



Internet Research

Emerald Article: Do current anti-cyberloafing disciplinary practices have a replica in research findings?: A study of the effects of coercive strategies on workplace Internet misuse

Pablo Zoghbi Manrique de Lara, Domingo Verano Tacoronte, Jyh-Ming Ting Ding

Article information:

To cite this document: Pablo Zoghbi Manrique de Lara, Domingo Verano Tacoronte, Jyh-Ming Ting Ding, (2006), "Do current anti-cyberloafing disciplinary practices have a replica in research findings?: A study of the effects of coercive strategies on workplace Internet misuse", Internet Research, Vol. 16 Iss: 4 pp. 450 - 467

Permanent link to this document:

<http://dx.doi.org/10.1108/10662240610690052>

Downloaded on: 22-12-2012

References: This document contains references to 121 other documents

Citations: This document has been cited by 7 other documents

To copy this document: permissions@emeraldinsight.com

This document has been downloaded 1410 times since 2006. *

Users who downloaded this Article also downloaded: *

Pablo Zoghbi Manrique de Lara, Domingo Verano Tacoronte, Jyh-Ming Ting Ding, (2006), "Do current anti-cyberloafing disciplinary practices have a replica in research findings?: A study of the effects of coercive strategies on workplace Internet misuse", Internet Research, Vol. 16 Iss: 4 pp. 450 - 467
<http://dx.doi.org/10.1108/10662240610690052>

Pablo Zoghbi Manrique de Lara, Domingo Verano Tacoronte, Jyh-Ming Ting Ding, (2006), "Do current anti-cyberloafing disciplinary practices have a replica in research findings?: A study of the effects of coercive strategies on workplace Internet misuse", Internet Research, Vol. 16 Iss: 4 pp. 450 - 467
<http://dx.doi.org/10.1108/10662240610690052>

Pablo Zoghbi Manrique de Lara, Domingo Verano Tacoronte, Jyh-Ming Ting Ding, (2006), "Do current anti-cyberloafing disciplinary practices have a replica in research findings?: A study of the effects of coercive strategies on workplace Internet misuse", Internet Research, Vol. 16 Iss: 4 pp. 450 - 467
<http://dx.doi.org/10.1108/10662240610690052>

Access to this document was granted through an Emerald subscription provided by HARBIN INSTITUTE OF TECHNOLOGY

For Authors:

If you would like to write for this, or any other Emerald publication, then please use our Emerald for Authors service.

Information about how to choose which publication to write for and submission guidelines are available for all. Please visit www.emeraldinsight.com/authors for more information.

About Emerald www.emeraldinsight.com

With over forty years' experience, Emerald Group Publishing is a leading independent publisher of global research with impact in business, society, public policy and education. In total, Emerald publishes over 275 journals and more than 130 book series, as well as an extensive range of online products and services. Emerald is both COUNTER 3 and TRANSFER compliant. The organization is a partner of the Committee on Publication Ethics (COPE) and also works with Portico and the LOCKSS initiative for digital archive preservation.

*Related content and download information correct at time of download.



INTR
16,4

450

Do current anti-cyberloafing disciplinary practices have a replica in research findings?

A study of the effects of coercive strategies on workplace Internet misuse

Pablo Zoghbi Manrique de Lara, Domingo Verano Tacoronte and
Jyh-Ming Ting Ding

University of Las Palmas de Gran Canaria, Las Palmas, Spain

Abstract

Purpose – This study aims to test the extent to which current coercive control strategies receive research support in controlling deviant workplace Internet behavior, also called cyberloafing. Consequently, it examines the relationship between cyberloafing and three classic coercive variables: perceived organizational control (POC), fear of formal punishment (FFP) and physical leadership proximity (LPP) as sensed by the employee. The model tested suggests that perceptions of leader physical proximity (LPP) antecede both the organizational amount of control (POC) and FFP and these both ones, in turn, affect cyberloafing. Additionally, the model suggests that POC increases FFP.

Design/methodology/approach – Data were collected from 147 (19.4 percent) of the 758 non-teaching staff at a Spanish public university. Accessibility of individual e-mail accounts was similar for all employees. E-mails asking for collaboration were sent in two phases. A questionnaire was posted on the university intranet and could be accessed by clicking on a link in the e-mails.

Findings – Structural equation modeling results show that LPP is a significant positively associated antecedent of POC and FFP. Moreover, POC, in turn, decreases cyberloafing, while FFP increases it.

Research limitations/implications – The researched employees have job conditions inherent to the peculiarities of the public sector which may limit the ability to extrapolate the findings in the private sector. The fear construct was assessed by a self-supplied scale, and thus the presence of shades of other similar emotions could not be discounted. Findings provide a more understandable mechanism of the influence of supervisor proximity on cyberloafing.

Practical implications – These findings contribute to an understanding of the ways in which organizations can control cyberloafing and provide reservations about the intimidator strategy efficiency. Supervisor proximity through the employee's control senses appear as an effective strategy.

Originality/value – The study of the joint interaction of the cited coercive variables against cyberloafing is unprecedented.

Keywords Leadership, Punishment, Internet, Control theory, Workplace

Paper type Research paper



During the past decade, the Internet has transformed the workplace into a worldwide network strengthening and catalyzing the corporation production processes. However, it has also opened the door to a new category of deviant workplace behavior: employees surfing the Internet when they should be working. This particular new form of negative deviance in the workplace has been labeled “cyberloafing” (Kamins, 1995) and could be classified as organizational deviance since the cyberloafers act directly

against the company's Internet system (Bennett and Robinson, 2000; Lim, 2002; Robinson and Bennett, 1995). Lim (2002, p. 677) defines it as:

any voluntary act of employees' using their companies' Internet access during office hours to surf non-job related web sites for personal purposes and to check (including receiving and sending) personal e-mail as misuse of the Internet.

Cyberloafing has become a widespread and costly problem for organizations. A survey of 1,000 workers in the USA revealed that 64 percent of them surf the Internet for personal purposes during working time (*The Straits Times*, 2000). The cost of cyberloafing in terms of employee productivity is a fall of 30-40 percent (Verton, 2000). A representative from an Internet surveillance company recently estimated that "recreational web surfing" cost US businesses \$5.3 billion in 1999 (Bronikowski, 2000).

Faced with that situation, employers' reactions to cyberloafing are mixed (Mastrangelo *et al.*, 2003). Some companies are willing to "recognize and tolerate" a certain degree of personal use, while others have developed organizational policies with various degrees of disciplinary action (Wallace, 1999). For example, in an American Management Association (2001) survey, 47 percent of employers review e-mail and 63 percent monitor Internet use. With regard to coercive sanctions, over 50 percent of respondents had disciplined or dismissed at least one employee for e-mail or Internet misuse, and 38 percent use software that prevents employees from accessing inappropriate Internet sites. Thus, when faced with cyberloafing, employers seem to intensify coercive strategies that both educe higher perceptions of organizational control (POC) and, by means of disciplinary sanctions, elicit fear of formal punishment (FFP), which aims to lead employees to higher Internet use normative compliance.

Despite this current use of coercive strategy, research appears to be paying scant attention to it. In fact, after a considerable search through the important publications of the last 15 years, we found scarcely a dozen relevant studies related to coercive strategies, none of which address cyberloafing.

The contribution of perceptions of leader physical proximity (LPP) to workplace behavioral control seems to be widely accepted. Since, LPP increases the capacity of leaders to interact with their subordinates (Bass, 1990), perceptions of LPP may increase the cyberloafer's psychological sense of leadership presence and thus appear to be particularly influential against cyberloafing. In effect, cyberloafing is difficult to hide because computer use is a highly visible task and is easily observable by others. Consequently, perceived LPP could contribute to preventing cyberloafing since it reduces the cyberloafer's sense of impunity. However, in recent decades the study of LPP also seems to have been neglected. Therefore, our response to the question of whether current anti-cyberloafing disciplinary practices have a replica in research findings or not must be negative.

In our study, we predict that the joint interaction of the cited coercive variables will provide further synergic effects in discouraging cyberloafing. In that respect, we suggest (see our model in Figure 1) that both POC and FFP precede cyberloafing, and that POC also goes before FFP. Additionally, our model seeks to verify the antecedence of LPP over both POC and FFP.

Previous research supports that employee's misconduct is affected by his/her perceptions and attitudes (Vardi, 2001; Vardi and Weiner, 1996). In particular, the extent to which employees perceive justice in the organization is related to outcomes such as job

satisfaction (Dailey and Kirk, 1992; Tepper, 2000), organizational commitment (Folger and Konovsky, 1989; Konovsky and Cropanzano, 1991), citizenship behaviors (Masterson *et al.*, 2000; Moorman *et al.*, 1998), actual turnover (Tepper, 2000), and misconduct (Greenberg, 1990; Greenberg and Scott, 1996; Skarlicki and Folger, 1997). Moreover, studies of organizational justice show that not only judgments of perceived fairness of rewards and organizational procedures, but also judgments about more or less leader respect and honest interpersonal treatment are related to individual attitudes and behaviors (Aquino, *et al.*, 2004; Greenberg, 1990; Lind and Tyler, 1988; Tyler and Bies, 1990). We refer to interactional justice (Bies and Moag, 1986).

Thus, interactional justice is a distinct, intermediate step between the acting out of organizational procedures and the resulting outcome (Greenberg, 1990; Tyler and Bies, 1990; Bies and Moag, 1986). In such a context of perceptions of justice, the supervisor can play an important role as the “closer and more visible face” of the organization, depending on the style of leadership and control that he/she uses in transmitting the characteristics of the organizational procedures (Aquino *et al.*, 1999). In effect, prior research offers some preliminary evidence that the way in which subordinates interpret leadership behaviour affects the effectiveness of the interaction. Furthermore, previous interpretations of one’s leader may interact in determining the follower’s response (Bruins *et al.*, 1999; Ellemers *et al.*, 1998).

The dynamics of leader-follower have most often been explained as a social exchange (Blau, 1964). Effectively, the exchange is established and maintained if the benefits to both the leader and the subordinates outweigh the costs (Homans, 1958, 1961). When individuals are in a high-quality relationship, they will behave in ways that benefit their exchange partner. In addition, there is experimental evidence suggesting that the leader-follower exchange is related to positive cognitive and emotional reactions (Graen *et al.*, 1982, 1986; Korukonda, 1989), such as increased loyalty and lower stress (Graen *et al.*, 1982). Conversely, low-quality leader-follower exchanges may generate negative emotions in the employee, such as anger, resentment, moral outrage (Bies and Tripp, 1998; Bies *et al.*, 1997; Tyler and Blader, 2000; Robinson and Bennett, 1997; Skarlicki and Folger, 1997), and even stress and fear (Gray, 1988; Motowidlo *et al.*, 1986; Ward and Dugger, 2000). Using the above arguments as a guide, perceptions of LPP may be correlated with both POC and FFP.

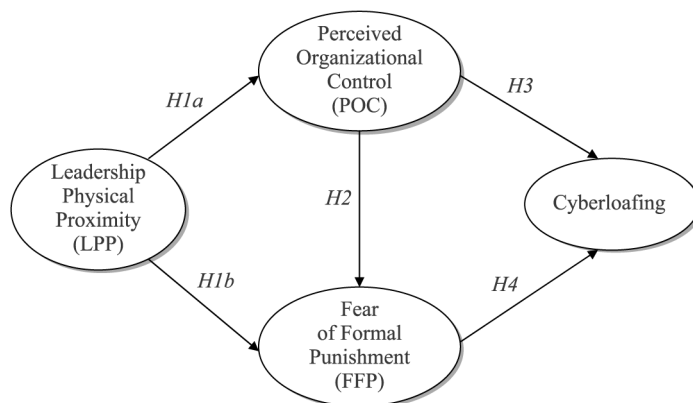


Figure 1.
Hypothesized model of
perceptions of leader
proximity, organizational
control, fear of formal
punishment and
cyberloafing

Since leadership is interaction and interaction depends on physical proximity, the emergence and success of leadership depends on such physical arrangement (Bass, 1960, 1990; Milgram, 1974; Schrag, 1954; Toki, 1935; White and Lippitt, 1960, 1968). In addition, perceptions of LPP may elicit a psychological sense of leadership presence in the cyberloafer and thus the association of his/her supervisor to an “observer” or a “sanction imposer” (Podsakoff, *et al.*, 1984, Podsakoff and Todor, 1985; Korukonda, 1989). In effect, previous studies suggest that the lack of task visibility is a determinant of social loafing since it is more difficult for the supervisor to determine whether the employee is slacking or how much effort he/she is exerting on the job (George, 1992; Jones, 1984). Thus, the employee’s sense of LPP may counteract that “task opacity” impunity and, in turn, increase the likelihood of the supervisor being identified as a real threatening enactor of the formal punishment procedure. Hence, our first hypothesis is:

H1b. Perceived leadership physical proximity is positively associated with the employees’ fear of punishment coming from their organization.

The same argument can also be used in the case of POC. As we see above, perceptions of LPP intensify the employee’s feeling of probability of interaction with his/her supervisor and, thus, LPP increases his/her perception of the organizational control procedure enacted by his/her supervisor. In light of the above, we predict that POC may be elicited by perceptions of LPP. Thus, our next hypothesis is:

H1a. Perceived leadership physical proximity is positively associated with the employees’ perceived organizational control.

Tompkins and Cheney (1985, p. 182) distinguish between power and control asserting that:

... the noun power [is] an ability or capacity to achieve a goal even against the resistance of others. The verb control [is] the exercise or act of achieving a goal.

Thus, the organization has power over its employees insofar as it can control the contributions of employees to meeting its goals. Flamholtz (1996) defines managerial control as mechanisms designed in organizations to increase the probability of people behaving in a manner congruent with the organization’s goals.

French and Raven (1959) define the coercive power base as being dependent on fear. In effect, coercion in organizations refers to the practice of compelling workers to act by employing the threat of various forms of harm (Bass, 1990). It is also argued that, in spite of organizations using approaches other than FFP in their mechanisms for social control (Simpson, 2002; Bardach and Kagan, 1982; Clinard and Yeager, 1980) they habitually seek punishment as a regulating strategy (Ayres and Braithwaite, 1992; Luckenbill, 1982; Hawkins, 1984; Reiss, 1984).

Our FFP construct aims to measure the employee’s sense that he/she is complying with organizational rules for fear of punishment by his/her organization. Hence, the eliciting of the employees’ FFP implies they will feel compelled to an a priori compliance with the (Internet use) rules. On that line, we expect that POC may raise FFP (compliance by fear) since the employees should know and sense that the organizational control processes aim to uncover their misconduct in the workplace. In effect, POC may reduce their perceived likelihood that those misconducts may go unpunished, thus fulfilling a perceived incriminatory function that increases the

feeling of vulnerability to punishment (Davis, 1968; Korukonda and Hunt, 1989; Luckenbill, 1982) and the fear of suffering it. Consequently, our next hypothesis is:

- H2.* Perceived organizational control is positively associated with employees' fear of punishment coming from their organization.

The wide development of literature about control *per se* is highlighting the consensus on its efficacy on employee behavior. Effectively, Gaines and Jermier (1983) emphasize the historically important role that control processes play in monitoring occasional workplace misconduct, and in the employees' integration in the organization.

Both the degree, or level, of control of an organization and the area, or aspects, of worker behavior are supervised and doctrinally shown to be effective in generating the desired behaviors (Hebert, 1994; Simons, 1995; Schaan, 1988). In that respect, since POC measures subjective degrees or levels of control, POC may consequently engage behavioral response. The expected efficacy is already shown in White and Lippitt's (1960, 1968) classic research. Liberal style leaderships (low control) lead members to a 33 percent job effort as compared to 50 percent in the "democratic style" (high control). Moreover, less controlled members showed "low spirit" and little will to achieve the leader's goals. They also showed aggressive attitudes and behaviors in both their own and others' tasks (Mills, 1983).

Organizational injustice is a frequently cited cause of misconduct (DiBattista, 1989, 1996; Lim, 2002; Neuman and Baron, 1998; Robinson and Bennett, 1997; Skarlicki and Folger, 1997; Sieh, 1987; Tucker, 1993). Furthermore, as we argue above, the employees' assessments of leader interactions mirror perceptions of organizational justice, and vice versa, namely, workplace interactions could affect the way formal procedures (such as control and disciplinary systems) are evaluated.

Perceived control has been doctrinally cited as a variable well-evaluated by workers. Smith and Tannenbaum (1963) study 200 units of large firms and find good employee evaluations of the amount of organizational control. It is positively and significantly related to the members' loyalty, morale, and judged effectiveness. Howell (1988) demonstrates that members tend to feel more satisfied in organizations when the top-level hierarchy exercises strong control over organizational activities. Also, a meta-analysis (Spector, 1986) of studies related to perceived control finds that high levels of perceived control are associated with high levels of job satisfaction, commitment, involvement, performance and motivation. More recently, Hemmingsson and Lundberg (1998) find that low control, in particular in combination with low work demands, triggers misconduct.

Therefore, the cited previous studies' positive judgments about organizational control seem to support that POC may be well-evaluated by employees, may generate satisfaction, and avoid deviance. Thus, our next hypothesis is:

- H3.* Perceived organizational control is negatively associated with employee cyberloafing.

Organizational punishment is widely argued as an important coercion tool for social control in organizations. Its proponents defend its potential efficacy in dissuading, and in behavioral learning, pointing out the widespread belief that the ultimate cause of misconduct is developed in the rationality of the workers' minds (Korukonda and Hunt, 1989). As a result, when punishment is inflicted contingently – that is, neither

arbitrarily nor inopportunistly (Cherrington *et al.*, 1971) – the workers should weigh the cost of it and, if it is high, they should be dissuaded from deviant behavior and learn “more adapted” ones (Ayres and Braithwaite, 1992; Arvey and Ivancevich, 1980; Braithwaite, 1985, 1989; Ball *et al.*, 1994; Hawkins, 1984; Molm, 1994; O'Reilly and Puffer, 1989; Reiss, 1984; Seligman, 1975; Schnake, 1986). However, when strong fear mediates, the literature highlights the dissuasive effects of punishment on employee's deviance as being questionable. Research finds that strong fear of punishment may produce undesired upsets, such as anxiety, depression and lower levels of effort (Atwater *et al.*, 1998; Deutsch, 1985; Morgan, 1977; Georgopoulos, 1965; DeCharms and Hamblin, 1960). Research on positive discipline (Bryant, 1984; Huberman, 1964, 1975; Klemm, 1995; Osgeweh and Hutchison, 1989; Preston and Topf, 1994; Regueira, 1994) in the literature on human resources management also shares that skepticism. In line with the last punishment view, our study focuses on punishment not as a “pedagogical tool” but as an intimidation construct that aims to measure the employees' level of fear in order to compel them to comply with the (Internet use) rules. We predict that the FFP intimidation construct engages cyberloafing.

Fear is an unpleasant feeling of perceived risk or danger, whether real or imagined, or a feeling of extreme dislike of some conditions/objects (Gray, 1988). Congruently, an intimidating disciplinary procedure may provoke fear in the employee. We expect cyberloafing may be one way in which employees respond to FFP, on the basis of the following arguments.

First, FFP should be strongly associated to distrust. Distrust is a mild stage of fear mixed with warning (Gray, 1988). On that line of argument, Konovsky and Pugh (1994) suggest that the link between organizational justice and employee behavior is the perception of trust elicited by the perception of justice. Parks and Hulbert (1995) affirm that distrust elicits employee behavior, and interacts in the response of cooperation vs non-cooperation targeting the organization (Settoon *et al.*, 1996). Ayree *et al.* (2002) find that trust mediates the relationship between organizational justice and work attitudes, job satisfaction, turnover intentions, organizational commitment, and citizenship behavior. Hence, FFP may create a context of distrust in which misconduct occurs.

Second, applying the social exchange theory (Blau, 1964), and as we see above, the leader-member exchange may echo FFP, and since FFP is an emotion of dislike, it may generate a low-quality leader-member exchange. In that context, individuals, at best, may not be motivated to care for their organization (Murphy *et al.*, 2003). Additionally, the social psychology literature predicts that favorable perceptions of the leadership can generate positive sentiments and emotions that encourage the appearance of citizenship behavior (Skarlicki and Latham, 1996, 1997). Furthermore, it is argued that undesired behavior may be triggered and/or extrinsically motivated by negative emotions, such as we study, the fear of being punished (Averill, 1980; Izard, 1977; Lazarus *et al.*, 1970; Leventhal, 1979; Plutchnik, 1980). Thus, a socio-emotional low-quality leader-employee exchange may trigger deviant behavior (Aquino *et al.*, 2004). Our final hypothesis is:

- H4.* Employees' fear of punishment coming from their organization is positively related to their cyberloafing.

Method

Procedure and sample characteristics

Data were collected from 147 of the 758 non-teaching staff at a Spanish public university. With that response rate of 19.4 percent, we achieved a sampling error of 7.4 percent. Accessibility to e-mail system was similar for all employees. Contextual conditions that lead us to presume varying willingness to respond were not found. E-mails asking for collaboration were sent in two phases: the first on October 5, 2004 and the second on November 11. The research project received prior official approval and IP addresses were unidentifiable and the surveyors were so informed so as to avoid their reticence and interference in responses. A questionnaire was posted on the university intranet and the staff could access it via a link in the previously sent e-mails. The responses were received over a period ending on December 2. Eventually, there were 147 valid responses after five were rejected due to incorrect completion and seven due to incoherent information.

The sample descriptive structures are quite similar to the mentioned population data. In effect, 46.7 percent of the sample, are civil servants and the remainder are not permanent staff, while 50.7 percent are men and 49.3 percent women, and 47.4 percent are 40 years old or younger and 6.6 percent are 60 or older. In the universe, 344 members (45.5 percent) are career civil servants while the remaining 414 (54.5 percent) have other types of contracts. With regard to age and gender, 358 (47.2 percent) are 40 years old or younger, and only 23 (3 percent) are older than 60, while 47.3 percent are men, and 52.7 percent women.

Measures

All the items – in the Appendix – were scored on a seven-point scale ranging from 1 – strongly disagree to 7 – strongly agree (in cyberloafing, 1 – never, to 7 – constantly). Reliability was established by means of Cronbach’s α , the values of which are shown on the main diagonal of the correlations Table (Table I).

Leadership physical proximity. We used a three-item scale designed after a review of the literature related to the study of physical proximity in organizations (Kleck *et al.*, 1966; Monge and Kirste, 1980; Monge *et al.*, 1980), leadership proximity and task visibility (George, 1992; Ronan *et al.*, 1973). Two reversed item were recodified.

Fear of punishment. The four-item scale used to measure this variable was constructed on the basis of stated levels of severity of disciplinary action established in a study by Trahan and Steiner (1994). We opted for four of the levels studied by those authors, namely, those that we considered to provoke a real fear, not of the severity of punishment, but of the real possibility of being punished in the case of theoretical

Variables	N	Mean	SD	1	2	3	4
1. Leadership physical proximity	147	2.78	1.29	(0.656)			
2. Perceived organizational control	147	3.64	1.32	0.227**	(0.734)		
3. Fear of formal punishment	147	2.46	1.66	0.298***	0.401***	(0.902)	
4. Cyberloafing	147	3.16	1.53	−0.024	−0.086	0.216**	(0.847)

Notes: The numbers in parentheses on the diagonal are coefficient α , levels of significance: * $p < 0.05$; ** $p < 0.01$; *** $p < 0.001$

Table I.
Means, standard
deviations, correlations
and reliabilities

deviant behavior in the workplace. We took into account the specific disciplinary procedure's characteristics of the public organization researched and its Internet usage policy. The items were worded in such a way that the perceived fear of punishment of each respondent was assessed in line with the four chosen levels of disciplinary severity.

Perception of organizational control. The four-item scale used to measure this variable was constructed on the basis of the review of the literature on leadership as an instrument of goal achievement (Tucker, 1981), and organizational control (Smith and Tannenbaum, 1963; Friedman, 1977; Howell, 1988). The items were worded in such a way that the figure of the controller agent appeared impersonally.

Cyberloafing. We used a five-item scale adapted from that proposed by Lim (2002), which included eight items referring to browsing activities and three to e-mailing activities. We selected four of the former, and one of the latter which combined "send" and "read" with Lim's third item "check", which we believe overlaps with "read" e-mail. We sought one-dimensionality, which is confirmed later in the paper. All the chosen items refer to a presumed surfing misuse according to the university's Internet usage policy.

Results

Table I shows the scale means, standard deviations, reliabilities and correlations (r) between all the research variables. The results of the correlation analyses suggest that, except for POC with cyberloafing, the variables in our study were significantly correlated in the expected directions.

To test the relationships among variables in our study we used structural equation modeling (Arbuckle, 2003; Jöreskog and Sörbom, 1979). Figure 2 is a path diagram that shows the stated relationships among the observed variables (survey answers, in rectangles) and the unobserved latent variables (circles). Items provided in the Appendix define the observed variables of the model.

The various indexes used show a good fit of the model ($\chi^2[99, 147] = 120.68$) and that it is robust. Effectively, a non-significant ($p = 0.068$) χ^2 value was obtained. Additionally, the comparative-fit-index (CFI) is 0.98; the goodness-of-fit (GFI) is 0.90; the root-mean-square error of approximation (RMSEA) is 0.04; the parsimony GFI (PGFI) is 0.658; and the parsimony normed fit index (PNFI) is 0.73. Support for $H1a$ and $H1b$ is shown (Figure 2) by the significant path between LPP and POC ($B = 0.27$; $p < 0.05$), and FFP ($B = 0.28$; $p < 0.01$). Next, $H2$ receives empirical support ($B = 0.37$; $p < 0.01$) since POC is positively and significantly related with FFP. Additionally, the results in Figure 2 shows that $H3$ is also supported in view of the significant relationship between POC and cyberloafing ($B = -0.28$; $p < 0.05$). Finally, $H4$ is accepted since fear of punishment seems be positively and significantly linked to cyberloafing ($B = 0.37$; $p < 0.001$).

Next, we conducted a nested models comparison using the sequential χ^2 difference test (Anderson and Gerbing, 1988). In that line, our hypothesized model was compared with a less constrained alternative model that contains a direct path added from LPP to cyberloafing. Thus, that less constrained model represents a partially mediated model of the effects of LPP on cyberloafing. According to the parsimonious fit criteria, the hypothesized model ($\chi^2[99, 147] = 120.68$; $p = 0.068$) as compared with the less constrained model ($\chi^2[98, 147] = 119.33$, n.s., $\chi^2_d = 1.38$, $df = 1$, $p = 0.070$) shows

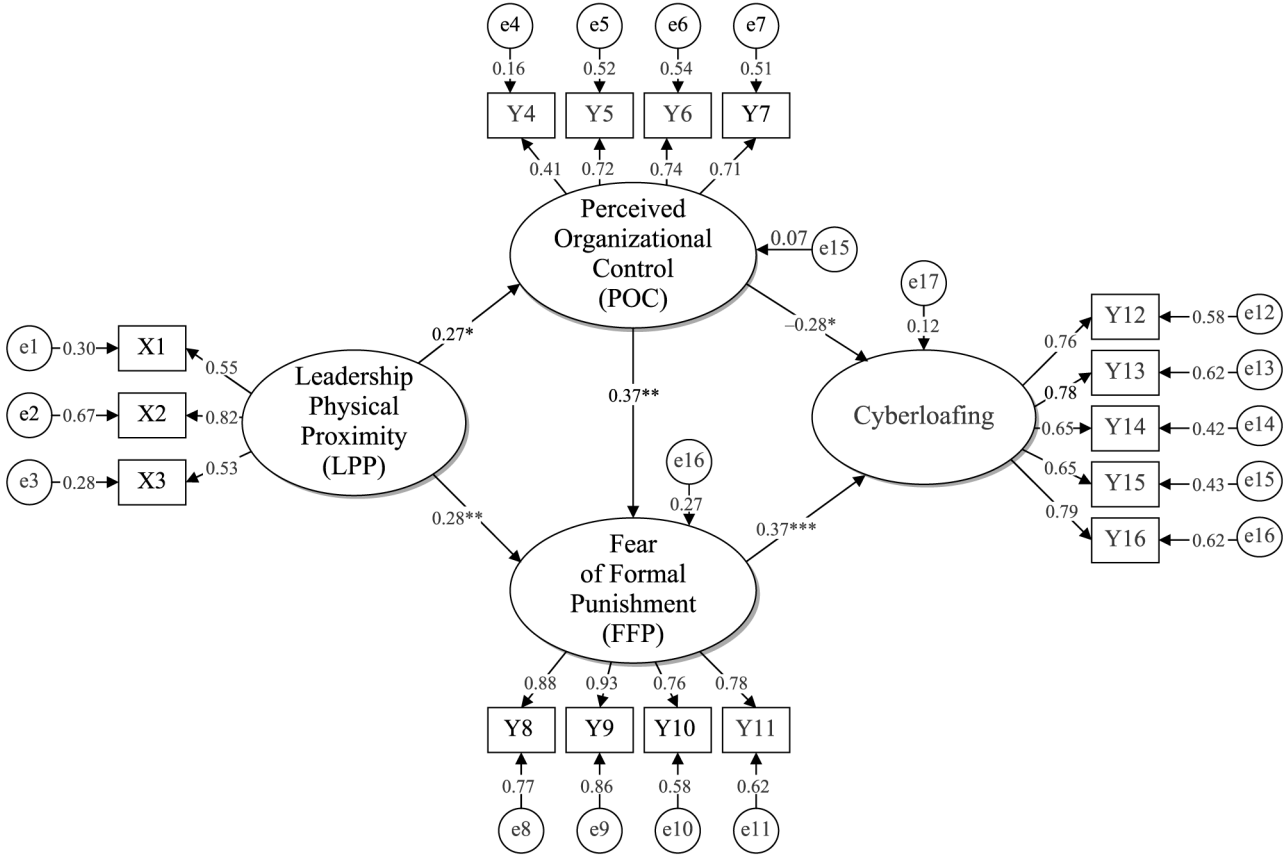


Figure 2. Accepted model of leader proximity, control, fear of punishment and cyberloafing

a better fit than the latter by PGFI and PNFI indexes ($CFI = 0.98$; $GFI = 0.90$; $RMSEA = 0.04$; $PGFI = 0.65$; and $PNFI = 0.72$). Consistent with that, the path added from LPP to cyberloafing was non-significant ($B = -0.13$; p n.s.). Thus, the results suggest that our proposed model (fully mediated by POC and FFP) was superior to the less constrained (partially mediated by POC and FFP) alternative.

Finally, the non-significant indirect effects of LPP on cyberloafing ($B = 0.068$) and the positive effect of POC on cyberloafing ($B = 0.14$) through FFP, are consistent with the above thesis; namely, POC and FFP mediate the link of LPP on cyberloafing, and when POC affects cyberloafing through FFP, POC increases it.

Discussion

The aim of this research was to demonstrate the usefulness of coercive control strategies as tools of interest to human resources managers in discouraging cyberloafing. We analyzed whether LPP affects POC and FFP, and POC/FFP interaction between them and to cyberloafing. The results offer support for an association between LPP and POC ($B = 0.27$; $p < 0.05$) and FFP ($B = 0.28$; $p < 0.01$), and between POC and FFP ($B = 0.37$; $p < 0.01$). Likewise, POC decreases cyberloafing ($B = -0.28$; $p < 0.05$) but FFP increases it ($B = 0.37$; $p < 0.001$). Finally, although it was not specifically hypothesized, when POC and FFP mediates, the results show stronger support for a fully mediated model of the effects of LPP on cyberloafing. In effect, the fit of the accepted model is better than the less constrained model, in which the direct path from LPP to cyberloafing ($B = -0.13$; p n.s.) did not show significance.

In light of above, the sensitivity of cyberloafing to the proposed trinomial of LPP, POC and FFP seems beyond doubt. All the relationships proposed in the model are shown to be highly significant. However, LPP does not exert direct effects on cyberloafing. Although LPP, as we used it, does not measure the effects of a real presence of the supervisor in the workplace, in our opinion, that real presence should constitute one of its primary causes. Therefore, we can state that the mere deployment of a strategy of supervisor placement physically closer to the employees' workplaces may not be enough to dissuade cyberloafers: it is important that the employees interpret that physical proximity of supervisors as a control mechanism forming part of a much broader coercive strategy. It is probable that closer physical proximity of their bosses, real or sensed, would be seen by employees as no more than a neutral circumstance that would not lead to a feeling of greater organizational control over their potential cyberloafing.

Moreover, it appears that punishment should not be applied since it contributes no further synergic efficacy than that already obtained from POC over cyberloafing ($B = -0.28$; $p < 0.05$). In effect, FFP is strongly and positively associated to cyberloafing ($B = 0.37$; $p < 0.001$). This issue jointly with the positive indirect effects of POC, through FFP, on cyberloafing ($B = 0.14$) seem confirm our pessimistic expectations over FFP usefulness to control workplace Internet deviance. Effectively, a climate of FFP among cyberloafers causes them to intensify their cyberloafing. This seems to indicate that there may be attitudes of resistance or rebellion against an organization that is seen as threatening. Moreover, the punishment measured by our scale may be perceived as unfair and generate an attitude, perhaps hostility, toward the organization – the source of the coercion. This could consequently lead to an increase in misbehavior directed at the organization (DWBO) and possibly more specific action

taken against the organization's IT service – cyberloafing – so that it becomes a scapegoat and is the target of part of the undesirable hostile reaction.

A greater POC, however, has the opposite effect and, consequently, is highly effective in combating cyberloafing. Nevertheless, FFP appearance is related to LPP ($B = 0.28$; $p < 0.01$) and to a greater POC ($B = 0.37$; $p < 0.01$). Thus, we can say that not all POC is beneficial to the employer's control of cyberloafing. Only its direct effect, and not an effect via FFP, may be advisable in a cyberloafing control strategy. Similarly, only the LPP that contributes to the generation of a greater sense of control in the organization may be useful to combat cyberloafing.

In short, this research appears to support the partial usefulness of the coercive strategy on cyberloafing proposed in our model, with the trinomial LPP, POC and FFP being useful in the case of those first two variables but, as expected, not in the case of FFP.

Theoretical and practical implications and future research

One practical implication stems from the support shown in the fruitless use of the variable FFP. Although it seems currently necessary to have a sanction mechanism as a backdrop to any system to control the human resources of any public or private organization, we believe that organizations will increasingly tend to relegate the opportunity for punitive action down the line of positive discipline. Therefore, it seems necessary to develop intermediate tools, such as those that promote sense of control, normative harmony, commitment and sources of organizational culture. It will mean that punishment will be perceived not as a last resort, but as a symptom of failure to control an organization's human management.

In fact, in order for the organization to apply punishment, perceptions of POC alone are not sufficient. Effectively, without a “physical” complete control over employee behavior there is no evidence of cyberloafing, and without that evidence, punishment cannot be applied. And, without a true punitive threat, why should the cyberloafer weigh the cost of it? As a point of interest – we must not forget the possible childish behaviors – cyberloafers may play the game of avoiding punishment while the employer tries hard to prevent cyberloafing. It may be that the employers' attitude too often stems not from the idea of “don't do it again” but from the idea of “don't let them catch me out again”.

We believe that the extreme clarity with which this research distinguishes the constructs of POC/FFP and their effects (in combating cyberloafing) contributes significant practical benefits when designing a strategy to control cyberloafing. POC and FFP are two constructs that may, “a priori”, seem more similar than they are finally shown to be. In fact, they are associated ($B = 0.37$; $p < 0.01$) but distinct. However, as we have seen, they display intense but opposite relationships with cyberloafing. Such differences may shed light on employers who, faced with mass cyberloafing, actually intensify their organizational coercive strategies.

As we can see, POC is shown to be related to LPP. This would imply that the LPP of supervisors makes a real contribution to the control of cyberloafing, but through perceived control, and not directly. We believe that the practical implications entail the need to consider different existing employee perceptions of LPP. In our opinion, the vision of LPP as an antecedent of POC requires it to enjoy maximum formal legitimacy. In effect, only if LPP enjoy the maximum support of the employer's legitimate

authority can it contribute to a healthy perception of POC rather than to an indiscriminate personal initiative of supervisor proximity that would not produce any greater effects.

Finally, we should highlight the doctrinal implication represented by the specific inclusion of workplace Internet deviance, as well as the classic DWB-O and DWB-I, in the study. This may constitute support for this current, albeit incipient, methodological line that could serve as a guide in future research. Additionally, cyberloafing research still leaves many questions unanswered. For example, an exhaustive study about what counterproductive cyberloafing is or is not could permit employers to deploy better targeted coercive strategies. It is also possible that future research has to address the employer's necessary tolerance of "personal Internet use" through the firm's Internet access, in order to avoid perhaps greater harm from really counterproductive cyberloafing.

Limitations of the study

We should also mention that our research has certain limitations. Firstly, the university institution researched is a recently created university, with a younger workforce, and fewer career civil servants than other, more consolidated, universities in Spain and abroad. That circumstance may limit the ability to extrapolate the conclusions of this research. Secondly, the employees researched have certain job conditions that are often inherent to the peculiarities of workers in the public sector. For example, it might be debatable whether the FFP in our public university context would also be the same among private sector employees. Thirdly, our construct was clearly designed to ask about "fear", however, since is it a mainly self-supplied scale, the presence of shades of other similar emotional constructs, e.g. exogenous anxiety, or stress, cannot be discounted. Finally, we measured deviance by means of self-reporting, but future studies should collect reports from multiple sources although we are aware that, in practice, such attempts would meet field work obstacles.

References

- American Management Association (2001), "Workplace testing: monitoring & surveillance", available at: www.amanet.Org/research/summ.htm
- Anderson, J.C. and Gerbing, D.W. (1988), "Structural equation modelling in practice: a review and recommended two-step-approach", *Psychological Bulletin*, Vol. 103, pp. 411-23.
- Aquino, K., Galperin, B.L. and Bennett, R. (2004), "Social status and aggressiveness as moderators of the relationship between interactional justice and workplace deviance", *Journal of Applied Psychology*, Vol. 34 No. 5, pp. 1001-29.
- Aquino, K., Lewis, M.U. and Bradfield, M. (1999), "Justice constructs, negative affectivity, and employee deviance: a proposed model and empirical test", *Journal of Organization Behavior*, Vol. 20, pp. 1073-91.
- Arbuckle, J.L. (2003), *Amos 5.0 Update to the Amos User's Guide*, Smallwaters Corporation, Chicago, IL.
- Arvey, R. and Ivancevich, J. (1980), "Punishment in organizations: a review, propositions and research suggestions", *Academy of Management Review*, Vol. 5, pp. 123-32.
- Atwater, L.E., Dionne, S.D., Camobreco, J.F., Avolio, B.J. and Lau, A. (1998), "Individual attributes and leadership style: predicting the use of punishment and its effects", *Journal of Organizational Behavior*, p. 19.

- Averill, J.R. (1980), "A constructivist view of emotion", in Plutchnik, R. and Kellerman, H. (Eds), *Emotion. Theory, Research, and Experience*, Vol. 1, Academic Press, San Diego, CA, pp. 305-40.
- Aryee, S., Budhwar, P.S. and Chen, Z.X. (2002), "Trust as a mediator of the relationship between organizational justice and work outcomes: test of a social exchange model", *Journal of Organizational Behavior*, Vol. 23, pp. 267-85.
- Ayres, I. and Braithwaite, J. (1992), *Responsive Regulation: Transcending the Deregulation Debate*, Oxford University Press, New York, NY.
- Ball, G.A., Trevino, L.K. and Sims, H.P. (1994), "Just and unjust punishment: influences on subordinate performance and citizenship", *Academy of Management Journal*.
- Bardach, E. and Kagan, R.A. (1982), *Going by the Book, the Problem of Regulatory Unreasonableness*, Temple University Press, Philadelphia, PA.
- Bass, B. (1960), *Leadership, Psychology, and Organizational Behavior*, Harper, New York, NY.
- Bass, B. (1990), *Bass & Stogdill's Handbook of Leadership: Theory, Research, and Managerial Applications*, Free Press, New York, NY.
- Bennett, R.J. and Robinson, S.L. (2000), "The development of a measure of workplace deviance", *Journal of Applied Psychology*, Vol. 85, pp. 349-60.
- Bies, R.J., Tripp, T.M. and Kramer, R.M. (1997), "At the breaking point: cognitive and social dynamics of revenge in organizations", in Giacalone, R.A. and Greenberg, J. (Eds), *Antisocial Behavior in Organizations*, Sage, Thousand Oaks, CA, pp. 18-36.
- Bies, R.J. and Tripp, T.M. (1998), "Revenge in organizations: the good, the bad, and the ugly", in Griffin, R.W., O'Leary-Kelly, A. and Collins, J.M. (Eds), *Dysfunctional Behavior in Organizations: Non-Violent Dysfunctional Behavior*, Jai Press Inc., Stamford, CN, pp. 49-67.
- Bies, R.J. and Moag, J.S. (1986), "Interactional justice: communication criteria of fairness", *Research on Negotiation in Organizations*, Vol. 1, pp. 43-55.
- Blau, P.M. (1964), *Exchange and Power in Social Life*, Wiley, New York, NY.
- Braithwaite, J. (1985), *To Punish or Persuade: Enforcement of Coal Mine Safety*, State University of New York Press, Albany, NY.
- Braithwaite, J. (1989), *Crime, Shame and Reintegration*, Cambridge University Press, Cambridge.
- Bronikowski, L. (2000), "Esniiff.com sniffs out cyberslacking", *ColoradoBiz*, Vol. 27 No. 11, p. 46.
- Bruins, J., Ellemers, N. and DeGilder, D. (1999), "Power use and differential competence as determinants of subordinates' evaluative and behavioural responses in simulated organizations", *European Journal of Social Psychology*, Vol. 29, pp. 843-70.
- Bryant, A. (1984), "Replacing punitive discipline with a positive approach", *Personnel Administrator*, p. 29.
- Cherrington, D., Reitz, H. and Scott, W. (1971), "Effects of contingent and noncontingent reward on the relationship between satisfaction and task performance", *Journal of Applied Psychology*, Vol. 55, pp. 531-6.
- Clinard, M.B. and Yeager, P.C. (1980), *Corporate Crime*, The Free Press, New York, NY.
- Davis, K. (1968), "Success of chain of command oral communications in a manufacturing management group", *Academy of Management Journal*, Vol. 11, pp. 379-87.
- Dailey, R.C. and Kirk, D.J. (1992), "Distributive and procedural justice as antecedents of job dissatisfaction and intent to turnover", *Human Relations*, Vol. 45 No. 3, pp. 305-13.
- DeCharms, R. and Hamblin, R.L. (1960), *Structural Factors and Individual Needs in Group Behavior*, Washington University, St Louis, MO.

- Deutsch, M. (1985), *Distributive Justice*, Yale University Press, New Haven, CT.
- DiBattista, R.A. (1989), "Designing a program to manage the risk of sabotage", *Supervision*, October, pp. 6-8.
- DiBattista, R.A. (1996), "Forecasting sabotage events in the workplace", *Public Personnel Management*, Vol. 25 No. 1, pp. 41-52.
- Ellemers, N., Van Rijswijk, W., Bruins, J. and Gilder, D. (1998), "Group commitment as a moderator of attributional and behavioural responses to power use", *European Journal of Social Psychology*, Vol. 28, pp. 555-73.
- Flamholtz, E.G. (1996), *Effective Management Control: Theory and Practice*, Kluwer Academic Publishers, Boston, MA.
- Friedman, A. (1977), "Responsible autonomy versus direct control over the labour process", *Capital & Class*, No. 1, pp. 43-57.
- French, J.R.P. Jr and Raven, B.H. (1959), "The bases of social power", in Cartwright, D. and Zander, A.F. (Eds), *Studies in Social Power*, Institute for Social Research, Ann Arbor, MI.
- Folger, R. and Konovsky, M.A. (1989), "Effects of procedural and distributive justice on reactions to pay decisions", *Academy of Management Journal*, Vol. 32, pp. 115-30.
- Gaines, J. and Jermier, J.M. (1983), "Emotional exhaustion in a high stress organization", *Academy of Management Journal*, Vol. 26, pp. 567-86.
- George, J.M. (1992), "Extrinsic and intrinsic origins of perceived social loafing in organizations", *Academy of Management Journal*, Vol. 35, pp. 191-202.
- Georgopoulos, B.S. (1965), "Normative structure variables and organizational behavior", *Human Relations*, Vol. 18, pp. 155-69.
- Graen, G.B., Scandura, T.A. and Graen, M.R. (1982), "A field experimental test of the moderating effects of growth need strength on productivity", *Journal of Applied Psychology*, Vol. 71, pp. 484-91.
- Graen, G., Novak, M. and Sommerkamp, P. (1986), "The effects of leader-member exchange and job design on productivity and satisfaction: testing a dual attachment model", *Organizational Behavior and Human Performance*, Vol. 30, pp. 109-31.
- Gray, J. (1988), *The Psychology of Fear and Stress*, 2nd ed., Cambridge University Press, Cambridge.
- Greenberg, J. and Scott, K.S. (1996), "Why do employees bite the hands that feed them?, Employee theft as a social exchange process", in Staw, B.M. and Cummings, L.L. (Eds), *Research in Organizational Behavior*, Vol. 18, JAI Press, Greenwich, CT, pp. 111-66.
- Greenberg, J. (1990), "Employee theft as a reaction to underpayment inequity: the hidden cost of pay cuts", *Journal of Applied Psychology*, Vol. 75, pp. 561-8.
- Hawkins, K. (1984), *Environment and Enforcement: Regulation and the Social Definition of Pollution*, *Oxford Socio-Legal Studies*, University Press, Oxford.
- Hebert, L. (1994), "Division of control: relationship dynamics and joint venture performance", Unpublished PhD dissertation, The University of Western.
- Hemmingsson, T. and Lundberg, I. (1998), "Work control, work demands, and work social support in relation to alcoholism among young men", *Alcoholism: Clinical and Experimental Research*, Vol. 22, pp. 921-7.
- Homas, G.C. (1958), "Social behavior as exchange", *American Journal of Sociology*, Vol. 63, pp. 597-606.
- Homans, G.C. (1961), *Social Behavior: Its Elementary Forms*, Harcourt Brace, New York, NY.

- Howell, J.M. (1988), "Two faces of charisma: socialized and personalized leadership in organizations", in Conger, J. and Kanungo, R. (Eds), *Charismatic Leadership: The Illusive Factor in Organizational Effectiveness*, Jossey-Bass, San Francisco, CA.
- Huberman, J. (1964), "Discipline without punishment", *Harvard Business Review*, Vol. 42, pp. 62-8.
- Huberman, J. (1975), "'Discipline without punishment' live", *Harvard Business Review*, July/August, pp. 6-8.
- Izard, C.E. (1977), *Human Emotions*, Plenum, New York, NY.
- Jones, G.R. (1984), "Task visibility, free riding, and shirking: explaining the effect of structure and technology on employee behavior", *Academy of Management Review*, Vol. 9, pp. 684-95.
- Jöreskog, K.G. and Sörbom, D. (1979) in Magidson, J. (Ed.), *In Advances in Factor Analysis and Structural Equation Models*, Abt Books, Cambridge, MA.
- Kamins, A. (1995), "Cyber-loafing: does employee time online add up to net losses?", *New York Daily News*, July.
- Konovsky, M.A. and Pugh, S.D. (1994), "Citizenship behavior and social exchange", *Academy of Management Journal*, Vol. 37, pp. 656-69.
- Kleck, B., Ono, H. and Hastorf, A.H. (1966), "The effects of physical space upon face-to-face interaction", *Human Relations*, Vol. 19, pp. 425-36.
- Klemm, L.J. (1995), "Using progressive discipline", *Journal of Credit Union Executive*, Vol. 35, pp. 26-8.
- Konovsky, M.A. and Cropanzano, R. (1991), "Perceived fairness of employee drug testing as a predictor of employee attitudes and job performance", *Journal of Applied Psychology*, Vol. 76, pp. 698-707.
- Korukonda, A. and Hunt, J.G. (1989), "Pat on the back versus kick in the pants: an application of cognitive inference to the study of leader reward and punishment behaviors", *Group & Organization Studies*, Vol. 14, pp. 299-324.
- Lazarus, R.S., Averill, J.R. and Opton, E.M. (1970), "Towards a cognitive theory of emotion", in Arnold, M.B. (Ed.), *Feelings and Emotions*, Academic Press, New York, NY.
- Leventhal, H. (1979), "Advances in the Study of Communication and Affect: Perception and Emotion in Self and Others", in Pliner, P., Blainstein, K. and Spigel, I.M. (Eds), Plenum Press, New York, NY, A perceptual-motor processing model of emotion.
- Lim, V.K.G. (2002), "The IT way of loafing on the job: cyberloafing, neutralizing and organizational justice", *Journal of Organizational Behavior*, Vol. 23, pp. 675-94.
- Lind, E.A. and Tyler, T.R. (1988), *The Social Psychology of Procedural Justice*, Plenum, New York, NY.
- Luckenbill, D.F. (1982), "Compliance under threat of severe punishment", *Social Forces*, Vol. 60 No. 3, pp. 811-25.
- Masterson, S.S., Lewis-McClear, K., Goldman, B.M. and Taylor, M.S. (2000), "Integrating justice and social exchange: the differing effects of fair procedures and treatment on work relationships", *Academy of Management Journal*, Vol. 67, pp. 738-49.
- Mastrangelo, P.M., Everton, W.J. and Jolton, J.A. (2003), "Deviant computer use: distinguishing nonproductivity from counterproductivity", paper presented at the 18th Annual Conference of the Society for Industrial and Organizational Psychology, Orlando, FL, April.
- Milgram, S. (1974), *Obedience to Authority: An Experimental View*, Harper & Row, New York, NY.
- Mills, P.K. (1983), "Self-management: its control and relationship to other organizational properties", *Academy of Management Review*, Vol. 8, pp. 445-53.

- Molm, L.D. (1994), "Is punishment effective? Coercive strategies in social exchange", *Social Psychology Quarterly*, Vol. 57, pp. 75-94.
- Monge, P.R. and Kirste, K.K. (1980), "Measuring proximity in human organization", *Social Psychology Quarterly*, Vol. 43 No. 1, pp. 110-5.
- Monge, P.R., Rothman, L.W., Eisenberg, E.M., Miller, K.I. and Kirste, K.K. (1980), "The dynamics of organizational proximity", *Management Science*, Vol. 31 No. 9, pp. 1129-41.
- Moorman, R.H., Blakely, G.L. and Niehoff, B.P. (1998), "Does organizational support mediate the relationship between procedural justice and organizational citizenship behavior?", *Academy of Management Journal*, Vol. 41, pp. 351-7.
- Morgan, P.M. (1977), *Deterrence: A Conceptual Analysis*, Sage, Beverly Hills, CA.
- Motowidlo, S.J., Packard, J.S. and Manning, M.R. (1986), "Occupational stress: its causes and consequences for job performance", *Journal of Applied Psychology*, Vol. 71 No. 4, pp. 618-29.
- Murphy, S.M., Wayne, S.J., Liden, R.C. and Erdogan, B. (2003), "Understanding social loafing: the role of justice perceptions and exchange relationships", *Human Relations*, Vol. 56 No. 1, pp. 61-84.
- Neuman, J.H. and Baron, R.A. (1998), "Workplace violence and workplace aggression: evidence concerning specific forms, potential causes, and preferred targets", *Journal of Management*, Vol. 24, pp. 391-419.
- Osigweh, C. and Hutchison, W.R. (1989), "Positive discipline", *Human Resource Management*, Vol. 28, pp. 367-83.
- O'Reilly, C.O. III and Puffer, S. (1989), "The impact of rewards and punishments in a social context: a laboratory and field experiment", *Journal of Occupational Psychology*, Vol. 62, pp. 41-53.
- Parks, C.D. and Hulbert, L.G. (1995), "High and low trusters' responses to fear in a payoff matrix", *Journal of Conflict Resolution*, Vol. 39, pp. 718-30.
- Plutchik, R. (1980), *Emotion: A Psychoevolutionary Synthesis*, Harper & Row, New York, NY.
- Podsakoff, P., Todor, W., Grover, R.A. and Huber, V.L. (1984), "Situational moderators of leader reward and punishment behaviors: fact or fiction?", *Organizational Behavior and Human Performance*, Vol. 34, pp. 21-63.
- Podsakoff, P. and Todor, W. (1985), "Relationships between leader reward and punishment behavior and group processes and productivity", *Journal of Management*, 1, pp. 55-73.
- Preston, R. and Topf, M. (1994), "Safety discipline: a constructive approach", *Journal of Occupational Hazards*, Vol. 54, pp. 51-4.
- Regueira, G.C.D. (1994), *Disciplina positiva en las organizaciones (Positive Discipline in Organizations)*, CDR Ediciones, Madrid.
- Reiss, A.J. (1984), "Selecting strategies for social control over organizational life", in Hawkins, K. and Thomas, J.M. (Eds), *Enforcing Regulation*, Kluwer-Nijhoff, Boston, MA, pp. 23-35.
- Robinson, S.L. and Bennett, R.J. (1997), "Workplace deviance: its definition, its manifestations, and its causes", in Lewicki, R.J., Bies, R.J. and Sheppard, B.H. (Eds), *Research on Negotiation in Organizations*, Jai Press Inc., Greenwich, CT, pp. 3-27.
- Robinson, S.L. and Bennett, R.J. (1995), "A typology of deviant workplace behaviors: a multidimensional scaling study", *Academy of Management Journal*, Vol. 38, pp. 555-72.
- Ronan, W.W., Latham, G.P. and Kinne, S.B. (1973), "Effects of goal setting and supervision of worker behavior in an industrial situation", *Journal of Applied Psychology*, Vol. 58, pp. 302-7.
- Schaan, J.L. (1988), "How to control a joint venture even as a minority partner", *Journal of General Management*, Vol. 14 No. 1, pp. 4-16.

- Schnake, M.E. (1986), "Vicarious punishment in a work setting", *Journal of Applied Psychology*, Vol. 71, pp. 343-5.
- Schrag, C. (1954), "Leadership among prison inmates", *American Sociological Review*, Vol. 19, pp. 37-42.
- Seligman, M. (1975), *Helplessness*, Freeman, San Francisco, CA.
- Settoon, R.P., Bennett, N. and Liden, R.C. (1996), "Social exchange in organizations: perceived organizational support, leader-member exchange, and employee reciprocity", *Journal of Applied Psychology*, Vol. 81, pp. 219-27.
- Simons, R. (1995), *Levels of Control*, Harvard Business School Press, Boston, MA.
- Sieh, E.W. (1987), "Garment workers: perceptions of inequity and employee theft", *British Journal of Criminology*, Vol. 27, pp. 174-91.
- Simpson, S.S. (2002), *Corporate Crime, Law, and Social Control*, Cambridge University Press, New York, NY.
- Skarlicki, D.P. and Latham, G.P. (1996), "Increasing citizenship behavior within a labor union: a test of organizational justice theory", *Journal of Applied Psychology*, Vol. 81, pp. 161-9.
- Skarlicki, D.P. and Folger, R. (1997), "Retaliation in the workplace: the roles of distributive, procedural, and interactional justice", *Journal of Applied Psychology*, Vol. 82, pp. 434-43.
- Smith, C.G. and Tannenbaum, A.S. (1963), "Organizational control structure: a comparative analysis", *Human Relations*, Vol. 16, pp. 299-316.
- Spector, P. (1986), "Perceived control by employees: a meta-analysis of studies concerning autonomy and participation at work", *Human Relations*, Vol. 39, pp. 1005-16.
- Tepper, B.J. (2000), "Consequences of abusive supervision", *Academy of Management Journal*, Vol. 43, pp. 178-90.
- The Straits Times* (2000), "Cyberslackers at work", *The Straits Times*, Vol. 4.
- Toki, K. (1935), "Führer-Gefolgschaftsstruktur in der Schulklasse", ("Leader-follower structure in school classes"), *Japanese Journal of Psychology*, Vol. 10, pp. 27-56.
- Tompkins, P.K. and Cheney, G. (1985), "Communication and unobtrusive control in contemporary organizations", in McPhee, R.D. and Tompkins, P.K. (Eds), *Organizational Communication: Traditional Themes and New Directions*, Sage, Beverly Hills, CA, pp. 179-210.
- Trahan, W.A. and Steiner, D.D. (1994), "Factors affecting supervisors' use of disciplinary actions following poor performance", *Journal of Organizational Behavior*, Vol. 15, pp. 129-39.
- Tucker, J. (1993), "Everyday forms of employee resistance", *Sociological Forum*, Vol. 8, pp. 25-45.
- Tucker, R.C. (1981), *Politics as Leadership*, University of Missouri Press, Columbia, MO.
- Tyler, T.R. and Bies, R.J. (1990), "Beyond formal procedures: the interpersonal context of procedural justice", in Carroll, J.S. (Ed.), *Applied Social Psychology in Business Settings*, Erlbaum, Hillsdale, NJ.
- Tyler, T.R. and Blader, S.L. (2000), *Cooperation in Groups: Procedural Justice, Social Identity, and Behavioral Engagement*, Psychology Press, Philadelphia, PA.
- Vardi, Y. and Weiner, Y. (1996), "Misbehavior in organizations: a motivational framework", *Organizational Science*, Vol. 7 No. 2, pp. 151-65.
- Vardi, Y. (2001), "The effects of organizational and ethical climates on misconduct at work", *Journal of Business Ethics*, Vol. 29, pp. 325-37.
- Verton, D. (2000), "Employers ok with e-surfing", *Computerworld*, Vol. 34 No. 1, p. 16.
- Wallace, P. (1999), *The Psychology of the Internet*, Cambridge University Press, Cambridge.

- Ward, C. and Dugger, J.C. (2000), "The impact of quality training on stress, anxiety and fear in the workplace", *Journal of School of Engineering Technology*, Vol. 16 No. 4, pp. 2-6.
- White, R. and Lippitt, R. (1960), "Autocracy and Democracy", *Dynamics: Research and Theory*, Harper & Row, New York, NY.
- White, R. and Lippitt, R. (1968), "Leader behavior and member reaction in three social climates", *Group Dynamics: Research and Theory*, Harper & Row, New York, NY.

Further reading

- Blalock, H.M. (1987), "A power analysis of conflict processes", in Edward Lawler, J. and Markovsky, B. (Eds), *Advances in Group Processes*, Vol. 4, pp. 1-40.
- House, R.J. (1996), "Path-goal theory of leadership: lessons, legacy, and a reformulated theory", *Leadership Quarterly*, Vol. 7, pp. 323-52.

Appendix. Variable items used in this study

Measure

Leadership physical proximity

- X1 I feel my boss/es move around too closely to my personal workstation
I cannot say I feel that my supervisor/s appropriate/s my job privacy through their physical proximity (R)
- X2 My boss/es move around so far from my workstation that I sometimes feel isolated from them (R)
- X3

Perceived organizational control

- Y4 I perceive my co-worker and (or) client relationships are controlled by the university
- Y5 I perceive pressure in my job to achieve goals
- Y6 I perceive the proper use of my work tools may be checked by my organization
- Y7 I may be accused at any moment of not strictly fulfilling my job obligations

Fear of punishment

I recognize I have sometimes complied with the rules of my job...

- Y8 for fear of a verbal caution from my boss
- Y9 for fear of a warning/letter of reprimand from my boss
- Y10 for fear that my bosses will watch and control me more closely
for fear that my organization will start disciplinary action with the intention of dismissing me
- Y11

Deviant workplace internet behavior

I use Internet at work to...

- Y12 visit websites and digital newspapers to seek personal information
- Y13 download software or files for personal or family use
- Y14 visit the website of my bank to consult my current account
- Y15 read or send personal (non-professional) e-mails
- Y16 surf the net and so escape a little

Note: R- reverse scored items

Table AI.