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A STUDY OF SUPPORTIVE CLIMATE, TRUST, ENGAGEMENT AND ORGANIZATIONAL COMMITMENT

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This study was undertaken to explore the relationship between supportive climate and organizational commitment as mediated by trust and employee engagement. In a field test of 243 engineers and technicians from a Fortune 100 multinational firm, participants completed surveys about their organization's supportive climate, trust in their organization's leadership, affective organizational commitment, and engagement. Support for all hypotheses was found: (1) positive relationship between supportive climate and organizational commitment, and both (2) trust and (3) employee engagement mediated the climate-commitment relationship. Limitations of this study include generalizability of findings and common method bias. In human capital intensive industries, the value of human resources is measured in behavioral manifestations (e.g., turnover) of low trust, engagement, commitment, and a less than supportive work environment. By understanding the relationships among these variables managers can actively manage their human capital.

INTRODUCTION

There is evidence that workers of all generations are skeptical of their organizations and have many reasons for their distrust (Brandes, Castro, James, Martinez, Matherly, Ferris, & Hochwarter, 2008). Gone is the expectation that a job was a career and the entitlement of lifetime employment with one firm was a two-way commitment honored by both firm and employee. Long-term career paths seem to be relics of another age. In the past, workers wanted to employ experiences and education that would, over a career, guide them to the top of their firm; the organizations reciprocated (Rousseau, 1985).

Contemporary organizations have evolved into flatter structures in which "growth is not hierarchical, systems are temporary and careers are short-term and situational" (Noer, 1997, p. 219). Global forces and innovation have contributed to this phenomenon. Internal to the organization, though, the commitment appears to have lost strength as early as the 1970's and 1980's resulting from a societal transformation of weakened employer/employee associations and entrenched individualism (Tornow & De Meuse, 1994). This weakened commitment likely started simultaneously with both parties. The employee enjoyed the relatively new freedom of careerism which may have resulted in entitlement thus engendering apathy and adverse thinking. The firm used strategic tools (e.g., downsizing) to control costs and become more competitive in the face of heavy competition and tougher to achieve increased revenue expectations.

One way leaders may prevent the potential for downward spiraling of employees' relationships with their workplaces is to develop a supportive climate. In an ethnographic study, Kahn (1990) found that when employees experienced psychological safety they became more engaged in their job responsibilities. Psychological safety is defined as "feeling able to show and employ one's self without fear of negative consequences to self-image,

status or career" (p. 708). In an empirical test of Kahn's semantic network researchers found that workers reporting supportive leadership also reported greater psychological safety (May, Gilson, & Harter, 2004).

In this empirical paper, we develop and test a model of effects from a supportive organizational climate on workers' affective commitment to their organization. Trust and engagement are hypothesized to be important mediators of this relationship.

THEORY AND HYPOTHESES

Organizational Commitment

Like many topics in organizational behavior (OB), organizational commitment has a variety of definitions and operationalizations that have evolved over years of study. A commonly cited definition, and the framework for subsequent definitions, is that of Porter, Steers, Mowday and Boulian (1974), which states that organizational commitment is the strength of an individual's identification with and involvement in a particular organization. They characterize it with three psychological factors: (1) a desire to remain in the organization, (2) willingness to exert considerable effort on its behalf, and (3) belief in and acceptance of its goals and values.

Allen and Meyer (1990a) advanced and tested a three-component model of commitment. The components were affective, normative and continuance, all three of which aligned with Porter et al.'s (1974) definition. The affective component refers to employees' emotional attachment to, identification with, and involvement in the organization. The continuance component refers to commitment based on the costs that employees associate with leaving the organization. The normative component refers to employees' feelings of obligation to remain with the organization. Allen and Meyer's work indicates that affective and continuance commitment are empirically distinguishable, yet appear to be somewhat related.

Allen and Meyer (1990a) used the terms affective and continuance to distinguish between views of commitment popularized by Mowday et al. (1979) and Porter et al. (1974). While both forms of commitment may increase the likelihood that an individual will remain with a firm, the reasons for doing so are different. Those with a strong affective commitment remain because they want to; those with a high level of continuance commitment remain because they have to. More attention has been given to the affective dimension, partly due to availability of valid measures.

Strong positive relationships have been found between organizational commitment and desirable work outcomes such as performance, adaptability and job satisfaction (Mowday, Steers, & Porter, 1979; Steers 1977). Porter et al. (1974) reported organizational commitment to be a better predictor of turnover than job satisfaction. Other studies have found negative relationships between organizational commitment and negative work outcomes such as absenteeism and turnover (Hom, Katerberg, & Hulin, 1979).

Supportive Climate

One approach toward achieving sustained levels of high commitment from employees is to create a supportive organizational climate. There is a body of research literature in support of the study of this phenomenon. For example, Rogg, Schmidt, Shull, and Schmitt (2001) studied the mediating effect of supportive organizational climate between human resources practices and customer satisfaction. Additionally, Eisenberger and colleagues' organizational support theory (Eisenberger, Armeli, & Rexwinkel, 1997; Eisenberger, Fasolo, & Davis-LaMastro, 1990) has been suggested to influence a number of outcomes including affective commitment, a variable in this study.

Specific causal relationships between supportive organizational climate and outcomes of organizational commitment and job satisfaction, referenced above, have been proposed and supported within limited organizational contexts such as the medical sector (Mercer & Bilson, 1985). Supportive climate has also been positively associated with employee diligence and innovativeness (Eisenberger et al., 1990). Furthermore, supportive climate has been positively associated with affective commitment (Eisenberger et al., 1990; Rhoades, Eisenberger, & Armeli, 2001) and negatively associated with employee absenteeism (Eisenberger, Huntington, Hutchison, & Sowa, 1986) and employee turnover (Eisenberger, Armeli, & Rexwinkel, 2001). In addition, though empirical support for this relationship is more limited, supportive climate has also been proposed to lead to higher employee performance (Gardner & Schermerhorn, 1992, 2004; Schermerhorn, Gardner, & Martin, 1990).

Rogg et al. (2001) offered a study in support of supportive organizational climate. While their definition was elusive, it was encompassed in their measure, which captured four aspects of supportive climate: employee

commitment, coordination and cooperation, customer orientation, and management competence and consistency. Based upon Rogg et al. we offer the following definition of supportive climate: the degree of cooperation, coordination and support that employees perceive is present from departments within their organization and the amount of support that employees perceive is present from their leadership.

Rogg et al. (2001) adequately laid the foundation for follow up studies that examine the impact of supportive organizational climate on other desirable outcomes such as performance, job satisfaction, and commitment. In addition, the Rogg et al. (2001) measure of supportive climate was found to be reliable with adequate factor structure as will be discussed in more detail in the methods section. Rogg et al. (2001) found that this view of supportive organizational climate was related to desired organizational performance outcomes. In their study, a primary outcome under consideration was customer satisfaction. In this study, our focus is on the organization and its leadership and overall organizational coordination and cooperation (which is also influenced by leadership). Here, we leverage two aspects of the Rogg et al. view: (1) coordination and cooperation and (2) management competence and consistency.

Given the previous links between supportive climate and performance found by Rogg and colleagues (2001), the broader discussions above which included affective commitment and prior evidence of empirical linkages between the two variables, we advance our first hypothesis:

Hypothesis 1: The degree of supportive climate in an organization will have a direct, positive relationship on workers' affective commitment to their organization.

Mediating Variables

Two variables are hypothesized here to have important mediating effects on the supportive climate-organizational commitment relationship: trust and engagement. We combined work from Kahn (1990), who proposed supportive leadership would indirectly lead to engagement, and Dirks and Ferrin (2002) who asserted that supportive leadership leads to trust. The combination provides both theoretical and empirical explanation of the process within which these constructs are embedded. Furthermore, the past 40 years of research on trust has revealed several outcomes (Dirks & Ferrin, 2002), but the effects on engagement hypothesized here have yet to be investigated. Considering that engagement is shown to be a springboard to other significant outcomes (Harter, Schmidt, & Hayes, 2002), this relationship must be further explored.

Trust. Interpersonal trust is an important variable within organizational sciences, thus its consideration in this model. There are a variety of trust definitions in the management literature. Trust can be defined as the

willingness of an individual to be vulnerable to the actions of another person or group in situations that involve some degree of risk. In addition to risk, factors like benevolence, competence, and honesty are typically perceived as those indicative of trust (Schoorman, Mayer, & Davis, 2007).

The definition of trust employed in this paper is Cummings and Bromiley's (1996, p. 303), which states that trust is "an individual's belief ... that another individual or group (a) makes good-faith efforts to behave in accordance with any commitments both explicit or implicit; (b) is honest in whatever negotiations preceded such commitments, and (c) does not take excessive advantage of another even when the opportunity is available." This definition is most appropriate for this study because interactions among organization members are socially embedded and organizational outcomes (e.g., performance) are dependent upon trusting relationships. For example, Farris, Senner, and Butterfield (1972) discovered that trust was related to involvement with work and social integration into work teams.

We expect that workers who experience and operate in a climate that they perceive to be more supportive will also report higher levels of trust in the leadership of the organization. This is meaningful for both researchers and practitioners given the conclusions from a meta-analysis that trust is related to outcomes such as organizational citizenship behaviors (OCBs) and intention to quit (Dirks & Ferrin, 2002). Given the effects of supportive climate and the anticipated outcomes of trust in leadership we advance our next hypothesis:

Hypothesis 2: Workers' trust in the organization will positively mediate the relationship between supportive climate and engagement.

Engagement. Human resources and how they are managed is receiving increased attention, especially in the study of competitive advantage as evidenced by the resource-based view (RBV) of human capital found in the strategic human resource management literature (Barney 1991; Lado, Boyd, Wright, & Kroll, 2006). RBV argues that employees can be an effective source of a competitive advantage because human resources are often inimitable. Despite many complex questions remain regarding the processes by which human capital is leveraged, one path is through engagement.

Kahn (1990), who first conceptualized engagement, noted that people express themselves emotionally in the work role. Kahn's notion of calibration, or self-regulation in relation to one's ability to cope with isolation from or engulfment by a salient group, is described as personal engagement or disengagement. Kahn defined personal engagement as the "harnessing of organization members' selves to their work roles; in engagement, people employ and express themselves physically, cognitively, and emotionally during role performances" (1990, p. 693).

Subsequently, researchers have found that engagement leads to numerous positive organizational outcomes. For example, McCashland (2000) offered evidence that manager talent, employee engagement and customer satisfaction play significant roles in determining business success as measured by customer retention and revenue volume. Later, Luthans and Peterson (2002) discovered a partial mediating effect of managerial self-efficacy in the relationship between employees' measured engagement and a multiple measure of manager effectiveness.

In a meta-analysis, Harter et al. (2002) discovered substantial relationships between employee engagement and business-unit outcomes of customer satisfaction, productivity, profit, employee turnover, and accidents. One implication is that management practices that increase employee satisfaction may increase business-unit outcomes, including profit. Harter (2002) offered meta-analytic evidence, that managers can substantially improve the probability of business-unit level success through the selection of managers who possess the talent to build an environment that supports employee engagement.

Most recently, in a test of Kahn's proposed semantic network, May et al. (2004) found that Kahn's antecedents of engagement also predicted engagement. In support of Kahn's propositions, supportive leadership was found to be the strongest predictor of psychological safety, and psychological safety was the strongest predictor of employee engagement.

Each of the studies presented above have recurring themes that lead us to two outstanding conclusions about the topic of engagement. First, employee engagement leads to positive individual and organizational outcomes. Second, employee engagement is impacted by managers who create a supportive organizational climate. Given these conclusions and the positive organizational implications for engagement already discussed, we present our next hypothesis:

Hypothesis 3: Workers' engagement will positively mediate the relationship between workers' trust and affective commitment.

METHODS

Procedure

For this study, 243 electrical and mechanical engineers, technicians and engineering managers from 20 separate work groups in the engineering division of a very large, high tech, Fortune 100 Multinational Corporation participated in the complete study. For this sample, the average length of service was 15.03 years with an average age of 44.8 years. Although all ethnicities and both sexes were represented in the sample, the majority of participants were white (68.2%) and male (79.7%). Of the respondents, 193 reported male and 50 female. The mean age was 45 years. Although 19% did not report their ethnicity, 68% were white/Caucasian, 8% Asian, 3% Hispanic, 2% African American and less than

1% reported Native American. This demographic breakdown was confirmed to represent the overall firm's population of engineers, according to the unit's human resources manager. According to Rast (2004), the predominantly white and male engineering sample is consistent with the engineering population of this industry (Rast, 2004) lending support for external validity of the findings.

Potential respondents were encouraged to participate in a voluntary "Leadership" project. Those who agreed to participate were sent a web link for the first survey which included items for supportive climate, trust and engagement. After one week, subjects were sent a second hyperlink with the final survey including the organizational commitment measure. Two data collection periods separated collection of the independent and dependant variables in order to minimize common method variance (Podsakoff, MacKenzie, Lee, & Podsakoff, 2003). The number of participants who responded to the phase two data collection was 243, or an 85% response rate. In other words, there was a 15 percent mortality rate on the other three variables.

Pilot testing. Given the low utilization of the engagement and supportive climate measures we used a pilot study for exploratory factor analysis. Prior to the primary study of working adults, 264 undergraduate management students from a large mid-western university were asked to participate in the pilot study. This process used for the pilot was similar to that described above for the sample of working adults. The pilot sample included 37% female and 62% male participants with an average age of 21.5 years (S.D. 1.39). The factor structure for the measurement model of both the pilot and working adult samples were found to be similar. Specifically, items loaded appropriately on their respective scales and fit indices were in accordance with Hu and Bentler's (1999) recommended ranges for the CFA, RMSEA and SRMR. Scale reliabilities (presented below) were also congruent between the two samples.

Instruments

Supportive climate. To measure supportive climate we used 12 items from the Rogg et al. (2001) Supportive Climate Measure. Two of the four original dimensions, managerial consideration (eight items) and cooperation/coordination (four items) were used in this study since they were most closely related to the variables of interest. The remaining two dimensions, customer orientation and employee communication, were not used. Rogg et al. (2001) found the scale, and its components, to be reliable within acceptable levels with alphas ranging from .80 to .90 for all four components. Responses to the scale were made on a 6-point scale (1=strongly disagree to 6=strongly agree). An example item from this scale is

"Managers consistently treat everyone with respect." Cronbach alphas were .98 (pilot) and .92 (working adults).

Affective commitment. The affective dimension of organizational commitment was measured using four items comprising the affective factor of the Allen and Meyer (1990a) organizational commitment. Responses were measured using a six-point Likert scale (1 = strongly disagree). Typical reliabilities for affective commitment range from .74 to .87. The affective commitment items have been found to sustain their reliability in samples over time (Allen & Meyer, 1990b) and in non-U.S. samples (Lee, Allen, Meyer, & Rhee, 2001). An example item from this scale is "I feel I strongly belong to my organization." Cronbach alphas were .87 for the pilot study and .89 for the working adult sample.

Trust. The Cummings and Bromiley (1996) Organizational Trust Inventory (OTI), short form, was adapted to measure trust. The original scale was intended to measure levels of trust between organizational units, but the scale has been adapted to measure one's trust in both the organization and its leadership. Reliabilities of $\alpha = .92$ and $\alpha = .95$ for the adapted scale were found in a two phase, leadership study (Hughes, 2005). Items from the affect factor of the scale were employed here. Responses were measured using a six-point Likert scale (1 = strongly disagree). An example item from the scale is "I think that my manager tells the truth." Cronbach alphas were .93 for both samples.

Engagement. Items from the emotional engagement dimension of the May et al. (2004) engagement scale were used to measure engagement. An example item is "I put my heart into my job." Responses were measured using a six-point Likert scale (1 = strongly disagree). This scale had an alpha reliability of .88 in both the pilot and working adult samples.

RESULTS

Table 1 reveals the means, standard deviations of the variables and correlations between them. To assess multivariate normality, skewness and kurtosis values were examined for each variable. The skewness and kurtosis of all variables explored in this study fell within one point of zero. Runs tests were also conducted to test randomness in the sample. The scale items were statistically significant indicating a general randomness of responses. Furthermore, the variables were not redundant and correlations between all variables were below .70, which indicates a lack of multicollinearity (Tabachnick & Fidell, 2006). In light of the above evidence, no data transformations were deemed necessary.

Table 1: Descriptive Statistics, Correlations and Average Variance Extracted

Variable	N	Mean	SD	1	2	3	4
Commitment	243	4.14	1.18	(.68)			
Engagement	243	4.18	0.74	0.64	(.60)		
Trust	243	4.60	0.73	0.37	0.37	(.76)	
Supportive Climate	238	4.24	0.77	0.30	0.26	0.26	(.83)

Note: Elements in parentheses are the square root values of the average variance extracted for each scale.

All correlations are significant at $p \leq .01$

Aggregation of Group-Level Variable

Members in work groups are likely to be exposed to similar experiences and stimuli. Therefore, it is likely that these similarities in contextual experiences will generate collective perceptions of supportive climate. These experiences are likely to differ between groups. We tested whether or not the individual level of measurement, when aggregated, represented a group level phenomenon. With the exception of supportive climate, each mediator and outcome is measured and analyzed at the individual level of analysis.

Within group analyses were conducted on the main study data to assess levels of homogeneity on the supportive climate variable. We did so by utilizing James, Demaree and Wolf's (1993) rwg statistic to examine the variance within each work group. rwg indices of .70 or greater represent support for aggregation such that the group tends to "share" perceptions of the construct of interest. We were unable to gather group identifiers for the pilot study. However, the observed rwg for the engineer sample was .85 thus indicating that the supportive climate construct was agreed upon within groups. Furthermore, practical significance was determined by converting the rwg value to an rwg magnitude test (Dansereau, Alutto, & Yammarino, 1984). Practical within group significance was indicated by the rwg value or 1.61, which indicates, geometrically, that it represents homogeneity of response.

We also performed analysis of variance (ANOVA) on the supportive climate variable based on the grouping factor (e.g. work groups) and found a significant between group difference ($p < .01$). Finally, to estimate the level of agreement between raters we computed intra-class correlations (ICC). Although there are no clear cutoffs for ICC values, we found the indices to be consistent with prior research with an ICC(1) of .42 and ICC(2) of .73 (see Bliese, 2000, for a discussion of ICC in organizational research; see also Shrout & Fleiss, 1979). Given the theoretical nature of the construct and its operationalization we found evidence to support aggregation of individual responses of supportive climate.

Analyses

The data were analyzed using Partial Least Squares (PLS), which is a structural equation modeling technique (Wold, 1975), using PLS-Graph (Version 3.0; Professor Wynne W. Chin, University of Houston, email: wchin@uh.edu). PLS demands fewer rigors from measures, sample size and residual distributions (Chin, 1998). PLS is highly flexible for predictor specification and has advantages relative to maximum likelihood (Wold, 1975). One advantage is that both path and measurement models may be tested simultaneously allowing researchers to consider the contributions of indicators of a measure and of the variables to an aggregate model.

Measurement model. PLS allowed us to generate statistics in order to assess the reliability and validity of the measures of the latent constructs. Specifically, PLS generates factor loadings which can be interpreted as in principal-components analysis (Bookstein, 1986). Those factor loadings with a value of .7 or greater indicate that less than half of an item's variance is due to error (Sosik, Avolio, & Kahai, 1997). All items met or exceeded this criterion. Additionally, the average variance was extracted by the variable from its items using the .5 or greater cut-off suggested by Fornell and Larcker (1981). All scales exceeded the cut-off criterion.

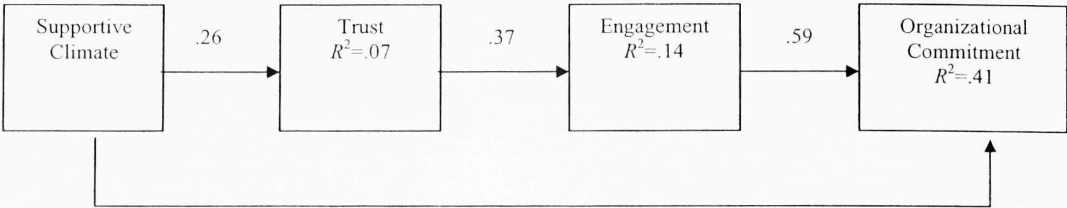
Using PLS, we assessed the convergent and discriminant validity of measurement items similar to the multitrait/multimethod approach. The criterion commonly cited is that the construct represented by the items share more variance with its items than with other constructs in the model. Employing the same approach as Sosik et al. (1997), the square root of the average variance shared by a variable was compared with its items in relation to items of the other scales employed in the study (Table 1). This was found to be the case, thus indicating adequate convergent and discriminant validity of all variables employed in this study. A second criterion is that no measurement item should load more highly on another construct than it does on the construct it purports to measure. The results also met this criterion.

Substantive analyses. A bootstrap was generated in PLS and the results revealed that all hypothesized paths were

substantive and statistically significant ($p \leq .01$). In Figure 1, coefficients of the path relationships have been displayed, as

is variance explained by each construct.

Figure 1: Partial Least Squares Path Coefficients and Variance Explained



Note: All paths significant at $p \leq .01$.

.15

Chin (1998) suggested that meaningful standardized path values will have a value of 0.20 or greater. Lower path values may result from multicollinearity or the effects of unknown factors unique to the participants or their context. All of the proposed relationships in this model were substantive and statistically significant. The direct path between supportive climate and affective commitment was less substantive than the other relationships, yet it was statistically significant and remains theoretically interesting within the context of this model.

Our first hypothesis stated that worker's perceptions of their organization's supportive climate would have a direct, positive relationship on affective commitment to their organization. The path relationship between these two variables was substantive ($r = .30$; $\beta = .31$; $p < .01$) indicating that, in this sample, the workers' reported levels of supportive organizational climate were related to their reported levels of affective organizational commitment.

We also found that worker trust in leadership would partially and positively mediate the relationship between supportive climate and engagement. The direct relationship between supportive climate and engagement was substantive and significant ($r = .27$; $\beta = .29$; $p < .01$). Although, the relationship remained statistically significant, it was far less substantive than it was prior to the introduction of the trust variable ($\beta = .16$; $p < .01$).

A third hypothesis was that worker engagement would partially and positively mediate the workers' trust and affective commitment relationship was supported. The direct relationship between trust and affective commitment was substantive and statistically significant ($r = .41$; $\beta = .44$; $p < .01$). Although, the relationship remained statistically significant, it was less substantive than prior to introducing the engagement variable ($\beta = .20$; $p < .01$).

LIMITATIONS

There are also limitations to our study that should be discussed. Although the demographics are an adequate representation of this large organization, the changing

demographics in the engineering industry may limit the future external validity of the findings. It should be noted that we found no evidence that demographics influenced the relationships hypothesized in this sample, but understand that the variables will not operate identically in all contexts and this should be recognized. Additionally, the use of self-report survey measures may have resulted in common method bias. As noted above we addressed this issue by measuring independent and dependant variables at different time points, as prescribed by Podsakoff et al. (2003). However, future research should include objective measures such as performance.

DISCUSSION AND MANAGERIAL IMPLICATIONS

In this investigation, we found support for a model of supportive climate and the relationships between several attitudinal variables antecedent to more distal workplace outcomes such as job satisfaction and performance. The model contains what we suggest are the ingredients of a strong workplace relationship between managers and their charges: a supportive context, employee trust, engagement, and commitment.

Our first assertion was that that worker's perceptions of their organization's supportive climate would have a direct, positive relationship on their affective commitment to their organization. We found support for this in that workers' reported levels of supportive organizational climate were related to their reported levels of affective organizational commitment. In other words, employees who function in a climate perceived to be more supportive will also report higher levels of commitment to their organizations.

Given our definition of supportive climate, this finding is useful to working managers. Supportive climate is one in which workers perceive that their leaders provide an environment of cooperation and support for their work to accomplish the organization's mission. In fact, the very measure of climate taps worker perceptions of managers' competence, consistency in behavior, and cooperation (Rogg et al., 2001). Potentially causal relationships between

supportive organizational climate and outcomes of organizational commitment and other attitudinal outcomes, such as job satisfaction, have been supported in organizational sciences research, and other behavioral outcomes have been linked to them. Examples include employee diligence, innovativeness, higher performance, and negative associations with absenteeism, and employee turnover. Each example is associated with a tangible cost or benefit to organizations.

We also found support for our assertion that worker trust in leadership would partially and positively mediate the relationship between supportive climate and engagement. In fact, the introduction of trust impacted the previously substantive relationship thus explaining much of its existence in this sample. Managers should understand the supportive climate → outcomes relationships identified in this work. Trust research focused on contextual variables has been called for (Schoorman et al., 2007) and a number of organizational environments have been investigated, including the medical sector and, here, the aerospace industry. First, employees who function in a climate in which they receive cooperation and direction perceived to be more supportive of their respective contributions will also report higher levels of trust in their organization. This is meaningful for both researchers and practitioners given meta-analytic evidence that trust is related to attitudinal outcomes such turnover intention and organizational citizenship behaviors (OCB) (Dirks & Ferrin, 2002).

Our final assertion was that worker engagement would partially and positively mediate the relationship between workers' trust and affective commitment. A substantive relationship was found between trust and affective commitment although less so than after the introduction of engagement. Engagement is the emotional, cognitive, and behavioral expression of one's self in a work role (Kahn, 1990). Engagement is related to customer retention, managerial efficacy and effectiveness, profit, turnover. Manager can improve tangible and measureable workplace outcomes by building an environment, or climate, that supports employee engagement. If workers perceive psychological safety in this environment, supportive leadership will be the strongest predictor of psychological safety, which is the strongest predictor of employee engagement (May et al., 2004).

Given the highly competitive nature of today's economy and the losses or gains that organizations experience due to the value of advanced human capital, we anticipate the interest in both organizational commitment by managers and researchers will continue. We have provided a framework to better understand the effects of a supportive climate, trust, engagement, and commitment in order to stimulate additional research and discussion on these topics.

Employees who are engaged in their jobs are more likely to invest the necessary cognitive, physical and emotional energy required to succeed. In this article, we have specifically offered theoretical and empirical evidence

that one potential method of developing engaged employees is through fostering a supportive climate including internal cooperation and coordination. This article is the first to consider the relationships between supportive climate, engagement and commitment in a single explanatory framework.

REFERENCES

- Allen, N.J., & Meyer, J.P. 1990a. The measurement and antecedents of affective, continuance and normative commitment to the organization. **Journal of Occupational and Organizational Psychology**, 63, 1-18.
- Allen, N.J., & Meyer, J.P. 1990b. Organizational socialization tactics: A longitudinal analysis of links to newcomers' commitment and role orientation. **Academy of Management Journal**, 33, 847-858.
- Barney, J.B. 1991. Firm resources and sustained competitive advantage, **Journal of Management**, 17, 99-120.
- Bliese, P.D. 2000. Within-group agreement, non-independence and reliability: Implications for data aggregation and analysis. In K.J. Klein, and S. Koslowski (Eds.), **Multi-level theory, research and methods in organizations: Foundations, extensions and new directions** (pp. 349-381). San Francisco, CA: Jossey-Bass.
- Bookstein, F. 1986. The elements of latent variable models: A cautionary lecture. In M. Lamb, A. Brown, and B. Rogoff (Eds.), **Advances in Developmental Psychology** (pp. 203-230). Hillsdale, NJ: Erlbaum.
- Brandes, P., Castro, S. L., James, M., Martinez, A.D., Matherly, T.A., Ferris, G.R., & Hochwarter, W. 2008. Interactive effects of job insecurity and organizational cynicism on work effort following layoff. **Journal of Leadership and Organizational Studies**, 14, 233-247.
- Chin, W. 1998. Partial least squares approach to structural equation modeling. In G. Marcoulides (Ed.), **Modern Methods for Business Research** (pp. 295-336). Mahwah, NJ:
- Cummings, L.L., & Bromiley, P. 1996. The Organizational trust inventory (OTI): Development and validation. In R.M. Kramer and T.R. Tyler (Eds.), **Trust in Organizations: Frontiers of Theory and Research** (pp. 302-330). Thousand Oaks, CA: Sage.
- Dansereau, F., Alutto, J.A., & Yammarino, F.J. 1984. **Theory Testing in Organizational Behavior: The Variant Approach**. Englewood Cliffs, NJ: Prentice-Hall.
- Dirks, K.T., & Ferrin, D.L. 2002. Trust in leadership: Meta analytic findings and implications for research and practice. **Journal of Applied Psychology**, 87, 611-628.

- Eisenberger, R., Armeli, S., & Rexwinkel, B. 2001. Reciprocation of perceived organizational support. *Journal of Applied Psychology*, 86, 42-51.
- Eisenberger, R., Fasolo, P., & Davis-LaMastro, V. 1990. Perceived organizational support and employee diligence, commitment, and innovation. *Journal of Applied Psychology*, 75, 51-59.
- Eisenberger, R., Huntington, R., Hutchison, S., & Sowa, D. 1986. Perceived organizational support. *Journal of Applied Psychology*, 71, 500-507.
- Farris, G., Senner, E., & Butterfield, D. 1972. Trust, culture and organizational behavior. *Industrial Relations*, 12, 144-157.
- Fornell, C., & Larcker, D.F. 1981. Structural equation models with unobservable variables and measurement error: Algebra and statistics. *Journal of Marketing Research*, 18, 382-388.
- Gardner, W., & Schermerhorn, J. 1992. Strategic operational leadership and the management of supportive work environments. In R.L. Phillips, and J.G. Hunt (Eds.), *Strategic leadership: A multiorganizational-level perspective* (pp. 99-117). Westport, CT: Quorum/Greenwood.
- Gardner, W.L., & Schermerhorn, J.R. 2004. Unleashing individual potential performance gains through positive organizational behavior and authentic leadership. *Organizational Dynamics*, 33(3), 270-281.
- Harter, J.K. 2002. Managerial talent, employee engagement, and business-unit performance. *Psychologist-Manager Journal*, 4, 215-224.
- Harter, J.K., Schmidt, F.L., & Hayes, T.L. 2002. Business-unit-level relationship between employee satisfaction, employee engagement, and business outcomes: A meta-analysis. *Journal of Applied Psychology*, 87(2), 268-279.
- Hom, P.W., Katerberg, R., & Hulin, C.L. 1979. Comparative examination of three approaches to the prediction of turnover. *Journal of Applied Psychology*, 64, 280-290.
- Hu, L., & Bentler, P.M. 1999. Cutoff criteria for fit indices in covariance structure analysis: Conventional criteria versus new alternatives. *Structural Equation Modeling: An Interdisciplinary Journal*, 6, 1-55.
- Hughes, L.W. 2005. Transparency, translucence or opacity: An experimental study of leaders' style of humor delivery and relational transparency on followers' positive emotions, trust and creative performance. Unpublished doctoral dissertation, University of Nebraska.
- 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.
- Kahn, W.A. 1990. Psychological conditions of personal engagement and disengagement at work. *Academy of Management Journal*, 33, 692-724.
- Lado, A.A., Boyd, N.G., Wright, P., & Kroll, M. 2006. Paradox and theorizing within the resource-based view. *Academy of Management Review*, 31(1), 115-131.
- Lee, K., Allen, N., Meyer, J., & Rhee, K. 2001. Three-component model of organizational commitment. *Applied Psychology: International Review*, 50, 596-614.
- Luthans, F., & Peterson, S.J. 2002. Employee engagement and manager self-efficacy. *Journal of Management Development*, 21, 376-387.
- May, D.R., Gilson, R.L., & Harter, L.M. 2004. The psychological conditions of meaningfulness, safety and availability and the engagement of the human spirit at work. *Journal of Occupational and Organizational Psychology*, 77, 11-37.
- McCashland, C.R. 2000. Core components of the service climate: Linkages to customer satisfaction and profitability. *Dissertation Abstracts International Section A: Humanities and Social Sciences*, 60(12-A), 4290.
- Mercer, A.A., & Bilson, K. 1985. Factors influencing organizational commitment by physicians. *Academy of Management Proceedings*, 72-76.
- Mowday, R.T., Steers, R.M., & Porter, L.W. 1979. The measurement of organizational commitment. *Journal of Vocational Behavior*, 14, 224-247.
- Noer, D. 1997. Layoff survivor sickness: What it is and what to do about it. In M.K. Gowing, J.D. Kraft, and J.C. Quick (Eds.), *The new organizational reality: Downsizing, restructuring, and revitalization* (pp. 207-220). Washington, DC: American Psychological Association.
- Podsakoff, P.M., MacKenzie, S.C., Lee, J., & Podsakoff, N.P. 2003. Common method biases in behavioral research: A critical review of the literature and recommended remedies. *Journal of Applied Psychology*, 88, 879-903.
- Porter, L.W., Steers, R.M., Mowday, R.T., & Boulian, P.V. 1974. Organizational commitment, job satisfaction, and turnover among psychiatric technicians. *Journal of Applied Psychology*, 59, 603-609.
- Rast, J. 2004. Design talent no longer white, male, and middle-aged. *Design Intelligence*, 12.

- Rhoades, L., Eisenberger, R., & Armeli, S. 2001. Affective commitment to the organization: Contribution of perceived organizational support. **Journal of Applied Psychology**, 86, 825-836.
- Rogg, K.L., Schmidt, D.B., Shull, C., & Schmitt, N. 2001. Human resource practices, organizational climate, and customer satisfaction. **Journal of Management**, 27, 431-449.
- Rousseau, D.M. 1985. Issues of level in organizational research: Multi-level and cross-level perspectives. **Research in Organizational Behavior**, 7, 1-37.
- Schermerhorn, J.R., Gardner, W.L., & Martin, T.N. 1990. Management dialogues: Turning on the marginal performer. **Organizational Dynamics**, 18, 47-59.
- Schoorman, F.D., Mayer, R.C., & Davis, J.H. 2007. An integrative model of organizational trust: Past, present, and future. **Academy of Management Review**, 32, 344-354.
- Shrout, P.E., & Fleiss, J.L. 1979. Intraclass correlations: Uses in assessing rater reliability. **Psychological Bulletin**, 86, 420-428.
- Sosik, J.L., Avolio, B.J., & Kahai, S. S. 1997. Effects of leadership style and anonymity on group potency and effectiveness in a group decision support system environment. **Journal of Applied Psychology**, 82, 89-103.
- Steers, R.M. 1977. Antecedents and outcomes of organizational commitment. **Administrative Science Quarterly**, 22, 46-57.
- Tabachnick, B.G., & Fidell, L.S. 2006. **Using multivariate statistics** (5th ed.). Boston, MA: Allyn and Bacon.
- Tornow, W., & De Meuse, K. 1994. New approaches in strategic HR Management. **Personnel Management**, 19, 165-171.
- Wold, H. 1975. Path models with latent variables: The NIPALS approach. In H.M. Blalock, A. Aganbegian, F.M. Borodkin, R. Boudon, and V. Capocchi (Eds.), **Quantitative Sociology** (pp. 307-357). New York: Academic Press.

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