

Available online at www.sciencedirect.com**SciVerse ScienceDirect**

Procedia - Social and Behavioral Sciences 62 (2012) 1016 – 1022

Procedia
Social and Behavioral Sciences

WC-BEM 2012

A relational approach among perceived organizational support, proactive personality and voice behaviour

Pelın Kanten^{a*}, Funda Er Ulker^b^a*Mehmet Akif Ersoy University, Bucak Hikmet Tolunay Vocational School, Burdur 15000, Turkey*^b*Namık Kemal University, Hayrabolu Vocational School, Tekirdağ 59000, Turkey*

Abstract

This study aims to investigate the relationship among the perceived organizational support, proactive personality and voice behaviour of the employees. Recent studies accept that proactive personality is one of the primary determinants of voice behaviour and a few researchers suggest that proactive personality of the employees are affected by certain organizational factors like perceived organizational support. In this context, this study conducted in two large firms which were part of telecommunication and energy sectors in Turkey. Research findings imply that there is a significant relationship between proactive personality and voice behaviour and also perceived organizational support of employees may result in voice behaviour. Therefore, there is a significant relationship between perceived organizational support and voice behaviour.

© 2012 Published by Elsevier Ltd. Selection and/or peer review under responsibility of Prof. Dr. Hüseyin Araslı

Open access under [CC BY-NC-ND license](https://creativecommons.org/licenses/by-nc-nd/4.0/).

Keywords: Proactive personality, voice behaviour, perceived organizational support

1. Introduction

Perceived organizational support is an important concept in the management literature because it offers an explanation for the relationship between an organization's treatment of its employees and the employees' attitudes and behaviors towards their jobs and organization (Zagenczyk, 2001: 8). The employee's level of perceived organizational support (POS) reflects their innermost feelings about the organization's care and emphasis. Personnel with a sense of POS feel that in circumstances where they need work or life support, the organization is willing to lend a helping hand, personally feel respected, cared for, and recognized. Forms of organizational support that help and encourage personnel to be self-directed and self-managing, thus will boost proactivity (Hashemi et al., 2012: 84). Proactivity at work is generally characterized by initiative, such as performing a task without being asked to do so, assertiveness, which can be described as solving a potential problem by taking charge such as reporting problematic events, and as taking charge in general. The notion of proactive behaviour evolved from the theoretical framework of social interactionism that holds proactivity (Bjorkelo et al., 2010: 372).

Proactive personality is the personal trait with which employees use initiative, persevere and attempt to shape environment (Yi, 2009: 5). Proactive personality demonstrates a positive relationship with a variety of proactive behaviors, such as voice behaviour and career initiative. Researches have shown that proactive individuals are more likely to engage in voice behavior (Marler, 2008: 22). Since the 1990s there has been ongoing research of

* Pelın KANTEN. Tel.: +90-248-325-5843

E-mail address: pelincalislar@hotmail.com

proactivity, but until recently research was splintered and needed to be integrated. However, proactive personality, have been found as factors affecting proactive work behaviors. There are a few research that shows the relationship between proactive personality and proactive work behaviours. On the other hand, there is a gap in existing literature that will be filled by investigating the influence of perceived organizational support on proactive behaviours. But the dispositional influence of personality is also taken into account, to include both personal and work characteristic variables. So, besides that it has been less researched, literature is also contradictory in their opinion about the relationship between organizational support and proactivity (Kamp, 2010: 6).

This study attempts to add to the area of organizational behaviour research. Due to limited studies on proactive personality and voice behaviour, this study will give insight to the relations among perceived organizational support, proactive personality and voice behaviour. Accordingly, the purpose of this study is determined in this context in order to investigate the relationship among the perceived organizational support, proactive personality and voice behaviour.

2. Literature Review

In today's business world firm's competitiveness is based on attitudes and behaviors of human resources. If employees are valued and rewarded in the organization they will be more relaxed and satisfied and will consider themselves emotionally committed towards their organization (Shumaila et al., 2012: 4). Therefore employees are actively concerned with different forms of treatments that received from the organization. Perception of employees about different organizational practices play vital role in determining their job attitudes and behaviors (Waseem, 2010: 3264). Perceived organizational support (POS) is an employee belief that the organization cares for and values his or her contribution to the success of the organization. Perceived Organizational Support (POS) refers to employees' perception concerning the extent to which the organization values their contribution and cares about their well being (Krishnan and Mary, 2012: 2). In other words, perceived organizational support is an employees' formation of global beliefs pertaining to how much the organization cares about their well-being and values their contributions (Wann-Yih and Htaik, 2011: 1). Few studies have shown that perceptions of organizational support and self efficacy contribute significantly to the prediction of proactive work behaviors. Proactive behavior defined as 'taking initiative in improving current circumstances or creating new ones; it involves challenging the status quo rather than passively adapting to current conditions (Fuller et al., 2006: 1098). Antecedents of proactive behaviour include work characteristics, such as job autonomy, job complexity, and control, environmental characteristics, such as management support and individual variables, such as (role-breadth) self efficacy and proactive personality (Belschak ve Hartog, 2010: 477). In order to understand the dispositional antecedents of proactive behavior, scholars have conducted considerable research on the proactive personality. Not surprisingly, studies suggest that the proactive personality is associated with higher levels of various proactive behaviors, including career initiative, innovation, social network-building, problem-solving, idea implementation, job search behavior, and learning and development activities (Grant and Ashford, 2008: 20). Consequently, personality of employees is very important with regard to proactive behavior, because commitment of employees or perfect work circumstances for proactive behavior don't mean automatic that employees will be proactive. For a large part this is influenced by personality traits of the employee (Kamp, 2010:2).

Proactive personality, which is defined as a relatively stable tendency to effect environmental changes. Individuals with a prototypical proactive personality take action to influence their environments, or "identify opportunities and act on them, show initiative, take action, and persevere until meaningful change occurs (Bertolino et al., 2011: 249). Proactive individuals are dynamic agents who identify and seize opportunities that bring about change in their environments by either improving their current situations or creating new ones. Moreover, proactive individuals tend to be self-starters who are future oriented and who persist with activities until their objectives are achieved (Greguras and Diefendorff, 2010: 540). They show initiative, identify opportunities, act on them, and persevere until they meet their objectives. They confront and solve problems, and take individual responsibility to make an impact on the world around them. They anticipate environmental changes and take advantage of opportunities to improve their situation (Gupta and Bhawe, 2007: 74). Empirical evidence demonstrates that

proactive personality is a unidimensional construct that is positively related to a number of important individual and organizational outcomes including job performance tolerance for stress in demanding jobs, leadership, effectiveness, participation in organizational initiatives, work team performance and entrepreneurship (Seibert et al., 2001: 847). In addition to this, researches has established that proactive personality was positively related to job satisfaction, as well as overall job performance, organizational citizenship behaviors, career success and affective organizational commitment (Major, et al., 2012: 17). Because of these outcomes, proactive personality skills are described as a critical determinant of organizational success and also a determinant which leads to increased organizational effectiveness (Gudermann, 2010: 3). In times of uncertain, fast-changing environments, flat hierarchies, and complex work tasks, organizations need a new type of employees which we described proactive personality (Belschak, et al., 2010:267).

Proactive personality should positively predict all proactive behaviors. Indeed, proactive personality has been shown to predict proactive problem solving, individual innovation, as well as more strategic behaviors such as entrepreneurship and P-E fit behaviors, such as career initiative. Furthermore, proactive personality predicts network building, proactive socialization, career initiative, and proactive work behaviors such as taking charge, problem prevention, and voice behaviour (Parker and Collins, 2010: 10; Parker et al., 2010:848). Proactive personality is a personal disposition toward action. Individuals with high levels of proactive personality take personal initiative and are committed to bringing about positive and constructive change to their environment regardless of situational forces. Similarly, voice involves speaking up for change in an effort to improve the current method of operating. Voice is a behavior that is seen as active and constructive and intended to improve rather than criticize. It would be likely that the personal disposition of proactive personality would be positively related to voice and precede the action of voice (Ristig, 2008: 142). In recent years, there has been a rapidly growing body of conceptual and empirical research focused on better understanding the motives underlying voice, individual, and situational factors that increase employee voice behavior, and the implications of voice and silence for employees, work groups, and organizations (Morrison, 2011: 373).

Voice behaviour is an act of speaking up that occurs without prompt and occurs when an individual has an idea or opinion to share to better a situation (Wong et. al, 2010:891). Voice behavior can play a prominent role in the success of organizations by facilitating change and innovation, especially during challenging times as new ideas help foster continuous improvement. Voice behavior is defined as making a constructive, change-oriented communication intended to improve one's situations. Examples of voice behaviors include making suggestions for improvement and recommending a change in the status quo even when faced with others' disagreement (Crant et. al, 2011:285). The first group of voice consists of attempts to propose new ideas/opinions for improving the overall functioning of the work unit or organization. The second group of behavior describes speaking up about dysfunctional aspects of work practices (e.g., harmful behavior, outdated procedures, rules, or policies). Therefore, both forms of voice are constructive and helpful to an organization (Liang and Tang, 2010:542-543). Accordingly, organizations need people who are responsive to the challenges of the environment, are not afraid to share information and knowledge and can stand up for their own and their team beliefs (Nikolaou et.al, 2008:666-667). Based on the above literature, there is no conclusive evidence on the relationship among perceived organizational support, proactive personality and voice behaviour. Thus, this study investigates this relationships. In order to test the relationships, hypothesis that shown below are developed.

H1: There is a statistically significant relationship between the perceived organizational support and voice behaviour.

H2: There is a statistically significant relationship between the proactive personality and voice behaviour.

3. Research Methodology

3.1. Sample and Measures

This study was conducted in two large firms which are in telecommunication and energy sectors in Turkey.

The managements of enterprises were approached for permission to conduct research on premises and permission was obtained. Therefore the 180 questionnaires that were sent, 120 (66%) were returned and 108 (60%) were accepted as valid and included in the evaluations. Questionnaire survey method is used for data obtainment. Questionnaire form contains three measurement related to perceived organizational support, proactive personality and voice behaviour. All items were measured on a 5-point rating scale ranging from 1 (strongly disagree) to 5 (strongly agree). Perceived organizational support was measured with twenty four items adapted from the previous study (Pazy: 2008). The measurement of proactive personality was based on a 17-items, these items were adapted from the Yi's study (2009). Voice behaviour was measured with thirty items adapted from the study (Liang, 2007). All of these measurements in this study translated into Turkish. Questionnaire also contains six questions to determine demographic characteristics of the employees.

3.2. Statistical analysis

SPSS for Windows 17.0 program is used to analyze the data obtained by the questionnaire survey. Factor analysis is used to test the variables related to perceived organizational support and voice behaviour dimensions. Cronbach Alpha values determine the reliability levels of the scales that were computed. In order to test the hypotheses the analyse of Pearson Correlation was used and multiple regression analysis is used to explain the relationships among the perceived organizational support, proactive personality and voice behaviour.

4. Results

4.1. Subject Demography

According to the obtained data, there were 53 males (49%) and 55 females (51%) surveyed, which amounted to 108 respondents. Majority of the respondents were between the age of 26 and 37 years (74%). The educational level of the respondents ranged from High School (14%), Bachelor's Degree (52%), Diploma (23%) and Post Graduate (11%). % 56 of the employees parted the research is working in this company between 1-6 years and 31% of the employees working in this company more than 7 years.

4.2. Reliability Analyses

The internal consistency coefficients (Cronbach's Alpha) of the two factors that comprise the perceived organizational support are as follows: 0.95 and 0.92. The internal consistency coefficients of proactive personality (Cronbach's Alpha) is computed also 0.91. Computed internal consistency coefficient of the two factors that comprise the voice behavior is 0.95 and 0.91. These results show that the scales used in this study have sufficient reliability for social sciences.

4.3. Factor Analysis

Kaiser-Meyer-Olkin (KMO) test that is used for basic components analysis for the perceived organizational support variables showed that the size of the sample was sufficient (KMO value ,906) for factor analysis. Barlett test conducted to determine whether the data for perceived organizational support conformed to normal distribution or not produced a significant result (2660,183; $p < 0,01$). Through factor analysis of the perceived organizational support variables and Varimax Rotated Factor Loadings, two factors obtained with self values greater than 1.00. These factors explain the 67.650% of the total variance. Two items with a factor load under 0.50 were excluded from the scale. It can be seen that the remaining 22 items are grouped under the relevant factors as per theoretical structure. It can be said that the scales used can measure a single structure that complies with the theory and have structural validity. These two factors with their names, items in each factor, their factor loadings, explained variance and reliability coefficients are presented in Table 1.

Table 1. Perceived Organizational Support Varimax Rotated Factor Loadings

Factor 1: Management Support (variance=34,761%, Cronbach"s.Alpha= 0.954)		Factor 2: Supervisor Support (variance=32,890%, Cronbach"s.Alpha= 0.925)	
My organization values me as a person and personally supports me	,781	My supervisor really cares about my wellbeing	,845
The organization cares about my wellbeing.	,762	My supervisor strongly considers my goals	,828
My organization shows concern for me as a person	,756	My supervisor strongly considers my values	,821
My organization strongly considers my personal goals and values	,745	My supervisor is friendly and approachable	,820
The organization cares about my general satisfaction at work.	,739	My supervisor tends to consult the group	,808
My organization cares about my opinions on personal matters	,729	My supervisor maintains definite standards of performance	,720
The organization tries to make my job as interesting as possible.	,728	My supervisor lets me know what is expected of me	,670
My organization cares about my opinions on work matters	,719		
My organization is willing to help when I need a special favor	,709		
Help is available from the organization when I have a problem.	,700		
My organization supports me in work matters	,658		
The organization would ignore any complaint from me	,657		
Even if I did the best job possible, the organization would fail	,628		
The organization disregards my best interests	,611		
The organization takes pride in my accomplishments at work	,560		

Kaiser-Meyer-Olkin (KMO) test that is used for basic components analysis for the voice behaviour variables showed that the size of the sample was sufficient (KMO value ,936) for factor analysis. Barlett test (2011,657; p<0,01). Through factor analysis of the voice behaviour variables and Varimax Rotated Factor Loadings, 23 factors obtained with self values greater than 1.00. These factors explain the 62.980% of the total variance. Seven items with a factor load under 0.50 were excluded from the scale. The two factors with their names, items in each factor, their factor loadings, explained variance and reliability coefficients are presented in Table 2

Table 2. Voice Behaviour Varimax Rotated Factor Loadings

Factor 1:Promotive Behaviour (variance=35,414%, Cronbach"s.Alpha= 0.956)		Factor 2:Prohibitive Behaviour (variance=27,566%, Cronbach"s.Alpha= 0.918)	
Make constructive suggestion that can improve the company	,870	Express resentments at being given orders	,849
Frequently communicate to co-workers suggestions	,847	Serious consequences, express opinions honestly	,817
Develop and makes recommendations concerning issues	,804	Tell the truths, even when everyone else disagree	,810
Make innovative suggestion to improve department	,760	Speak up if he/she feels a plan or idea won't work	,749
Make constructive statements about the departments	,759	Express opinions honestly when others think differently	,720
Make suggestions to improve work procedures.	,744	Speak up when there is conflict with his/her sense	,705
Actively raise suggestions to improve work procedures or processes	,708	Call management attention to dysfunctional activities.	,701
Suggest solutions to your supervisor	,703	Communicate opinions even if others disagree	,537
Try to think of different solutions to the problems	,701	Talk with supervisor until you reach total agreement	,502
Get involved in issues that affect the quality of work life here	,676		
Speak up and encourages others in this group to get involved in	,665		
Speak up with ideas for that might benefit the organization	,641		

4.4. Correlation and Regression Analysis

In order to examine the correlations between the applied measures, index variables were computed for each of the constructs. Table 3 presents the correlation matrix for all the included indices.

Table 3. Correlation Matrix

Determinants	1	2	3	Mean
Voice Behaviour	1.00			3.96
Proactive Personality	0.714**	1.00		4.03
Perceived Organizational Support	0.321**	0.250	1.00	3.43

**p<0.001

Correlation analyses results indicate a positive and significant relationship among voice behaviour and proactive personality (r= 714, p<0.01); also, a positive and significant relationship among voice behaviour and perceived organizational support. (r= 321, p<0.01). These results support the hypotheses H1 and H3. According to the correlation analysis among perceived organizational support and proactive personality of the employees, there is no significant relationship. Taking this result into account, the hypothesis H2 is rejected. Regression analysis was conducted to evaluate the relationship between the proactive personality and voice behaviour. According to

regression analysis findings shown on Table 4; 51% of the variance in voice behaviour is explained by proactive personality. The regression model, explaining the impact of proactive personality on voice behaviour, is valid (with $F=110.221$; $p<0.001$).

Table 4. The Regression Analysis For Voice Behaviour

	R ²	F	β	t	p
Proactive Personality	.510	110.221	.714	2.021	.000

** $p<0.001$

Table 5 indicates the results of the regression analysis, which is used to measure the perceived organizational support on voice behaviour. Model summary Table 5 shows how much perceived organizational support variables explain voice behaviour. 10.3% of the variance in voice behaviour is explained by perceived organizational support. The regression model, explaining the impact of perceived organizational support on voice behaviour, is valid (with $F=12.192$; $p=0.001$). Positive β value indicates the increasing or decreasing effect of perceived organizational support on voice behaviour.

Table 5. The Regression Analysis For Voice Behaviour

	R ²	F	β	t	p
Perceived Organizational Support	.103	12.192	.321	12.453	.001

* $p<0.01$

5. Conclusion

The purpose of this study is to investigate the relationships among the perceived organizational support, proactive personality and voice behaviour. For this purpose, the literature is reviewed and the hypotheses are developed. The significant findings were found on the relation among voice behaviour, proactive personality and perceived organizational support. Therefore hypotheses H1 and H2 are accepted. This research, however has certain limitation. Because the results are limited to the company in which the research is conducted. This research is based on only two company in Turkey, therefore, we cannot make any generalization. Any other research may result in different findings. In this research, no direct effect of proactive personality on perceived organizational support is observed. Therefore, for further researches, an expanded new model including proactive behaviour and trust as mediating variables may be developed.

In current literature, there are few studies which were found similar findings like our study. In these studies, they have been established solely that proactive personality antecedent of voice behaviour (Liang, 2007; Crant et al., 2010; Liang and Tang, 2010). But there is no conclusive evidence on the relationship between perceived organizational support and voice behaviour. Due to limited studies on proactive personality and voice behaviour, this study will give insight to the relations among perceived organizational support, proactive personality and voice behaviour. We believe that this study, according to our knowledge, is the first of its kind to investigate the relations among proactive personality, voice behaviour and perceived organizational support. From the perspective of management it is the responsibility of this function to create a perceived organizational support that encourages employees to exhibit voice behaviour and finding the appropriate employees with the right characteristic of proactive personality. Furthermore, companies and managers enhance selecting and hiring process in organizations proactive employees and support already existing processes, by developing methods which are specified in identifying proactive personality, voice behaviour and perceived organizational support. We hope that this study pave the way for future voice and proactive personality researches and provide empirical support for organizational management practices.

References

- Belschak, F.D., Hartog, D.N.D., & Fay, D., (2010). Exploring positive, negative and context-dependent aspects of proactive behaviours at work. *Journal of Occupational and Organizational Psychology*, 83, 267–273

- Belschak, F.D., & Hartog, D.N.D., (2010). Pro-self, prosocial, and pro-organizational foci of proactive behaviour: Differential antecedents and consequences. *Journal of Occupational and Organizational Psychology*, 83, 475-498.
- Bertolino, M., Truxillo, D.M., & Fraccaroli, F., (2011). Age as moderator of the relationship of proactive personality with training motivation, perceived career development from training, and training behavioral intentions. *Journal of Organizational Behavior*, 32, 248-263.
- Bjorkelo, B., Einarsen, S. & Matthiesen, S.B., (2010). Predicting proactive behaviour at work: Exploring the role of personality as an antecedent of whistleblowing behaviour. *Journal of Occupational and Organizational Psychology*, 83, 371 -394.
- Crant, J. M., Kim, T. & Wang, J. (2011). Dispositional Antecedents of Demonstration and Usefulness of Voice Behavior. *J Bus Psychol*, 26, 285-297.
- Fuller, J.B., Marler, L.E., & Hester, K., (2006). Promoting felt responsibility for constructive change and proactive behavior: Exploring aspects of an elaborated model of work designy. *Journal of Organizational Behavior*, 27, 1089-1120
- Grant, A.M., & Ashford, S.J., (2008). The dynamics of proactivity at work. *Research in Organizational Behavior*, 28, 3-34
- Greguras, G.J., & Diefendorff, J.M., (2010). Why Does Proactive Personality Predict Employee Life Satisfaction and Work Behaviors? A field Investigation of the Mediating Role of the Self-Concordance Model. *Personnel Psychology*, 63, 539-560.
- Gudermann, M., (2010). The relationship between proactive personality, affective commitment and the role of job stressors. Bachelor Thesis.
- Gupta, V.K., & Bhawe, N.M., (2007). The Influence of Proactive Personality and Stereotype Threat on Women's Entrepreneurial Intentions. *Journal of Leadership and Organizational Studies*, 13(4), 73-85.
- Hashemi, S.M.K., Nadi, H.K., Hosseini, S.M., & Rezvanfar, A., (2012). Agricultural Personnel's Proactive Behavior: Effects of Self efficacy Perceptions and Perceived Organizational Support. *International Business and Management*, 4(1), 83-91.
- Kamp, E.V. (2010). Is proactive behavior reciprocal? A study on organizational support, affective commitment, personality and proactive behavior. *Bachelor Thesis Organization & Strategy*, Tilburg University.
- Krishnan J., & Mary, V.S., (2012). Perceived organisational support – an overview on its antecedents and consequences. *International Journal of Multidisciplinary Research*, 2(4), 1-13.
- Liang, J. & Tang, J. (2010). A Multi-Level Study on Employee Voice: Evidence from a Chain of Retail Stores. *Front. Bus. Res. China*, 4(4), 541-561.
- Major, D.A., Holland, J.M., & Oborn, K.L., (2012). The Influence of Proactive Personality and Coping on Commitment to STEM Majors. *The Career Development Quarterly*, 60, 16-24.
- Marler, L.E., (2008). Proactive Behavior: A Selection Perspective. *Published doctoral dissertation*, College Of Business Louisiana Tech University.
- Morrison, E. W. (2011). Employee Voice Behavior: Integration and Directions for Future Research. *The Academy of Management Annals*, 5 (1), 373-412.
- NG, T. W. H. & Feldman, D. C. (2012). Employee Voice Behavior: A meta-analytic Test of The Conservation of Resources Framework. *Journal of Organizational Behavior*, 33, 216-234.
- Nikolaou, I., Vakola, M. & Bourantas D. (2008). Who Speaks Up At Work? Dispositional Influences on Employees' Voice Behavior. *Personnel Review*, 37(6), 666-669.
- Parker, S.K., & Collins, C.G., (2010). Taking Stock: Integrating and Differentiating Multiple Proactive Behaviors. *Journal of Management* (In Press), Institute of Work Psychology University of Sheffield
- Parker, S.K., Bindl, U.K., & Strauss, K. (2010). Making Things Happen: A Model of Proactive Motivation. *Journal of Management* 36(4), 827-856.
- Ristig, K., (2008). An Empirical Investigation of the Relationship between Trust, Voice, and Proactive Personality. *European Journal of Economics, Finance and Administrative Sciences*, 14, 141-148.
- Seibert, S.E., Kraimer, M.L., & Crant, J.M., (2001). What Do Proactive People Do? A Longitudinal Model Linking Proactive Personality and Career Success. *Personnel Psychology*, 54, 845-874.
- Shumaila, S., Aslam, R., Sadaqat, S., Maqsood, S., & Nazir, S. (2012). Perceived Organizational Support as Predictor Of Organizational Commitment: A Comparative Study On Public And Private Sector Nurses. *Proceedings of 2nd International Conference*
- Wann-Yih, W., & Haik, S., (2011). The Impacts of perceived organizational support, job satisfaction, and organizational commitment on job performance in hotel industry. *The 11th International DSI and the 16th APDSI Joint Meeting, Taipei, Taiwan, July 12 – 16*.
- Waseem, M., (2010). Relative Importance of Pay Level Satisfaction, Career Development Opportunities, and Supervisor Support in Perceived Organizational Support. *Journal of Yasar University*, 3264 – 3277.
- Wong, C. A., Laschinger Spence, H. K. & Cummings, G. G. (2010). Authentic Leadership and Nurses' Voice Behaviour and Perceptions of Care Quality. *Journal of Nursing Management*, 18, 889-900.
- Yi, Z., (2010). The Relationship Between Organizational Authority-Control and Employees' Proactive Behaviour: The Moderating Role Of Individual Proactive Personality. *Published doctoral dissertation*, City University Of Hong Kong.
- Zagenczyk, T.J., (2001). A Social Influence Analysis of Perceived Organizational Support. *Published doctoral dissertation*, B.S., University of Pittsburgh.
- Zhou, J. & George, J. M. (2001). When Job Dissatisfaction Leads to Creativity: Encouraging the Expression of Voice. *The Academy of Management Journal*, 44 (4), 682-696.