leary-Kelly

The Academy of Management Journal, Vol. 41, No. 6. (Dec., 1998), pp. 658-672.

Stable URL:

<http://links.jstor.org/sici?sici=0001-4273%28199812%2941%3A6%3C658%3AMSMDTI%3E2.0.CO%3B2-T>

The Academy of Management Journal is currently published by Academy of Management.

Your use of the JSTOR archive indicates your acceptance of JSTOR's Terms and Conditions of Use, available at <http://www.jstor.org/about/terms.html>. JSTOR's Terms and Conditions of Use provides, in part, that unless you have obtained prior permission, you may not download an entire issue of a journal or multiple copies of articles, and you may use content in the JSTOR archive only for your personal, non-commercial use.

Please contact the publisher regarding any further use of this work. Publisher contact information may be obtained at <http://www.jstor.org/journals/aom.html>.

Each copy of any part of a JSTOR transmission must contain the same copyright notice that appears on the screen or printed page of such transmission.

JSTOR is an independent not-for-profit organization dedicated to creating and preserving a digital archive of scholarly journals. For more information regarding JSTOR, please contact support@jstor.org.

MONKEY SEE, MONKEY DO: THE INFLUENCE OF WORK GROUPS ON THE ANTISOCIAL BEHAVIOR OF EMPLOYEES

SANDRA L. ROBINSON
University of British Columbia

ANNE M. O'LEARY-KELLY
University of Arkansas

This cross-level field study, involving 187 employees from 35 groups in 20 organizations, examined how individuals' antisocial behaviors at work are shaped by the antisocial behavior of their coworkers. We found a positive relationship between the level of antisocial behavior exhibited by an individual and that exhibited by his or her coworkers. We also found that a number of factors moderated this relationship. Finally, we found that dissatisfaction with coworkers was higher when individuals engaged in less antisocial behavior than their coworkers.

The prevention of antisocial actions in organizations is increasingly important to American managers and organizational scholars. Recent estimates suggest there is good reason for both managers and researchers to take a closer look at these actions. Some research reports that as many as 42 percent of women have been victims of sexual harassment at work (Gruber, 1990), that as many as 75 percent of employees have stolen from their employers (McGurn, 1988), and that 33 to 75 percent of all employees have engaged in behaviors ranging from insubordination to sabotage (Harper, 1990). These actions, of course, represent some of the most serious forms of antisocial behavior. Yet we must also note the apparent prevalence of less serious, yet still harmful, actions, such as lying (DePaulo & DePaulo, 1989), spreading rumors (Skarlicki & Folger, 1997), withholding effort (Kidwell & Bennett, 1993), and absenteeism (Johns, 1997), that may violate work norms and therefore may be antisocial (Robinson & Bennett, 1995).

One of the complexities of initial research in this area has been the use of diverse labels to describe these actions. For example, Robinson and Bennett (1995) used the term "deviant behavior," O'Leary-Kelly, Griffin, and Glew (1996) described "aggressive work behavior," and Vardi and Wiener (1996) discussed "organizational misbehavior." In this article, we use the broad term "antisocial behavior" to describe negative behaviors in organizations. We

chose this expansive term because, like the well-established and related term "prosocial behavior" (Brief & Motowidlo, 1986; George, 1990), "antisocial behavior" captures a wide range of actions. In addition, the term captures the harmful nature of these acts, the fact that they have the potential to cause harm to individuals and/or the property of an organization (Giacalone & Greenberg, 1996). This dimension of potential harmfulness is the critical focus of most definitions of related constructs (for a review, see Robinson and Greenberg [1998]).

To date, forms of antisocial behavior in organizations have been examined from various theoretical perspectives. For example, using social learning theory (Bandura, 1977), O'Leary-Kelly and colleagues (1996) identified a number of individual and environmental antecedents. Martinko and Zellars (1996) expanded this framework, incorporating attribution theory into the social learning explanation. Other examples include Greenberg's (1990, 1993) work on theft and Skarlicki and Folger's (1997) research on retaliation, both of which used principles of justice theory to explain antisocial employee actions. These approaches, well grounded in established theory, have resulted in important advances in the understanding of why and when employees engage in antisocial behavior.

Although this previous research makes significant contributions, it also is limited because antisocial behaviors have predominately been examined as individual-level phenomena. This focus is reasonable in that decisions to exhibit any behavior, whether antisocial or prosocial, are made by individuals. However, additional insights might be acquired if these behaviors were examined within the social context of work groups. The purpose of

The data collection for this study was supported by an American Psychological Association Science Directorate Dissertation Research Award. We would like to thank Katherine Karl and Dean Stilwell for their helpful comments on earlier versions.

this research was to address antisocial behavior as a group-related activity. Specifically, we examined the extent to which individuals' antisocial actions are shaped by the group context within which they work. It should be emphasized that we see this focus as a supplement, not an alternative, to individual-level explanations.

THE INFLUENCE OF GROUPS ON INDIVIDUAL ANTISOCIAL ACTIONS

George (1990; George & James, 1993) used a group level of analysis to examine prosocial behaviors in organizations. Her research showed that the levels of positive and negative affectivity within a work group influenced the affective tone of the group and the group's general level of prosocial behaviors. Given the importance of work groups in predicting prosocial actions, it seems appropriate to consider whether and how work groups affect antisocial actions.

A variety of theoretical perspectives support the notion that individuals' work groups will influence the likelihood of their behaving in antisocial ways. In this research, we invoked three: (1) the attraction-selection-attrition perspective, (2) social information processing theory, and (3) social learning theory.

The Attraction-Selection-Attrition Perspective

A basic assumption underlying the attraction-selection-attrition framework is that individuals carefully analyze their work environments and adjust their individual actions accordingly (Schneider, 1975). Individuals with antisocial tendencies are more likely to be attracted to, and selected into, the group environments that fit well with those tendencies. In addition, most individuals will likely adapt some of their behaviors, cognitions, and attitudes to better fit with the social environment in which they work. Those that adapt well are more likely to remain with the organization, whereas those who do not sufficiently adapt are more likely to leave. Thus, employees within work groups should tend to be relatively homogeneous in terms of their attitudes and behavior regarding antisocial behavior because they are generally similar individuals who are experiencing comparable conditions and are trying to adapt to their common environment (Schneider, 1987; Schneider & Reichers, 1983). In other words, we would expect a positive relationship between a given individual's level of antisocial behavior and the level of antisocial behavior of his or her coworkers.

Social Information Processing Theory

Social information processing theory would also support the predictions that group-level antisocial behavior will influence the antisocial behavior of individual members and that, over time, individual members will come to have more similar levels of antisocial behavior. According to the social information processing approach, individuals use information from their immediate social environments to interpret events, develop appropriate attitudes, and understand expectations concerning their behavior and its consequences (Salancik & Pfeffer, 1978). The social context greatly determines how individuals behave by influencing how they think and feel about aspects of their work environment (Salancik & Pfeffer, 1978). Applying this perspective to antisocial behavior suggests that individual group members, working in a shared social environment, will receive similar social cues that convince them that certain types and levels of antisocial behavior are acceptable adaptations to their shared working conditions.

Social Learning Theory

O'Leary-Kelly and colleagues (1996) used Bandura's (1977) social learning perspective to examine factors that encourage antisocial behavior. One such factor was the presence of role models within a work context. They argued that if individuals work in environments that include others who serve as models for antisocial behavior, these individuals are more likely themselves to behave in antisocial ways. When individuals operate within group settings, they are typically able to observe other group members, which creates the opportunity for these members to serve as models. In addition, Bandura's research on disengagement of moral control suggests that diffusion of responsibility, a common outcome in group contexts, can lead individuals to disconnect the self-regulatory systems that typically govern moral conduct (Bandura, 1990, 1991; Bandura, Barbaranelli, Caprara, & Pastorelli, 1996).

Integrating social learning theory with the attraction-selection-attrition perspective and the social information processing approach, we considered it likely that members of groups who are analyzing their social environments for information regarding the appropriateness of particular beliefs, attitudes, and behaviors would often use other group members as role models. If other group members serve as role models, groups may have a significant influence on individual antisocial behavior through this role-modeling process. Drawing on these three

theoretical foundations, we hypothesized the following:

Hypothesis 1. There will be a positive relationship between the level of antisocial behavior within a group and the level of antisocial behavior of individual group members.

To this point, we have conceptualized social climates as relatively fixed phenomena, as conditions that either exist or do not. A more realistic portrayal, and one more consistent with the attraction-selection-attrition framework (Schneider, 1975, 1987; Schneider & Reichers, 1983), would represent such environments according to their degree of strength. A group's climate reflects the aggregate perceptions of group members regarding a particular aspect of the work setting, perceptions that influence the types of behaviors that are exhibited within the group. When there is strong similarity in members' perceptions and behaviors, the social context is most potent and thus most capable of having a profound influence on member behavior. Therefore, we expected that the degree of similarity in group members' levels of antisocial behavior would moderate the extent to which a group's general level of antisocial behavior would influence an individual group member's level.

Salancik and Pfeffer's (1978) discussion of social information processing theory is consistent with the above argument. Salancik and Pfeffer posited that the effect of a particular social environment on individual attitudes and behavior depends on the degree to which there are shared beliefs within the social environment. Social learning theory also would be consistent with this moderating effect. As argued above, the antisocial behavior of individual group members may be influenced by the role models they encounter within a group. To the extent that potential role models exhibit similar levels of antisocial behavior, there is a stronger probability that the individual member will choose a role model that reflects the group's norms. For example, if most members of a work group behave in antisocial ways, the likelihood that a new group member might choose a role model who exhibits antisocial behavior is increased, and the chance that the newcomer will develop antisocial actions is also greater. Drawing on these arguments, we predict the following moderated effect:

Hypothesis 2. The degree of similarity or of variance in antisocial behavior within a group will moderate the relationship between group antisocial behavior and individual members' antisocial behavior in such a way that the

greater the similarity (the lower the variance), the stronger the relationship.

The impact of a group on individuals is also likely to be enhanced as the members' time in the group increases. Numerous theoretical frameworks support the existence of this moderating effect. For example, social impact theory (Latane, 1981) suggests that the extent of social influence that any individual has over others is a function of, among other factors, the proximity in time and space between the relevant parties, which has been labeled "immediacy." Attraction-selection-attrition theory also supports this argument. Compared to a newcomer, an individual who has been a member of a group for some time is likely to have acquired more accurate perceptions of the group's attributes. This individual is, therefore, in a better position to determine the degree of fit between personal and group attributes. Attraction-selection-attrition principles suggest that this individual will either adjust personal behavior to fit the work environment or leave the organization (Schneider, 1975; Schneider & Reichers, 1983). The longer a member remains, then, the more likely it is that this person has chosen to remain with the group and to behave in accordance with the group's climate.

Social information processing theory and social learning theory are also consistent with this moderating effect. With the former, the longer an individual retains membership in the group, the greater is the group's ability to provide social information that shapes the individual's beliefs, attitudes, and behaviors (Salancik & Pfeffer, 1978). According to social learning theory, individuals determine the utility of modeled actions by watching the model's interactions with the environment (Bandura, 1986). Central to the notion of modeling, then, is the assumption that individuals have the opportunity to observe the model. Certainly, the longer an individual's tenure in a work group, the greater his or her opportunity to observe role models and thus, the stronger the impact of antisocial behavior role models.

Hypothesis 3. An individual member's tenure in a group will moderate the effect of the group's antisocial behavior on the individual's antisocial behavior in such a way that the relationship is stronger for members with longer tenure in the group.

In both the attraction-selection-attrition and social information processing theories, the social context is represented as the fundamental determinant of behavior (Salancik & Pfeffer, 1978; Schneider, 1975). Although the social context is not as explicit

in social learning theory, this perspective is also consistent with the notion that interactions between people determine individual behavior. Thus far, we have not addressed the question of how other factors, such as objective characteristics of a work group (for example, its structure and technology), might influence individual behavior. According to Schneider (1987), these factors will influence individual behavior indirectly, through their ability to enhance or limit interactions between people.

One objective organizational characteristic that has a history of importance within group settings is task interdependence, or the degree to which employees in a work group must coordinate their individual efforts. In groups with high task interdependence, individual members are likely to have greater opportunity to interact with others in the group. This enhanced interaction allows members to more easily acquire the social information that will, according to both the attraction-selection-attrition and social information processing frameworks, determine their subsequent behavior. In addition, in line with social learning theory (Bandura, 1973, 1977), the higher level of interaction among group members will increase the likelihood that group members will be perceived as relevant comparison others and therefore chosen as role models. Under conditions of high task interdependence, therefore, the influence of a group's antisocial behavior on individual antisocial behavior should be intensified.

Hypothesis 4. A group's level of task interdependence will moderate the relationship between group antisocial behavior and the antisocial behavior of individual members in such a way that the higher the task interdependence, the stronger the relationship.

Each of the three perspectives provides a conceptual explanation of how groups might influence the antisocial behavior of individual members. Only the attraction-selection-attrition perspective, however, deals directly with the issue of how individuals might become alienated from, and ultimately leave, a group. As mentioned previously, the attrition component of the attraction-selection-attrition framework suggests that individuals who do not fit a work environment will wish to leave their organizations (Schneider, 1975, 1987; Schneider & Reichers, 1983). This lack of fit implies that people perceive themselves to be significantly different on relevant attributes from others in the work environment, feel dissatisfied with the poor fit, and want to withdraw from the setting. One might expect, therefore, that individuals whose behaviors are very different from those of others in their work

group would experience dissatisfaction with members of the group and would wish to leave it. With regard to antisocial behavior, it seems quite likely that there will be individuals who find their personal attributes or behavioral tendencies at odds with the attributes or behaviors of a work group that engages in antisocial behavior because such behaviors are, by definition, in violation of generally held (that is, societal level) social mores.

Hypothesis 5. To the extent that individual group members exhibit lower levels of antisocial behavior than their group exhibits, they will report lower satisfaction with group members.

Hypothesis 6. To the extent that individual group members exhibit lower levels of antisocial behavior than their group does, they will report greater intentions to leave.

The theories that provide the conceptual foundation for our previous hypotheses are useful for determining how the group environment, with its explicit and implicit pressures and its formal and informal social constraints and sanctions, might affect an individual's antisocial behavior at work. However, given the potentially negative repercussions of antisocial behavior, organizations (that is, the organizational environments that exist beyond immediate work groups) typically have a clear interest in preventing such actions, even if they are explicitly and/or implicitly encouraged by a work group. For example, a work group may ignore employee theft by its members, but organizational managers outside the group want to prevent theft. This contrast presents an interesting dilemma—if the group's climate encourages antisocial behaviors, but these actions are discouraged in the larger environment, will individual group members behave in antisocial ways?

Generally, we expected a group's ability to influence a member's antisocial behavior to depend on the member's perception that such behavior can be engaged in without negative consequences; therefore, conditions that enhance the belief that punishment will follow antisocial behavior should lessen the group's influence. Two techniques that managers often use to deter antisocial behavior are the threat of punishment and close supervision of employees. We expected the group's influence to be limited by these managerial actions and predicted the following:

Hypothesis 7. The likelihood of punishment by management will moderate the relationship between group antisocial behavior and individual antisocial behavior in such a way that

the greater the likelihood of punishment, the weaker the relationship.

Hypothesis 8. Closeness of supervision will moderate the relationship between group anti-social behavior and individual antisocial behavior in such a way that the closer the supervision, the weaker the relationship.

METHODS

Overview

Sample. Data were collected from 187 full-time employees. Average tenure within the firm was 5.93 years, and average tenure in the current job was 3.87 years. Occupations and the percentages of respondents in them were as follows: production workers, 24 percent; business consultants, 19 percent; general managers, 18 percent; administrative/clerical personnel, 10 percent; real estate agents, 8 percent; accountants, 7 percent; human resource professionals, 4 percent; sales personnel, 2 percent; engineers, 2 percent; R & D staff members, 2 percent; paralegals, 2 percent; and other, 2 percent.

Respondents were from 35 work groups in 20 different organizations. The groups ranged in size from 4 to 10 employees, with the average size being 5.34 employees. Industries and the numbers of organizations in them were as follows: consumer products, 7; consulting and accounting, 6; financial services, 2; real estate, 2; social services, 1; insurance, 1; and gambling, 1.

Close to equal numbers of men (52%) and women (48%) participated in the study. Age ranged from 21 to 65 years, with an average of 32. Fifty-one percent were married. Educational level varied: 9.4 percent had high school educations, 29 percent had some college experience, 29.2 percent had bachelor's degrees, and 32.7 percent possessed graduate degrees.

Procedures. Participating organizations were selected from a list of firms recruiting from a large midwestern business school. Thirty-two percent agreed to participate. Organizationally defined boundaries were used to define work groups. Most organizations provided multiple and varied work groups for the study. For example, a manufacturer of aircraft brake linings provided five work groups in administration, engineering, and sales, and an optical and eye care product firm provided work groups in manufacturing, accounting, and administration. We used this sampling procedure because it enabled us to obtain a sample that was more diverse in terms of industries, organizations, and occupational groups. This diversity was valuable in

that it enabled us to more confidently generalize our results to the larger employee population.

All employees within each work group were asked to participate. They received surveys by mail and were asked to mail completed surveys back to us. Response rates within the work groups ranged from 37 to 100 percent, and the overall response rate was 67 percent.

Design. Our design was cross-level and primarily involved contextual independent and moderating variables and individual-level dependent variables. We measured the contextual variables by asking employees to report on characteristics of their groups and aggregating those reports for each group. Aggregating employee perceptions is a common and valid means by which to assess contextual variables (Rousseau, 1985). Aggregation of individual perceptions is more useful than using individual perceptions alone to measure contextual variables because it reduces error by averaging out random individual-level errors and biases.

Where possible, we used a version of a split sample design that allowed us to reduce many of the problems associated with common method bias. Common method bias can pose problems for survey research that relies on self-report data, especially if the data are provided by the same person at the same time (Campbell & Fiske, 1959). One important concern in such cases is that common method bias may artificially inflate observed relationships between variables. This problem may be avoided or reduced by using different respondents for reports of the independent and dependent variables. Our split sample design allowed us to do just that.

When analyzing the impact of contextual variables on an individual-level variable such as an employee's antisocial behavior, we excluded the focal employee's report of the independent variable from the aggregation of the contextual variable. We developed a program in SPSS that (1) averaged the employees' reports for each work context variable across each group and (2) assigned, to each employee within a particular group, the average score of each work context variable for that group *excluding the employee's own assessment* of the work context variable. Hence, the respondents who provided information on the independent variables were different from the respondents who provided information on the dependent variable.

Dependent Variables

Individual antisocial behavior. The dependent variable, individual antisocial behavior, was measured with a scale composed of the following items:

“damaged property belonging to my employer,” “said or did something to purposely hurt someone at work,” “did work badly, incorrectly or slowly on purpose,” “griped with coworkers,” “deliberately bent or broke a rule(s),” “criticized people at work,” “did something that harmed my employer or boss,” “started an argument with someone at work,” and “said rude things about my supervisor or organization.”

The behaviors included in this scale were derived from two sources. The primary source was other scales found in the literature that measure similar behaviors (e.g., Robinson & Bennett, 1995; Skarlicki & Folger, 1997). A secondary source was a survey of 50 employees on the university campus who were asked to provide examples of antisocial behavior at work that they had witnessed. From these two sources, we derived a large pool of behaviors. Five coders who were blind to the purpose of the study independently categorized the behaviors. Inappropriate behaviors and redundant descriptions were removed. Initially, we selected ten behaviors on the basis of their frequency, generalizability, and distinctiveness. Many of the behavior descriptions were then modified to ensure that they were clear, consistent, and not compound. Given the sensitive nature of these behaviors, we modified many descriptions in order to reduce socially desirable response bias; for instance, innocuous-sounding terms were employed where possible.

Respondents used a one-to-five scale to indicate the extent to which they had engaged in each behavior in the year prior to data collection. We used the retrospective time frame of one year to address the expected low base rate of self-reported socially undesirable behaviors (Hulin & Rousseau, 1980). A high score indicated a high level of antisocial behavior.

Face validity assessment of individual antisocial behavior. We used a sample of 70 evening master of business administration (M.B.A.) students to assess face validity. All worked full-time, and most had at least two years of work experience. Their average age was 28.12 years, and 29.4 percent were women. They were provided with a list of the ten behaviors and asked to indicate whether they perceived each behavior as potentially harmful to an organization and/or its members.

With the exception of one item, the behaviors were indicated to be potentially harmful by the vast majority of respondents. The one behavior that was not perceived as potentially injurious was “used property belonging to my employer for my own benefit,” which only 47.1 percent of the sample identified as potentially harmful. Thus, this item was dropped from the scale. For the remaining nine

items, 71 to 100 percent of respondents said the behavior described was potentially harmful to organizations and/or their members. In sum, this validity analysis ensured that the items captured in the scale closely reflected our definition. The revised scale was composed of nine items.

Construct validity assessment of individual antisocial behavior. We used a sample of 133 full-time employees from the Midwest. Forty-nine percent were women, and their average age was 43.58 years (s.d. = 10.94). The education level of the respondents varied; the average years of work experience was 23.52 (s.d. = 10.57); and the modal annual income was between \$15,000 and \$30,000.

First, we wanted to examine convergent validity by demonstrating that our measure of antisocial behavior was highly correlated with measures purported to assess similar constructs. Thus, we examined the relationship between our scale and two other scales. Lehman and Simpson's (1992) measure of antagonistic behaviors ($r = .49, p < .01$) and Rusbult, Farrell, Rogers, and Mainous's (1988) measure of neglect behaviors. We found that our measure was positively related to the antagonistic behaviors scale ($r = .49, p < .01$) and the neglect behaviors scale ($r = .46, p < .01$).

A demonstration that a focal measure is moderately correlated with measures of theoretically related constructs in a predicted fashion also provides evidence of convergent validity. Thus, we examined the relationship between our measure of antisocial behavior and two theoretically related constructs: intentions to leave a firm (Rusbult et al., 1988) and lack of job involvement. Those with high scores on these measures should also have high scores on our measure of antisocial behavior at work. The correlations were .30 ($p < .01$) for intentions to leave and .20 ($p < .05$) for job involvement. As expected, these correlations between our antisocial behavior measure and measures of theoretically related constructs were significant and in the predicted direction but not as high as the correlations between our measure of antisocial behavior and measures purporting to assess similar constructs.

We also examined discriminant validity, assessing the relationship between our measure of antisocial behavior and constructs expected to be conceptual opposites of antisocial behavior: consciousness, a type of citizenship or prosocial behavior (Podsakoff, MacKenzie, Moorman, & Fetter, 1990), and loyalty behaviors (Rusbult et al., 1988). As expected, our antisocial behavior measure was moderately and negatively related to both the measure of citizenship behavior ($r = -.24, p < .05$) and the measure of loyalty ($r = -.46, p < .05$).

In summary, the above results lent support to the construct validity of our antisocial behavior measure. The results revealed that the measure was related, in expected ways, to measures purporting to measure similar constructs, to measures of theoretically related constructs, and to measures of conceptually opposing constructs.

Reliability assessment of individual antisocial behavior. We collected additional data from the sample of 102 evening M.B.A. students. These respondents were asked to complete the above nine-item scale measuring individual antisocial behavior at two points in time two weeks apart. The test-retest reliability for this scale was .87.

The internal reliability (Cronbach's alpha) of this nine-item scale was .68 for the primary respondents used in this study. However, the alphas for the evening M.B.A. students were .75 at time 1 and .81 at time 2.

Other dependent variables. *Satisfaction with coworkers* was measured with one facet of the Job Descriptive Index (JDI; Smith, Kendall, & Hulin, 1969). Respondents used "yes," "no," or "uncertain" to indicate whether each of 18 different adjectives described different aspects of the people with whom they worked. The higher the score, the higher the satisfaction with coworkers. Reliability for this scale was .84.

We measured employees' *intentions to leave* their organizations with the following question: "How long do you intend to remain with your company?" Respondents were given an open response format and all responses were converted to years. These were then reverse-coded so that a high value reflected a high level of intentions to leave.

Independent, Moderator, and Control Variables

Group antisocial behavior. The self-report scale used to measure the dependent variable individual antisocial behavior was also used to measure group antisocial behavior, a contextual variable. The distinction between these two variables was that the dependent variable, individual antisocial behavior, was each employee's self-report of his or her antisocial behavior, whereas the independent variable, group antisocial behavior, was a value assigned to each person that reflected an aggregation of all employees' self-reports of antisocial behavior across the group, excluding the employee whose antisocial behavior was being predicted.

Moderator variables. To measure *individual tenure in group*, we asked respondents to indicate, in years, how long they had worked in the same group.

To measure *task interdependence*, we used Van

de Ven, Delbecq, and Koenig's (1976) index. In this measure diagrams represent tasks as either independent, sequentially dependent, reciprocally dependent, or teamwork. Respondents were asked to indicate the percentages of their work that conformed to each of these types of interdependence. The higher the rating, the greater the degree of task interdependence. Measuring internal reliability was not appropriate for this scale because each item (a diagram) represents an increased level of interdependence. However, Van de Ven and colleagues (1976), using two alternative measures of the construct, reported the correlation between the measures to be .72.

Likelihood of punishment was measured by giving respondents a list of four antisocial behaviors and asking them to use a one-to-five scale to indicate the extent to which they would be rewarded or punished by their superiors for engaging in each behavior. The behaviors were "engaging in destructive activities such as stealing or damaging property belonging to our employer," "doing things that could hurt other people in the organization," "doing things that could hurt the department or the organization we work for," and "doing work badly, slowly or incorrectly on purpose." A high score indicated a greater likelihood of punishment for engaging in these behaviors. Reliability was .73.

To measure *close supervision*, we used a modified version of Dewar and Werbel's (1979) measure of surveillance and enforcement; this measure primarily reflects the degree to which employees are supervised closely by their superiors. Respondents were asked to indicate, using a one-to-five scale, the extent to which they agreed or disagreed with six statements. Examples of those statements include "We are constantly being watched to see that we obey all rules" and "Our superiors are aware of everything that we do on the job." The higher the score, the closer the supervision. The reliability of this scale was .88.

Control variables. We controlled for several variables in most of our analyses. These were variables perceived to be common predictors of antisocial behavior in the workplace. To the extent we were able to control for alternative predictors of antisocial behavior, we were able to demonstrate the unique influence of group antisocial behavior on individual antisocial behavior.

First, we controlled for both *close supervision* and *likelihood of punishment*, except in direct tests of these variables. In traditional explanatory models of destructive behavior, such behavior has been viewed as largely dependent upon the presence or absence of formal constraints (e.g., Hirschi, 1969), such as monitoring employee behavior and apply-

ing sanctions (e.g., Tittle, 1973). Indeed, a host of research has suggested that the use of monitoring and sanctions can reduce employee deviance (e.g., Hollinger & Clark, 1983), workplace theft (e.g., Greenberg & Scott, 1996), and cheating (e.g., Covey, Saladin, & Kilen, 1989).

We also controlled for level of *job satisfaction*, including the facets of job satisfaction found within the JDI: pay satisfaction, promotion satisfaction, work satisfaction, and supervisor satisfaction. In another common explanatory model of destructive workplace behavior, such behavior is viewed as emanating from job dissatisfaction, or perceived discrepancies between what has been received and what is desired or expected (Ditton, 1977; Merriam, 1977). Indeed, a common assumption is that disgruntled employees are the most likely to engage in harmful or vengeful acts (Skarlicki & Folger, 1997). A high score on this general satisfaction measure indicated high general satisfaction.

We also controlled for *perceived control*, since another theoretical explanation for antisocial workplace behavior is that it is the result of a lack of control on the part of an employee. Indeed, some research has suggested that such behavior is an unconventional means by which employees seek to gain more control over their environment when conventional means are unavailable (Bennett, 1998; Storms & Spector, 1987). This variable was assessed with Ashford, Lee, and Bobko's (1989) three-item measure, which uses a five-point response scale. A high score on this variable indicated high perceived control.

We also controlled for a number of demographic variables, including *gender*, *age*, *tenure in the organization*, and *educational level*, for several reasons. First, these variables provide distal proxies for an individual predisposition toward antisocial behavior. Second, numerous studies have found demographics to be significant predictors of antisocial behavior. For example, gender has been linked to aggression (Baron & Richardson, 1994), absenteeism (Johns, 1997), and drug use at work (Hollinger, 1988); education has been linked to alcohol and substance abuse on the job (Mensch & Kandel, 1988); and age has been associated with absenteeism (Martocchio, 1994), substance abuse at work (Steffy & Laker, 1991), and organizational theft (Murphy, 1993).

Gender was measured with the question "Are you male or female?" (male was coded 1 and female, 0). Age was measured with the open-ended question "How old are you?" Educational level was measured with "What is your educational level?" Respondents could check one of four categories as representing the highest level they had completed:

high school (coded 1), bachelor's degree (2), some college or advanced training from a college (3), or graduate degree (4).

RESULTS

Justification of Aggregation

We assessed the appropriateness of aggregating our contextual variables to the group level using two different procedures: between-group analysis of variance (ANOVA) and r_{wg} (James, Demaree, & Wolf, 1984, 1993; George & James, 1993), a meaningful indicator of within-group agreement (Kozlowski & Hattrup, 1992). The results of the ANOVAs indicated that there were significant between-group differences for group antisocial behavior ($F_{34, 152} = 1.96, p < .01$), task interdependence ($F_{34, 145} = 3.27, p < .01$), close supervision ($F_{34, 144} = 1.39, p < .09$), and likelihood of punishment ($F_{34, 151} = 2.82, p < .01$).

The results of r_{wg} analyses (mean r_{wg} 's) using a rectangular uniform null distribution yielded values for all the variables that indicated high levels of within-group agreement. Values above 0.70 are desirable (George, 1990; Nunnally, 1978). Values for group antisocial behavior ranged from 0.92 to 0.99, with median of 0.98. Values for the measure of task interdependence ranged from 0.80 to 0.97, with a median of 0.89. For the measure of close supervision, values ranged from 0.26 to 0.99, but the median was 0.90, and 86 percent of the groups had values above 0.70. And values for the measure of likelihood of punishment ranged from 0.75 to 1.0, with a median of 0.98.

Tests of Hypotheses

The correlation matrix and descriptive statistics of our variables are presented in Table 1. Hypothesis 1 predicted that group antisocial behavior would be positively related to the antisocial behavior of individual group members. To test this hypothesis, we performed hierarchical regression analyses. Table 2 presents these results. In the first step, only the control variables were entered into the equation: tenure in the organization, age, education, gender, perceived control, general satisfaction, likelihood of punishment, and close supervision. In the second step, group antisocial behavior was added to the equation. Group antisocial behavior significantly predicted individual antisocial behavior ($\beta = .29, p < .01; F_{9, 125} = 3.36, p < .01; R^2 = .19$). Thus, as predicted, group antisocial behavior explained considerable unique variance in individual antisocial behavior beyond that which was accounted for by the control variables.

TABLE 1
Correlations and Descriptive Statistics for All Variables^a

Variables	Mean	s.d.	1	2	3	4	5	6	7	8	9	10	11	12	13
Control															
1. Perceived control	2.72	0.84													
2. Gender ^b	1.46	0.50	-.15*												
3. Age	32.54	10.13	-.11	.09											
4. Tenure in firm	5.93	6.34	.08	-.01	.74**										
5. Education	2.84	1.00	-.12	-.23**	-.35**	-.39**									
6. General satisfaction	167.02	32.76	.40**	-.14	-.03	-.03	.19*								
Dependent															
7. Individual antisocial behavior	1.45	0.38	-.07	-.04	-.01	-.04	.12	-.24**							
8. Satisfaction with coworkers	42.85	9.67	.24**	-.04	-.06	-.11	.28**	.56**	-.05						
9. Intentions to leave	9.62	12.13	.16	-.05	.59**	.61**	-.51**	.10	-.03	-.15					
Independent															
10. Group antisocial behavior ^c	1.82	0.14	.04	-.22**	-.21*	-.19*	.11	-.05	.17*	.02	-.18*				
Moderators															
11. Individual tenure in group	3.87	5.07	.07	.06	.51**	.59**	-.26**	-.07	.13	-.12	.50**	-.11			
12. Task interdependence ^c	2.29	0.52	-.03	-.10	-.03	.02	.19**	.17*	.09	.14*	-.17	.15*	-.11		
13. Likelihood of punishment ^c	4.34	0.51	-.10	.01	-.03	-.00	.10	-.00	-.01	.08	.06	-.01	.00	.15	
14. Close supervision ^c	3.08	0.53	.03	.10	.00	.09	-.25**	-.23**	-.10	-.15*	.00	-.02	.16*	.07	.03

^a *N* ranges from 164 to 187.

^b Coded as male = 1, female = 0.

^c Values are group means (each individual in a group was assigned the group mean for this variable).

* $p < .05$

** $p < .01$

Hypotheses 2 through 4 each predicted a moderating effect for the relationship between group antisocial behavior and individual antisocial behavior. We used moderated regression analysis to test these hypotheses; Table 3 has results. In order to reduce the multicollinearity associated with the use of interaction terms, we centered the independent variables around zero before creating the interaction terms (Aiken & West, 1991).

Hypothesis 2 predicted that the degree of similarity in the levels of group members' antisocial behavior would moderate the relationship between group antisocial behavior and individual antisocial behavior in such a way that the more similar the group antisocial behavior (the lower the variance), the stronger the relationship. The interaction of group antisocial behavior and variance in group antisocial behavior was significant ($\beta = -.48$, $p < .01$; $F_{11, 121} = 6.60$, $p < .01$; $R^2 = .37$). To interpret the direction of this interaction effect, we followed Aiken and West's (1991) recommendations. First, the regression equation was restructured algebraically to express the regression of individual antisocial behavior on group antisocial behavior at different levels of variance in the group measure. Next, we derived a series of simple regression equa-

tions by substituting in three different values of variance, as recommended by Cohen and Cohen (1983). Next, we examined the simple slopes to determine if they differed from zero and each other. The interaction term was found to be in the predicted direction: variance in group antisocial behavior moderated the relationship between group and individual antisocial behavior in such a way that the lower the group variance (the more similar the levels of antisocial behavior in the group), the stronger the relationship. Hence, Hypothesis 2 was supported.

Hypothesis 3 predicted that individual tenure in a work group would moderate the relationship between group and individual antisocial behavior in such a way that the longer an employee has been in his or her group, the stronger the relationship will be. The interaction of group antisocial behavior and individual tenure was significant in the moderated regression analysis ($\beta = .25$, $p < .01$; $F_{11, 121} = 3.54$, $p < .01$; $R^2 = .24$). To test the direction of this significant relationship, we performed the same calculus described above and found that the direction of the interaction effect was as predicted. Hence, Hypothesis 3 was supported.

Hypothesis 4 predicted that the greater the task

TABLE 2
Results of Hierarchical Regression Analysis
Examining the Influence of Group Antisocial
Behavior on Individual Antisocial Behavior^a

Variable	Step 1: Control	Step 2: Independent Effect
Control		
Tenure in firm	.22**	
Age	-.21	
Education	.26**	
Gender ^b	-.11	
Perceived control	-.01	
General satisfaction	-.24*	
Likelihood of punishment	.01	
Close supervision	-.14	
Independent effect		
Group antisocial behavior		.29**
<i>R</i> ²	.21	.19
Adjusted <i>R</i> ²	.14	.14
Change in <i>R</i> ²		.02
<i>F</i>	3.26**	3.36**
<i>df</i>	10, 124	9, 125

^a Entries are betas.

^b Coded as male = 1, female = 0.

* $p < .05$

** $p < .01$

interdependence of a work group's members, the stronger the relationship between group antisocial behavior and individual antisocial behavior. When this interaction term was entered into the equation with the control variables and the main effects, it was significant ($\beta = .20$, $p < .05$; $F_{11, 121} = 3.51$, $p < .01$; $R^2 = .24$) and in the predicted direction. Thus, Hypothesis 4 was supported.

Hypotheses 5 and 6 predicted that to the extent that an individual group member engaged in less antisocial behavior than his or her group, the focal individual's satisfaction with group members would be lower and his or her intentions to leave would be greater. To test this prediction, we created a variable representing the difference between group and individual antisocial behavior; the higher the value of this variable, the higher the level of group antisocial behavior relative to the individual level. Separate hierarchical regression analyses were performed for each of the dependent variables. Table 4 shows results. In the first step, we entered the control variables age, education, gender, tenure in group, and tenure in organization. In the second step, the variable reflecting the difference between group and individual antisocial behavior was entered. As predicted, the higher the group's antisocial behavior relative to the individual's antisocial behavior, the less satisfied an individual was with his or her coworkers ($\beta = -.25$,

$p < .01$; $F_{7, 148} = 3.04$, $p < .01$; $R^2 = .13$). However, the difference between group and individual antisocial behavior was not significantly related to intentions to leave ($\beta = -.09$, n.s.; $F_{7, 106} = 15.69$, $p < .01$; $R^2 = .51$). Thus, support was found for Hypothesis 5 but not Hypothesis 6.

Finally, we used moderated hierarchical regression analysis to test Hypothesis 7 and Hypothesis 8, which predicted that likelihood of punishment by management and degree of close supervision would moderate the relationship between group and individual antisocial behavior. As Table 5 shows, when the interaction of group antisocial behavior and likelihood of punishment was entered into the equation, it was significant ($\beta = -.20$, $p < .05$; $F_{10, 124} = 3.76$, $p < .01$; $R^2 = .23$). Following the same procedure previously described, we found that the relationship was in the predicted direction. However, group antisocial behavior by close supervision was not significant when it was entered ($\beta = .02$, n.s.; $F_{10, 124} = 3.00$; $p < .01$; $R^2 = .19$). Hence, support was found for Hypothesis 7 but not for Hypothesis 8.

DISCUSSION

In this research, we explored the extent to which work group context influenced the antisocial behavior of individual employees. We found that, even with many other explanatory variables controlled, the antisocial behavior exhibited by a work group was a significant predictor of an individual's antisocial behavior at work. These findings provide preliminary evidence that a group-level focus is appropriate and important for understanding such behavior in work settings.

Our findings also suggest that several conditions moderate this group influence. Consistent with attraction-selection-attrition theory (Schneider, 1975, 1987; Schneider & Reichers, 1983), groups with stronger antisocial climates appeared to have greater ability to influence individual members' antisocial actions. In addition, we found that the influence of a group's antisocial behavior on an individual's antisocial behavior became stronger as the individual's time in the group increased. Finally, our results indicated that when group members had to rely upon each other for task accomplishment (task interdependence was high), individual behavior was more strongly related to the level of antisocial behavior exhibited by the group. When considered together, these findings present a consistent pattern, suggesting that as the richness of the group experience increases, members become more likely to match their level of antisocial behavior to that of the group.

TABLE 3
Results of Hierarchical Regression Analysis Examining Moderators of the Group Antisocial Behavior–Individual Antisocial Behavior Relationship^a

Variable	Step 1: Control and Independent Effects	Steps 2–4: Interactions		
Control				
Tenure in firm	.25**			
Age	-.15			
Education	.19			
Gender ^b	.14			
Perceived control	-.00			
General satisfaction	-.21*			
Likelihood of punishment	.01			
Close supervision	-.06			
Independent effects				
Group antisocial behavior	.24**			
Variance in group antisocial behavior	.14			
Individual tenure in group	.06			
Task interdependence	.11			
Interactions				
Group antisocial behavior × variance in group antisocial behavior		-.48**		
Group antisocial behavior × tenure in group			.25**	
Group antisocial behavior × task interdependence				.20*
<i>R</i> ²	.20	.37	.24	.24
Adjusted <i>R</i> ²	.14	.32	.17	.17
Change in <i>R</i> ²		.17	.04	.04
<i>F</i>	3.17**	6.60**	3.54**	3.51**
<i>df</i>	12, 122	13, 121	13, 121	13, 121

^a Entries are betas.

^b Coded as male = 1, female = 0.

* $p < .05$

** $p < .01$

Another interesting finding of this study is that to the extent that an individual employee exhibited less antisocial behavior than his or her group, he or she was less satisfied with coworkers. This finding is consistent with the attraction-selection-attrition perspective, suggesting that prosocial individuals working in a sea of antisocial individuals may experience discomfort or dissonance that in turn may lead to attrition among those who do not fit. However, contrary to our prediction, we did not find that intentions to leave an organization were higher for those whose antisocial behavior was lower than that of the group. Possibly our single-item measure of intentions to leave was inadequate. Another explanation is that a misfit with one's work group results in attrition through leaving the group (a variable we did not assess in this study) rather than through leaving the organization.

Implications for Future Research

These results have interesting implications for the groups literature, for research on antisocial behavior in organizations, and for practicing manag-

ers. In light of the groups literature, the general finding that groups influence their members is not unexpected. Since the time of the Hawthorne studies (Roethlisberger & Dickson, 1939), management scholars have noted the effects of work groups on individuals. What has changed over time, however, is the manner in which these effects have been viewed. Early research depicted groups as sources of management problems, but more recent research has conceptualized groups as solutions to many work-related problems (Shea & Guzzo, 1987). Of course, in reality group effects are both positive and negative. Our results indicate that groups displaying high levels of antisocial behavior may influence members to perform antisocial actions. The alternative, however, should not be overlooked—that groups displaying high levels of *prosocial* behavior encourage such behavior by members (George, 1990). Therefore, the primary implication of our research is not that groups have negative effects on individuals but, rather, that group effects are significant and should be better understood. The groups literature suggests that the group influences we found were driven by the development of anti-

TABLE 4
Results of Hierarchical Regression Analysis
Examining the Impact of Differences between
Group and Individual Antisocial Behavior^a

Variable	Satisfaction with Coworkers		Intentions to Remain	
	Step 1	Step 2	Step 1	Step 2
Control				
Age	-.01		.27**	
Education	.32**		-.34**	
Gender ^b	.03		-.17*	
Tenure in firm	.10		.29**	
Tenure in group	-.07		-.09	
Group antisocial behavior	.15		-.06	
Independent effects				
Group antisocial behavior		-.25**		-.09
Individual antisocial behavior Difference				
<i>R</i> ²	.09	.13	.50	.51
Adjusted <i>R</i> ²	.06	.08	.48	.48
Change in <i>R</i> ²		.04		
<i>F</i>	2.56*	3.04**	18.07**	15.69**
<i>df</i>	6, 149	7, 148	6, 107	7, 106

^a Entries are betas.

^b Coded as male = 1, female = 0.

* *p* < .05

** *p* < .01

social norms within the studied groups. An important future research direction will be to identify how work group expectations regarding antisocial behavior are developed, communicated, and enforced.

Our results also are informative for the workplace deviance literature. The findings reported here provide preliminary evidence that a group effect does occur, suggesting that future research at the group level will be beneficial to an enhanced understanding of why, when, and how people behave aggressively at work. Previous research on deviance has emphasized the importance of both individual and environmental factors in predicting individuals' antisocial workplace actions (O'Leary-Kelly et al., 1996). To date, however, environmental factors have been described primarily as organization-level phenomena. Of course, the work group itself is also a component of an individual's work environment. However, we would argue that the work group's influence should be conceptualized as more than just an additional environmental variable to be explored. Because of its centrality to the individual-organization interface, an understanding of the group may be critical to an understanding

TABLE 5
Results of Hierarchical Regression Analysis
Examining the Moderating Effects of Punishment
and Close Supervision on the Group Antisocial
Behavior-Individual Antisocial Behavior
Relationship^a

Variable	Step 1: Independent Effects		Step 2: Interactions	
Control				
Tenure in firm		.21*		
Age		-.13		
Education		.21*		
Gender ^b		.12		
Perceived control		.02		
General satisfaction		-.23**		
Independent effects				
Close supervision		-.07		
Group antisocial behavior		.29**		
Likelihood of punishment		.01		
Interactions				
Group antisocial behavior × punishment			-.20*	
Group antisocial behavior × surveillance				.02
<i>R</i> ²	.19	.23	.19	
Adjusted <i>R</i> ²	.14	.17	.13	
Change in <i>R</i> ²		.04	.00	
<i>F</i>	3.36**	3.76**	3.00**	
<i>df</i>	9, 125	10, 124	10, 124	

^a Entries are betas.

^b Coded as male = 1, female = 0.

* *p* < .05

** *p* < .01

of other antecedents, both environmental and individual.

For example, with regard to environmental antecedents to aggression, previous research has examined factors such as adverse treatment (for instance, an individual's perception that an organization has blocked his or her personal goals; O'Leary-Kelly et al., 1996). Of course, an individual's belief that he or she has been adversely treated by an organization depends on how this term is defined. The individual's definition will be influenced not only by the actual treatment that is received, but also by his or her interpretation of this treatment, with that interpretation being affected by information received from the social environment—for instance, from the work group (Salancik & Pfeffer, 1978; Schneider, 1987). A strong work group can be conceptualized as a setting that exists at the intersection of the individual and the organization. The group provides a social context that is critical to the individual's interpretation of organization-level

systems. This social context, therefore, can have a significant effect on individuals' antisocial behavior.

Implications for Managers

Finally, our research has implications for managers. Perhaps most obviously, it highlights the necessity for strong actions to be taken to counter antisocial behavior in organizations. The group effect we found here might be described more simply as a *contagion effect*. This effect may help to explain why it appears that acts of aggression seem to spread or occur in clusters within a given industry or organization. The message for managers seems clear—antisocial groups encourage antisocial individual behavior. It is crucial to nip behaviors deemed harmful in the bud so as to avoid a social influence effect. Managers who expect that isolating or ignoring antisocial groups will encourage them to change are probably mistaken.

The findings related to the influence of likelihood of punishment and closeness of supervision also have interesting implications for practice. Although we found that the likelihood of punishment weakened the relationship between group antisocial behavior and individual antisocial behavior, we did not find that closeness of supervision made any difference. This suggests that common forms of deterrence, such as monitoring employee behavior, will not necessarily impact individuals' antisocial behavior if perceptions of punishment are unaffected.

Limitations

As always, limitations of our study should be considered in its interpretation. First, our design was cross-sectional, not longitudinal. Research that assesses the influence of group context over time would provide additional and stronger support for the existence of these effects. Another possible limitation is the sampling method we employed. We obtained a diverse sample of occupational groups from different organizations and industries so that our results would be generalizable to the overall population of employees. This method, however, may have introduced unnecessary noise, deflating our observed relationships. In addition, we could not be certain that we obtained representative groups from each organization. For example, certain types of employees within each group may have been more likely to respond than others, thus biasing our results. However, we contend that our sample is more representative of the overall popu-

lation of employees than a sample drawn from all employees within only one organization.

Also, we were unable to reduce all common method bias. Our split-sample design was useful in reducing most of the method variance because, for the most part, different respondents were used to assess the dependent and independent variables. Nevertheless, this design cannot eliminate all forms of common method variance. For example, perhaps the observed relationships were somewhat inflated because all of the variables were assessed with survey measures.

Finally, we were unable to control for the role of individual predispositions in explaining antisocial behavior at work. Although our control variables included individual demographic characteristics as proxies for predispositions, ideally we would have more directly measured and controlled for antisocial predispositions, such as prior learning of aggressive behavior, family background, personality, and child-rearing practices. Future researchers should consider this possibility.

Conclusion

Despite these limitations, the implications of this study are significant. Antisocial behavior is not simply an individual-level phenomenon. As the results of this study show, the social context of the work group has an extensive influence over whether and when individuals will behave in antisocial ways at work. From a research perspective, these findings suggest numerous useful directions for future investigation. From a managerial perspective, these findings indicate that organizations have both the ability and responsibility to influence antisocial behavior by shaping work group dynamics. Our results confirm that antisocial behavior at work is not only prevalent—it is also contagious.

REFERENCES

- Aiken, L. S., & West, S. G. 1991. *Multiple regression: Testing and interpreting interactions*. Thousand Oaks, CA: Sage.
- Ashford, S. J., Lee, C., & Bobko, P. 1989. Content, causes, and consequences of job insecurity: A theory-based measure and substantive test. *Organizational Behavior and Human Decision Processes*, 43: 207–242.
- Bandura, A. 1973. *Aggression: A social learning analysis*. Englewood Cliffs, NJ: Prentice-Hall.
- Bandura, A. 1977. *Social learning theory*. Englewood Cliffs, NJ: Prentice-Hall.

- Bandura, A. 1986. *Social foundations of thought and action: A social cognitive theory*. Englewood Cliffs, NJ: Prentice-Hall.
- Bandura, A. 1990. Selective activation and disengagement of moral control. *Journal of Social Issues*, 46(1): 27–46.
- Bandura, A. 1991. Social cognitive theory of moral thought and action. In W. M. Kurtines & J. L. Gewirtz (Eds.), *Handbook of moral behavior and development: Theory, research, and application*, vol. 1: 71–129. Hillsdale, NJ: Erlbaum.
- Bandura, A., Barbaranelli, C., Caprara, G. V., & Pastorelli, C. 1996. Mechanism of moral disengagement in the exercise of moral agency. *Journal of Personality and Social Psychology*, 71: 364–374.
- Baron, R. A., & Richardson, D. R. 1994. *Human aggression* (2nd ed.). New York: Plenum.
- Bennett, R. 1998. Perceived powerlessness as a cause for workplace deviance. In R. Griffin, A. O'Leary-Kelly, & J. Collins (Eds.), *Dysfunctional behavior in organizations*: 229–240. Greenwich, CT: JAI Press.
- Brief, A. P., & Motowidlo, S. J. 1986. Prosocial organizational behaviors. *Academy of Management Review*, 11: 710–725.
- Campbell, D. T., & Fiske, D. W. 1959. Convergent and discriminant validation by the multitrait-multimethod matrix. *Psychological Bulletin*, 56: 81–105.
- Cohen, J., & Cohen, P. 1983. *Applied multiple regression/correlation analyses for the behavioral sciences* (2nd ed.). Hillsdale, NJ: Erlbaum.
- Covey, M. K., Saladin, S., & Kilen, P. J. 1989. Self-monitoring, surveillance, and incentive effects on cheating. *Journal of Social Psychology*, 129: 673–679.
- DePaulo, P. J., & DePaulo, B. M. 1989. Can deception by salespersons and customers be detected through nonverbal behavioral cues? *Journal of Applied Social Psychology*, 19: 1552–1577.
- Dewar, R. D., & Werbel, J. 1979. Universalistic and contingency predictions of employee satisfaction and conflict. *Administrative Science Quarterly*, 24: 426–448.
- Ditton, J. 1977. *Part-time crime: An ethnography of fiddling and pilferage*. London: Macmillan.
- George, J. M. 1990. Personality, affect and behavior in groups. *Journal of Applied Psychology*, 75: 107–116.
- George, J. M., & James, L. R. 1993. Personality, affect, and behavior in groups revisited: Comment on aggregation, levels of analysis, and a recent application of within and between analysis. *Journal of Applied Psychology*, 78: 798–804.
- Giacalone, R. A., & Greenberg, J. 1996. *Antisocial behavior in organizations*. Thousand Oaks, CA: Sage.
- Greenberg, J. 1990. Employee theft as a reaction to underpayment inequity: The hidden cost of pay cuts. *Journal of Applied Psychology*, 75: 561–568.
- Greenberg, J. 1993. Stealing in the name of justice: Informational and interpersonal moderators of theft reactions to underpayment inequity. *Organizational Behavior and Human Decision Processes*, 54: 81–103.
- Greenberg, J., & Scott, K. S. 1996. Why do workers bite the hands that feed them? Employee theft as a social exchange process. In B. M. Staw & L. L. Cummings (Eds.), *Research in organizational behavior*, vol. 18: 111–156. Greenwich, CT: JAI Press.
- Gruber, J. E. 1990. How women handle sexual harassment: A literature review. *Social Science Research*, 74: 3–9.
- Harper, D. 1990. Spotlight abuse—save profits. *Industrial Distribution*, 79(3): 47–51.
- Hirschi, T. 1969. *Causes of delinquency*. Berkeley: University of California Press.
- Hollinger, R. C. 1988. Working under the influence (WUI): Correlates of employees' use of alcohol and other drugs. *Journal of Applied Behavioral Science*, 24: 439–454.
- Hollinger, R. C., & Clark, J. P. 1983. Deterrence in the workplace: Perceived certainty, perceived severity, and employee theft. *Social Forces*, 62: 398–418.
- Hulin, C., & Rousseau, D. M. 1980. Analyzing infrequent events: Once you find them, your troubles begin. In K. H. Roberts & L. Burstein (Eds.), *Issues in aggregation*: 65–75. San Francisco: Jossey-Bass.
- James, L. R., Demaree, R. G., & Wolf, G. 1984. Estimating within-group interrater reliability with and without response bias. *Journal of Applied Psychology*, 69: 431–444.
- James, L. R., Demaree, R. G., & Wolf, G. 1993. r_{wg} : An assessment of within-group interrater agreement. *Journal of Applied Psychology*, 78: 306–309.
- Johns, G. 1997. Contemporary research on absence from work: Correlates, causes, and consequences. In C. L. Cooper & I. T. Robertson (Eds.), *International review of industrial and organizational psychology*: 115–174. London: Wiley.
- Kidwell, R. E., & Bennett, N. 1993. Employee propensity to withhold effort: A conceptual model to intersect three avenues of research. *Academy of Management Review*, 18: 429–456.
- Kozlowski, S. W., & Hattrup, K. 1992. A disagreement about within-group agreement: Disentangling issues of consistency versus consensus. *Journal of Applied Psychology*, 77: 161–167.
- Latane, B. 1981. The psychology of social impact. *American Psychologist*, 36: 343–356.
- Lehman, W., & Simpson, D. 1992. Employee substance abuse and on-the-job behaviors. *Journal of Applied Psychology*, 77: 309–321.
- Martinko, M. J., & Zellars, K. L. 1996. *Toward a theory of*

- workplace violence: A social learning and attributional perspective.** Paper presented at the annual meeting of the Academy of Management, Cincinnati.
- Martocchio, J. J. 1994. The effects of absence culture on individual absence. *Human Relations*, 47: 243–262.
- McGurn, M. 1988. Spotting the thieves who work among us. *Wall Street Journal*, March 8: A16.
- Mensch, B. S., & Kandel, D. B. 1988. Do job conditions influence the use of drugs? *Journal of Health and Social Behavior*, 29: 169–184.
- Merriam, D. H. 1977. Employee theft. *Criminal Justice Abstracts*, 9: 375–406.
- Murphy, K. R. 1993. *Honesty in the workplace*. Belmont, CA: Brooks/Cole.
- Nunnally, J. C. 1978. *Psychometric theory* (2nd ed.). New York: McGraw-Hill.
- O'Leary-Kelly, A. M., Griffin, R. W., & Glew, D. J. 1996. Organization-motivated aggression: A research framework. *Academy of Management Review*, 21: 225–253.
- Podsakoff, P. M., MacKenzie, S., Moorman, R. H., & Fetter, R. 1990. Transformational leader behaviors and their effects on followers' trust in leader, satisfaction, and organizational citizenship behaviors. *Leadership Quarterly*, 1: 107–142.
- Robinson, S. L., & Bennett, R. J. 1995. A typology of deviant workplace behavior: A multidimensional scaling study. *Academy of Management Journal*, 38: 555–572.
- Robinson, S. L., & Bennett, R. J. 1997. Workplace deviance: Its nature, its causes, and its manifestations. In R. J. Lewicki, R. J. Bies, & B. H. Sheppard (Eds.), *Research on negotiation in organizations*, vol. 6: 3–28. Greenwich, CT: JAI Press.
- Robinson, S. L., & Greenberg, J. 1998. Employees behaving badly: Dimensions, determinants and dilemmas in the study of workplace deviance. In D. M. Rousseau & C. Cooper (Eds.), *Trends in organizational behavior*, vol. 5: Forthcoming. New York: Wiley.
- Roethlisberger, F. J., & Dickson, W. J. 1939. *Management and the worker*. Cambridge, MA: Harvard University Press.
- Rousseau, D. M. 1985. Issues of level in organizational research. In L. L. Cummings & B. M. Staw (Eds.), *Research in organizational behavior*, vol. 7: 1–37. Greenwich, CT: JAI Press.
- Rusbult, C., Farrell, D., Rogers, G., & Mainous, A. 1988. Impact of exchange variables on exit, voice, loyalty, and neglect: An integrative model of responses to declining job satisfaction. *Academy of Management Journal*, 31: 599–627.
- Salancik, G. J., & Pfeffer, J. 1978. A social information processing approach to job attitudes and task design. *Administrative Science Quarterly*, 23: 224–253.
- Schneider, B. 1975. Organizational climates: An essay. *Personnel Psychology*, 28: 447–480.
- Schneider, B. 1987. The people make the place. *Personnel Psychology*, 40: 437–454.
- Schneider, B., & Reichers, A. E. 1983. On the etiology of climates. *Personnel Psychology*, 36: 19–39.
- Shea, G. P., & Guzzo, R. A. 1987. Groups as human resources. In K. M. Rowland & G. R. Ferris (Eds.), *Research in personnel and human resources management*, vol. 5: 323–356. Greenwich, CT: JAI Press.
- Skarlicki, D. P., & Folger, R. 1997. Retaliation in the workplace: The roles of distributive, procedural, and interactional justice. *Journal of Applied Psychology*, 82: 416–425.
- Smith, P. C., Kendall, L. M., & Hulin, C. L. 1969. *The measurement of satisfaction in work and retirement*. Chicago: Rand McNally.
- Steffy, B. D., & Laker, D. R. 1991. Workplace and personal stresses antecedent to employee's alcohol use. *Journal of Social Behavior and Personality*, 6: 115–126.
- Storms, P., & Spector, P. 1987. Relationships of organizational frustration with reported behavioral reactions: The moderating effect of locus of control. *Journal of Occupational Psychology*, 60: 227–234.
- Tittle, C. R. 1973. Sanction fear and the maintenance of social order. *Social Forces*, 55: 579–596.
- Van de Ven, A. H., Delbecq, A. L., & Koenig, R. 1976. Determination of coordination modes within organizations. *American Sociological Review*, 41: 322–338.
- Vardi, Y., & Wiener, Y. 1996. Misbehavior in organizations: A motivational framework. *Organizational Science*, 7: 151–165.

Sandra L. Robinson (Ph.D., Northwestern University) is currently an assistant professor of organizational behavior at the University of British Columbia. Her research interests include psychological contracts and contract breach in employment relationships, workplace deviance, and workplace aggression.

Anne M. O'Leary-Kelly is an associate professor of management at the University of Arkansas. She received her Ph.D. in organizational behavior and human resource management from Michigan State University. Her current research interests include aggressive work behavior, motivational issues in groups, and psychological contracts.