

Examination of a Moderated-Mediation Model Linking
Perceived Organizational Support, Affective Commitment,
Organizational Citizenship Behavior and Work Engagement:
A Study of Nurses in the Indian Context

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**EXAMINATION OF A MODERATED-MEDIATION MODEL LINKING PERCEIVED ORGANIZATIONAL SUPPORT, AFFECTIVE COMMITMENT, ORGANIZATIONAL CITIZENSHIP BEHAVIOR AND WORK ENGAGEMENT:
A STUDY OF NURSES IN THE INDIAN CONTEXT**

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Abstract

The present study examines the relationship between Perceived Organizational Support (POS) and work outcomes (work engagement and organization citizenship behaviour) with affective commitment as a mediator and psychological contract breach as a moderator. Drawing from data collected among a sample of nurses (N = 475), we found that affective commitment mediates the positive relationships between POS and work outcomes. Moreover, perception of unfulfilled expectations (psychological contract breach) qualifies POS-work outcome relationships such that the relationships between POS and outcomes are stronger in case of low contract breach perceptions. Implications for theory and practice are discussed.

Keywords: Perceived organizational support; Affective commitment; Work engagement; Organizational citizenship behavior; Psychological contract breach.

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1. Introduction

According to the Deloit Global healthcare outlook report (2014), with an increase of aging population and those inflicted with chronic ailments, the health care costs in both the industrialized and emerging markets are escalating. Since a nation's health and its development are strongly linked (Bloom, Canning, & others, 2000), enhancing healthcare services has become a global concern and governments and health care leaders of the developed and developing countries alike are looking for ways to boost health care service efficiency-caring for more people, with better results, at a lower cost (McKinsey, 2014). Human resources of a firm are sources of competitive advantage (Wright, McMahan, & McWilliams, 1994). Especially in 'human work' occupations such as the nursing profession that are physically and emotionally demanding, employees play a central role in delivering efficient services and timely management of all aspects of the healthcare system (Blegen, 1993; Aiken et al., 2001).

The nature of tasks of the nurses is highly complex and uncertain, and depends not so much on standardized rules but on situational requirements (McQueen, 2004; Demerouti, Bakker, Nachreiner, & Schaufeli, 2004). Emotionally charged interactions of frequent and long duration, high stress, heavy workload and enormous pressures have been found to result in burnout among nurses (Maslach & Jackson, 1981; Pines & Aronson, 1988; Le Blanc, Bakker, Peeters, Van Heesch, & Schaufeli, 2001). Despite these challenging work situations, the nature of their jobs entails nurses to be deeply involved in their work roles, maintain trusting

relationships, empathizing concern for patients and providing attentive care that fosters patients' well-being (Maslach & Jackson, 1981).

With increasing need to attract and retain committed and engaged health care workers, in recent years there has been renewed academic focus on understanding factors that affect the well-being of nurses and kindle work behaviours such as employee engagement (Saks, 2006) and Organization Citizenship Behaviour (OCB) (Toode, Routasalo, and Suominen, 2011). Both work engagement and OCB are considered as prosocial behaviors that are discretionary in nature, not directly or explicitly recognized by the formal reward system, and that in aggregate promotes the effective functioning of the organization (A. B. Bakker, Hakanen, Demerouti, & Xanthopoulou, 2007; N. P. Podsakoff, LePine, & LePine, 2007a)(Bakker and Demerouti, 2007, 2008; (N. P. Podsakoff, LePine, & LePine, 2007b). Perceived organizational support (POS) defined as employees "global beliefs concerning the extent to which the organization values their contributions and cares about their well-being" (Eisenberger, Huntington, Hutchison, & Sowa, 1986: 501) is viewed as central in understanding of job-related attitudes and behaviours of employees. Although the effects of POS on engagement (Agarwal, 2014; Kinnunen, Feldt, & Mäkikangas, 2008; Rich, Lepine, & Crawford, 2010; Saks, 2006) and OCB (Islam, Ahmad, Ahmed, & others, 2014; Nisar, Marwa, Ahmad, & Ahmad, 2014; Farh, Hackett, and Liang, 2007; Shen et al., 2014) are well documented, there are two major concerns that require further research. First, much of the research on POS has adopted a direct or main effect approach with limited attention given to the mechanisms that underlie the positive relationship between POS and work-related outcomes (Armeli, Eisenberger, Fasolo, and Lynch, 1998). Second, the results of research studies have been inconclusive (Riggle, Edmondson, and Hansen, 2009). While some studies have found a strong, positive relationship between POS and employee performance

(Babakus et al., 1996; Eisenberger et al., 1990; Randall et al., 1999; Whitener, 2001), others have found the relationships to be weak (e.g., Blau, 1964; Coyle-Shapiro & Kessler, 2000; Stinglhamber & Vandenberghe, 2003), or even negative (e.g., Cropanzano et al., 1997; Masterson et al., 2000).

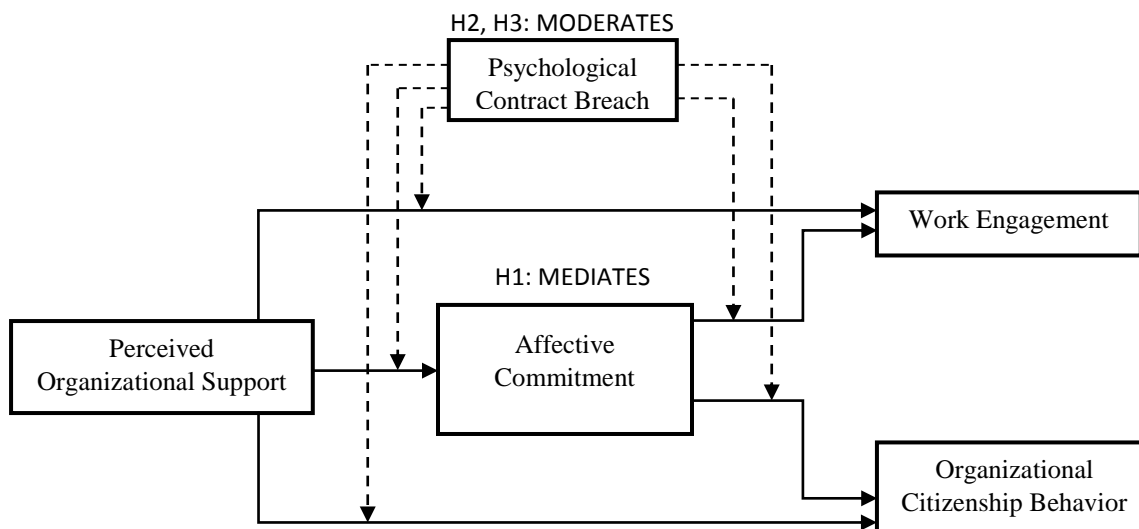
To address the above mentioned literature gaps, drawing from the Job Demands-Resources theory (JD-R) (Demerouti et al., 2001), in the present study we build a moderated mediation process model linking POS to work engagement and OCB.. The JD-R theory posits that job resources, due to their (intrinsic and extrinsic) motivational potential, foster affective reactions that, in turn, affect employee attitudes and behaviours. Following this line of logic and given the established link between affective commitment (AC) (Allen and Meyer, 1996) with POS and behavioral outcomes we hypothesize that affective commitment will mediate the relationships between POS and OCB, and between POS and work engagement. .

Building on Aselage and Eisenberger (2003) suggestion of the potential of quality of employment relationship to moderate the POS-outcomes relationship, this paper examines the role of psychological contract breach (PCB) as a moderator of the relationships between POS and the outcome variables. Psychological contract breach has been defined as the cognitive evaluations of employees about their organizations' failures to fulfil the promised obligations, implicit and explicit, agreed in the employment relationship (Morrison and Robinson, 1997). Perceived betrayal or breach may initiate a process whereby resources associated with organizations support are threatened or lost. The generated stressful state might also result in a decrease in the psychological bond employees share with their organizations which affects work outcomes.

The present study advances research and practice in several ways. First, it integrates the literature on POS with job behaviors and attitudes in a healthcare (nursing) context. This is an area that has the potential to improve the effectiveness of healthcare organizations seeking to increase the strength and performance of their people management initiatives. Second, the study extends previous studies by incorporating psychological contract breach as a moderator of the effects of POS on affective commitment, OCB and work engagement of nurses. To the best of our knowledge, the present study is the first to examine how POS differentially influences work behavior and attitudes through the mediational process of affective commitment, conditional on perceptions of PCB.

The paper is structured as follows. The next section discusses arguments leading to the hypotheses. The methods and results sections present details about the study sample, the measures used in the study and the data analyses performed. The final section discusses the main findings, the implications of the results for both theory and practice, the limitations of the research and the directions for future research. Figure 1 illustrates the hypothesized conceptual model.

FIGURE 1
Conceptual Model



2. Theoretical Background and Hypotheses

2.1. Mediating Role of Affective Commitment for the POS–Work Outcome Relationships

Organizational behavior scholars have examined the relational ties between organizational support and employee work outcomes. An employee's favourable assessment of organizations attitudes towards them serves as a necessary precursor to desirable behaviors (Riggle, Edmondson, & Hansen, 2009). Being valued by the organization can yield such benefits as approval and respect, pay and promotion, and access to information and other forms of aid needed to carry out one's job efficiently. Research evidence in a variety of different empirical studies and workplace contexts suggests that employees who perceive a high degree of organizational support display increased affective commitment (Cropanzano et al., 1997; Eisenberger et al., 1986; Rhoades and Eisenberger, 2002; Van Knippenberg and Sleebos, 2006), OCB (Moorman et al., 1998; Shore and Wayne, 1993), as well as engagement (Saks, 2006).

The theoretical arguments that are used to support such a relation are largely predicated on social exchange theory (Blau, 1964) and the inducements-contributions model (March & Simon, 1958). According to the norm of reciprocity, which is an important tenant of social exchange theory, when one party provides something to another, it expects the other party to reciprocate by providing some contributions in return (Blau, 1964). Individuals who perceive that they are valued and respected are likely to reciprocate by demonstrating high citizenship behaviours and engagement in their exchanges with the organization. The inducements–contributions model, posited by March and Simon (1958) suggests that organizations offer inducements to attract and

retain employees, while employees enhance organization effectiveness through high levels of performance in their jobs.

Although research on POS has been impressive, much of the efforts made have been to examine the direct effects of POS on work outcomes using the social exchange perspective. In this study, we address the existing gap in the literature by examining the indirect effects of POS on work engagement and OCB through affective commitment.

Drawing from JD-R theory (Arnold B. Bakker, Demerouti, & Dollard, 2008), we argue that POS can be conceived as an organizational resource that helps to fulfil important socio-emotional needs for positive self-esteem, approval, and affiliation (Armeli, Eisenberger, Fasolo, & Lynch, 1998). The perception of organizational support provides employees with important information about his/her relationship to the workplace (Shore & Shore, 1995). The feeling of being valued affirms an employee's value and informal standing as well as increases the organization's perceived attractiveness (Sluss, Klimchak, & Holmes, 2008). This also leads a sense of identification with, involvement in, and emotional attachment to the organization, called as affective commitment (Allen & Meyer, 1996: 253). Prior research studies (Casimir, Ng, Wang, & Ooi, 2014; Eisenberger, Fasolo, & Davis-LaMastro, 1990; El Akremi, Colaianni, Portoghese, Galletta, & Battistelli, 2014; Rhoades, Eisenberger, & Armeli, 2001) have documented that employee's affective commitment to the organization is strongly influenced by their perceptions of the support organizations extend towards them. Defined as a "psychic kick of immersion, striving, absorption, focus and involvement" (Macey, Schneider, Barbera, & Young, 2009, p. 5), engagement is characterized by dedication, vigor and absorption (Schaufeli, Salanova, Gonzales-Roma and Bakker 2002; Schaufeli et al. 2006). OCB is defined as "individual behavior that is discretionary, not directly or explicitly recognized by the formal

reward system, and in the aggregate promotes the efficient and effective functioning of the organization” (Organ, 1988, p.4). In the present study, we argue that the positive effects of POS on work outcomes are brought about through affective commitment. Job resources such as POS initiate a process whereby employee’s psychological bond with organization are nourished, resulting in a willingness to go beyond the call of duty and be engaged. The mediating role of affective organizational commitment in the POS-outcome relationships appears plausible as prior research has documented a positive relationship between affective organizational commitment with work engagement (Meyer, Stanley, Herscovitch, & Topolnytsky, 2002), and with OCB (Kalliath et al., 1998; Lapointe, Vandenberghe, & Panaccio, 2011). Affective commitment appears to be a strong mechanism that mediates associations between POS and outcomes. Such a proposition also converges with contentions that POS predicts AC, that, in turn, predicts work engagement and OCB (Edwards & Peccei, 2010; Lavelle, Rupp, & Brockner, 2007; Marique, Stinglhamber, Desmette, Caesens, & De Zanet, 2012). Based on the above arguments, we hypothesize:

H1a. *Affective commitment mediates the positive influence of perceived organizational support (POS) on organization citizenship behavior (OCB).*

H1b. *Affective commitment mediates the positive influence of perceived organizational support (POS) on work engagement.*

2.2. The Moderating role of Psychological Contract Breach

Rousseau (1989) has defined psychological contract (PC) as employees’ beliefs about the mutual obligations or the terms of the reciprocal exchange agreement that exists between themselves and their organizations. A core element in the psychological contract is employees’ belief that their organizations will fulfil their commitments. The extent to which employees feel that employers have met their obligations they perceive psychological contract fulfilment (PCF) (Parzefall & Hakanen, 2010). On the contrary, PCB refers to the cognitive evaluations of

employees about their organizations' failures to fulfil the promised obligations tacitly agreed on in the employment relationship (Morrison & Robinson, 1997; Robinson & Rousseau, 1994; Rousseau, 1995).

The present study argues that PCB not only affects work outcomes directly, but also indirectly by buffering the positive effects of job resources (in this case perceived organization support). The JD-R theory suggests that in addition to the main effects, job resources have buffering effects on job demands and work outcomes (Bakker, Hakanen, Demerouti, & Xanthopoulou, 2007). Conversely, we argue that job demands potentially buffer the positive effects of job resources on work outcomes. PCB can be conceived as a job 'demand' associated with stress experienced by employees (Maslach, Schaufeli & Leiter, 2001; Sutton, 1990). The perceptions of unfulfilled promises initiate a process of resource drain. Thus, it is likely that under high resource conditions (such as POS), high levels of job demands (PCB) will reduce the positive effects of job resources on work outcome (e.g., AC). Psychological contract breach instils a resource drain that assuages the positive effects of POS on AC and also alleviates the effects of psychological bond on work engagement and OCB.

The moderating effects of PCB on work outcomes can also be examined from the lens of organizational justice theory (Greenberg, 1993; Koh & El'Fred, 2001). According to justice theory, employees' perception of justice within the organizational system can control the extent to which positive work events affect their attitudes and behavior towards the organization (Blakely et al., 2005; Kim & Leung, 2007). Employees who perceive that their organizations fulfil their promises are more likely to feel that their organizations are fair, and this feeling of fairness can buffer them from the harmful effects of negative work events. Likewise, but conversely, feeling of unfairness can weaken the positive effects of workplace events.

Psychological breach is a form of injustice (Morrison & Robinson 1997; Rousseau 1995) and a source of resource drain that can impede the positive effects of POS as well as affective commitment. Perception of contract breach is likely to diminish the sense of care and support among the employees, thereby, influencing negatively their perceptions of the quality, or the state of the employment relationship (Guest, 2004). Based on the above arguments, we hypothesize:

H2. Psychological contract breach will moderate the strength of the mediated relationship between perceived organizational support with organizational citizenship behavior via affective commitment, such that the relationship will be stronger under low psychological contract breach than under high psychological contract breach.

H3. Psychological contract breach will moderate the strength of the mediated relationship between perceived organizational support with work engagement via affective commitment, such that the relationship will be stronger under low psychological contract breach than under high psychological contract breach.

3. Method

3.1. Sample and Data collection

The data for this study was collected from nine private hospitals in India, after obtaining consent from their Human Resource departments. The objective of this study was shared with nurses who volunteered to be part of this study were assured of confidentiality of their responses. The final sample comprised of 475 valid responses, out of the 700 distributed questionnaires, yielding a valid response rate of 63.3%. Of the 475 respondents, 11 percent were males and 89 percent were females. Thirty-six percent had bachelor's degree and 64 percent had post-graduation degree. The average age of respondents was 26.5 years and their average job tenure was 4.2 years.

3.2. Measures

The specific measures used in the study are described below, along with the results of the confirmatory factor analyses (CFA) for each measure.

3.2.1. *Perceived Organizational Support (POS)*

To measure POS, we followed Eisenberg et al. (1990) and used eight items with the highest factor loading from the original 36-item scale developed by Eisenberger et al. (1986). A sample item of the scale was “the organization strongly considers my goals and values”. The scale demonstrated an internal consistency (alpha) reliability of .86 in the current study. Due to low loadings, two items were dropped. The model consisting of 6 items and one latent POS factor showed very good fit with the data ($\chi^2[5] = 7.34$, $p = .20$; GFI = 1.00; TLI = 1.00; CFI = 1.00; RMSEA = .03).

3.2.2. *Organization Citizenship Behaviour (OCB)*

A wide variety of OCB have been identified such as OCB directed at coworkers and supervisors, OCB directed at organization, boosterism, civic virtue, courtesy, sportsmanship, compliance, altruism, and social participation. In this study we used the 7-item OCB scale developed by Podsakoff, MacKenzie, Moorman, and Fetter (1990). Sample items of the scale were “I make an effort to keep abreast of current developments in my hospital” and “I frequently make suggestions to improve work of my team/department”. The alpha reliability of the scale was .91. The model consisting of 7 items and one latent OCB factor showed very good fit with the data ($\chi^2[5] = 7.44$, $p = .19$; GFI = .99; TLI = .99; CFI = .99; RMSEA = .03).

3.2.3. *Affective Organizational Commitment (AC)*

Affective commitment was measured using 6-item scale developed by Meyer, Allen and Smith (1993). A sample item of the scale was “I really feel as if this organization's problems are my own”. The alpha reliability of the scale was .79. Model consisting of six items and one latent AC factor showed very good fit with the data ($\chi^2[6] = 4.65$, $p = .59$; GFI = 1.00; TLI = 1.00; CFI = 1.00; RMSEA = .00).

3.2.4. Psychological Contract Breach (PCB)

PCB was measured by the four items adapted from Rousseau (2000). Sample items of the scale were “Almost all the promises made by my employer during recruitment have been kept so far” (reverse scored) and “I have not received everything promised to me in exchange for my contributions.” The alpha reliability of the scale was .83. The five items and one latent PCB factor showed very good fit with the data ($\chi^2[1] = 2.86, p = .09$; GFI = 1.00; TLI = .99; CFI = 1.00; RMSEA = .06).

3.2.5. Work Engagement (WE)

Work engagement was measured with the nine-item version of the Utrecht Work Engagement Scale (UWES) (Schaufeli et al., 2006). Sample items included “at my job, I feel strong and vigorous” (vigor), “when I am working, I lose track of time” (absorption), and “my job inspires me” (dedication). Model consisting of three first-order factors (vigor, dedication, absorption) showed strong interrelationships between the first-order factors (average $r = .90$) suggesting the presence of a higher-order common factor. Consequently, another model was specified consisting of the first-order dimensions plus one second-order factor labeled as *work engagement (WE)*. The model showed very good fit with the data ($\chi^2[11] = 14.18, p = .22$; GFI = .99; TLI = 1.00; CFI = 1.00; RMSEA = .02). The alpha reliability of the scale was .90.

3.2.6. Control Variables

We controlled for demographic variables (age, gender, education qualification and job tenure). Age was measured as a continuous variable. Gender was modeled as a categorical variable. Education was measured as an ordinal variable. Job tenure was measured as years in service and was modeled as a continuous variable.

3.3. Discriminant Validity, Convergent Validity and Common Method Bias

Following recommendation of Podsakoff, MacKenzie, Lee, & Podsakoff, 2003), antecedents were separated from outcomes in the survey, and respondents were ensured anonymity and confidentiality of their responses. To verify whether these procedures successfully reduced shared method variance, we estimated the measurement model with and without an additional orthogonal latent method factor related to all items. Measurement model consisting of only the study variables (POS, OCB, AC, PCB and WE) showed very good fit with the data ($\chi^2[332] = 766.20$, $p < .01$; $\chi^2/df = 2.31$; GFI = .91; TLI = .95; CFI = .96; RMSEA = .05). The measurement model consisting of study variables along with a common method factor showed fit ($\chi^2[331] = 908.59$, $p < .01$; $\chi^2/df = 2.75$; GFI = .89; TLI = .93; CFI = .94; RMSEA = .06) that was significantly poor than the hypothesized measurement model ($\Delta\chi^2[1] = 142.49$, $p < .001$). The average variance extracted by the method factor was about 14%, which was less than the average contamination of about 20-40% found to be present in studies using attitude measures in applied psychology literature (Podsakoff et al., 2003; Williams, Cote, & Buckley, 1989)

The convergent and discriminant validity of the perceptual variables were tested through CFA. Table 1 presents the descriptive statistics and inter-correlations between study variables.

TABLE 1
Descriptive Statistics and Inter-Construct Correlations

	M	SD	1	2	3	4	5	6	7	8	9
1. Age	26.53	7.37	--								
2. Gender	1.11	.31	.03	--							
3. Education	.64	.48	.24**	-.12**	--						
4. Tenure	4.2	6.47	.95**	.02	.26**	--					
5. Perceived Organizational Support	4.84	1.20	.14**	-.03	.07	.17**	(.93)				
6. Affective Commitment	5.01	1.20	.32**	.02	.10*	.35**	.64**	(.81)			
7. Psychological Contract Breach	2.48	.69	-.04	.01	-.04	-.11*	-.52**	-.27**	(.84)		
8. Organizational Citizenship Behavior	4.72	.98	.22**	.02	.15**	.26**	.46**	.51**	-.32**	(.90)	
9. Work Engagement	4.87	.98	.24**	.01	.12*	.25**	.42**	.53**	-.24**	-.70**	(.95)

Composite reliability for each construct (nos. 5-9) is provided in parentheses along the diagonal; Values below the diagonal are inter-construct correlations.

** $p < .01$ (two-tailed); * $p < .05$ (two-tailed); $N = 475$

The results in Table 1 point to desirable psychometric properties of the subjective measures. In particular, Cronbach alpha and composite reliability values were well above the suggested minimum value of .70 (Anderson & Gerbing, 1988; Nunnally & Bernstein, 1994). We examined the discriminant validity between the latent constructs by applying the Anderson and Gerbing (1988) test. We compared the hypothesized measurement model with the model where the correlation between the constructs is constrained to unity. The χ^2 -difference test was significant ($\Delta\chi^2[11] = 1245.14, p < .001$) suggesting that the correlation between the constructs significantly differed from 1. While the results of these analyses do not preclude the possibility of common method variance, they do suggest that common method variance is not of a great concern and thus is unlikely to confound the interpretations of the study results

4. Results

4.1. Hypotheses Testing

We used hierarchical multiple regressions to test Hypotheses 1a and 1b, and hierarchical moderated regressions to test Hypotheses 2 and 3. In all analyses, we entered the control variables. We also centred the psychological contract breach and perceived organizational support variables to avoid multicollinearity with their product terms. All the regression analyses were performed using SPSS 22.

Hypothesis 1 proposed that affective commitment mediates the relationship for perceived organizational support with organizational citizenship behavior (Hypothesis 1a), and with work engagement (Hypothesis 1b). According to Baron and Kenny (1986), four conditions are necessary to establish mediation: (1) the independent and mediating variables must be significantly related; (2) the independent and dependent variables must be significantly related; (3) the mediator and dependent variable must be significantly related; and (4) the relationship

between the independent variable and dependent variable should be non-significant or weaker when the mediator is added. The regression results for testing mediation are reported in Table 2.

TABLE 2
Regression Results for Testing Mediation in Hypothesis 1

	Affective Commitment	OCB			Engagement		
		Step1	Step2	Step3	Step1	Step2	Step3
Age	.05	-.21	-.26*	-.22	.14	.11	.13
Gender	.04	.04	.02	.03	.02	.004	.01
Education	-.001	.08	.08*	.08	.05	.06	.05
Job Tenure	.20	.36**	.32*	.30*	.03	-.04	-.05
Perceived Organizational Support	.60**	.43**		.24**	.39**		.14**
Affective Commitment			.48**	.32**		.51**	.41**
Adjusted R ²	.46	.25		.30	.20		.29
Δ Adjusted R ²	.46	.25		.05	.20		.09
F	81.91**	32.95**		35.73**	25.24**		33.86**

OCB = Organizational Citizenship Behavior
N = 475; **p < .01, * p < .05

Results in the second column of Table 2 show that, after controlling for demographic variables, POS was positively related to affective commitment ($\beta = .60$, $p < .01$). Thus, Condition 1 was supported. Results in the third and the sixth columns show that POS was significantly related to OCB ($\beta = .43$, $p < .01$), and to work engagement ($\beta = .39$, $p < .01$). Condition 2 for mediation was, thus, supported. Results in the fourth and the seventh columns demonstrate that affective commitment was positively related to OCB ($\beta = .48$, $p < .01$) and to work engagement ($\beta = .51$, $p < .01$), thus, supporting Condition 3. Further, results show that, after affective commitment was taken into account, the effects of POS (.24, $p < .01$; .14, $p < .01$) became weaker, albeit still significant, which suggests partial mediation.

To further assess the significance of the mediation, we applied Sobel's (1982) test for indirect effects. Results show that the intervening effect of affective commitment for POS-OCB relationship (standardized indirect effect = .19, Sobel $t = 5.80$, $p < .01$), and for POS-engagement relationship (standardized indirect effect = .25, Sobel $t = 7.09$, $p < .01$) were significant. Taken together, Hypotheses 1a and 1b were supported.

Moderated mediation is demonstrated when the conditional indirect effect of POS on OCB and work engagement, via affective commitment, differs in strength across low and high levels of PCB. To assess moderated mediation, we first tested the four conditions suggested by Ng, Ang and Yoon (2008): (1) significant effects of POS on OCB and work engagement; (2) significant interactions between POS and PCB in predicting affective commitment; (3) significant effect of affective commitment on OCB and work engagement; and (4) different conditional indirect effect of POS on OCB and work engagement, via affective commitment, across low and high levels of PCB. The last condition is the essence of moderated mediation and establishes whether the strength of the mediation via affective commitment differs across the levels of the moderator (Hayes, 2013; Ng et al., 2008).

Our results for Hypothesis 1, which demonstrated that POS was significantly related to OCB and work engagement, supported Condition 1 for moderated mediation. To test for Condition 2, we first examined whether the interaction of POS and PCB was significant in predicting affective commitment. Results of the moderated regressions of PCB on affective commitment, OCB and work engagement, organized by POS and affective commitment, are presented in Table 3.

TABLE 3
Regression Results for Testing Moderation for Affective Commitment, OCB and Engagement

	Affective Commitment (AC)		OCB		Engagement	
	Step1	Step2	Step1	Step2	Step1	Step2
Age	-.01	.03	-.12	-.16	.19	.17
Gender	.04	.02	.02	.03	.01	.01
Education	-.002	.01	.08*	.07	.06	.05
Job Tenure	.26	.21	.19	.22	-.13	-.10
POS	.64	.68**				
PCB	.09	.09*				
POS x PCB		-.16**				
AC			.43**	.44**	.48**	.48**
PCB			-.18	.18**	-.12**	-.12**
AC x PCB				.11**		.07***
Adjusted R ²	.46	.49	.30	.31	.29	.30
Δ Adjusted R ²	.46	.03	.30	.01	.29	.01
F	69.68**	65.29**	35.03**	31.75**	33.76**	29.62**

N = 475; *** p < .01; **p < .05, * p < .10

Table 3 shows that the interaction terms for POS with PCB ($\beta = -.16$, $p < .01$) was significant in predicting affective commitment. Results presented in the fifth column of Table 3 show that PCB interacted with affective commitment ($\beta = .11$, $p < .01$) in predicting OCB. For work engagement, the interaction term between affective commitment and PCB ($\beta = .07$) was significant at 10% level of significance. Taken together, Condition 2 was satisfied. Condition 3 was supported by our results for Hypothesis 1, in which affective commitment was positively related to OCB and work engagement. Hence, results based on the first three conditions indicated that PCB could moderate the mediation for POS-OCB and POS-work engagement relationships.

To further validate findings of moderated mediation relationships, we examined Condition 4, which requires the magnitude of the conditional indirect effect of the POS via

affective commitment to be different across different of PCB. We used Hayes (2013) PROCESS macro for SPSS to compute the conditional indirect effects. We tested moderated mediation separately for POS-OCB and for POS-work engagement relationships. We operationalized high and low levels of PCB as one standard deviation above and below its mean score. Table 4 presents the estimates, standard errors, and bootstrap confidence intervals for the conditional indirect effects of POS across low and high levels of PCB.

TABLE 4
Moderated Mediation Results for Perceived Organizational Support across Levels of Psychological Contract Breach

Moderator (Value)	Conditional Indirect Effect	Bootstrap SE	Bootstrap LLCI	Bootstrap ULCI
<i>Dependent Variable = Organizational Citizenship Behavior; Mediator = Affective Commitment</i>				
1.80	.20	.04	.12	.29
2.49	.17	.04	.11	.25
3.18	.14	.03	.08	.20
<i>Dependent Variable = Work Engagement; Mediator = Affective Commitment</i>				
1.80	.27	.04	.19	.35
2.49	.22	.03	.16	.30
3.18	.18	.03	.13	.25

Number of bootstrap samples = 2000; Level of confidence = 95%
LLCI = Lower Level of Confidence Interval; ULCI = Upper Level of Confidence Interval; SE = Standard Error

Results show that the conditional indirect effects of POS on both OCB and work engagement were stronger and significant in the low PCB condition but were weaker (and significant) in the high PCB. Thus, hypotheses 2 and 3 were supported.

5. Discussion

5.1. Theoretical Contributions

The study makes multiple contribution to literature. First, the study provides us with a deeper understanding about the role of organizational contexts in impacting attitudes and behaviors. The association between POS and AC, as well as WE and OCB, supported the conjecture that AC is a direct response to POS, an antecedent of OCB and engagement and an explanatory variable for the effect of POS on work engagement, and on OCB. Enjoying support from their organizations is likely to foster emotional bonding and identity with the organization (Fuller et al., 2006). When people feel that their organization values and appreciates them (i.e., POS), it is a sign of organizational respect for them or high status within the organization that enhances their emotional bond with the organization (Tyler, 1999). Based on the norm of reciprocity, POS is likely to create felt obligation about organization's welfare and motivate employees to work towards achievement of organizational goals. The mediation effect of AC on the POS-outcome relationship contributes to the literature by showing that employees' positive job experiences can promote their emotional and attitudinal responses, that then result in their positive work behaviors, a sequence of influence that corroborates with the commonly assumed job experience–attitude–behavior sequence of relationship (Zhao et al., 2007).

Second, the results of this study demonstrate the potential of perceived quality of relationship, measured through PCB, in influencing the effects of POS and AC (Aselage and Eisenberger, 2003). In a state of perceived contract breach, employees may tend to weaken the psychological bonds they share with their organizations, perhaps as an important self-protection mechanism that may prevent their future frustration (cf. Antonovski, 1987; Hackman & Oldham, 1976, 1980). The stress caused as a result of PCB undermines the sense of belief employees have

on the organization that it can take care and support them, thereby, assuaging the indirect positive effects of POS on work outcomes through AC. The interplay of PCB with POS and affective organizational commitment has by far remained poorly understood. Our finding of a moderating influence of PCB provides us with a new understanding about the relationship between perceived support from organization and organizational commitment. By examining the qualifying role of PCB in POS-work outcome relationship, the results of the study add to the existing body of literature on POS suggesting its effects on work outcomes is seldom likely to be similar across different organizational contexts (Shen, Jackson, Ding, Yuan, Zhao, Dou, and Zhang, 2014; Riggle, Edmondson, and Hansen, 2009; Hutchison, Sowa, Eisenberger, and Huntington, 1986; Settoon, Bennett, and Liden, 1996; Wayne, Shore, and Liden, 1997).

Third, this study investigates these relationships from the lenses of JD-R model as it may be particularly relevant in the present context since nurses are confronted with high job demands and resources play an important role in kindling extra-role behaviors. Research on POS and work outcomes has been largely based on the social exchange theory (Demerouti, Bakker, Nachreiner, and Schaufeli, 2001; Schaufeli and Bakker, 2004) but has neglected the possibility of examining relationships using other theoretical approaches such as job demands–resources (JD-R) model (Bakker and Demerouti, 2007; Demerouti, Bakker, Nachreiner, and Schaufeli, 2001).

Fourth, the study significantly contributes in terms of its sample. Examining motivational mechanisms of healthcare workers, especially nurses who play a crucial role in healthcare management has emerged as an important research agenda (Motowidlo, Packard, & Manning, 1986). While there are many studies focusing on the management of the healthcare sector, efforts to examine organizational behavior of healthcare workers have been limited. The results of this study how POS exerts its influence on work related outcomes, as well as the importance of

taking organizational contexts such as perceptions of breach into consideration when making sense of the influence of perception of support, commitment, engagement and citizenship behaviors among nurses.

5.2. Practical Implications

The study has important managerial implications. The associations between POS, affective commitment and work outcomes suggests that perceived support from the organization can play an important role in enhancing employee prosocial behaviour. Building a supportive work environment is an effective ways of increasing psychological bonding and enhancing work related behavioural and attitudinal consequences which are beneficial to organizational performance.

Organizations may inadvertently fail to meet the expectations of their employees concerning the employment relationship, resulting in a sense of insecurity and poor confidence in organizational intention. Breach of expectations can induce a perception of organizational injustice that will harm the quality of employment relationship and damage organizational performance. Absence of clear expectations over contract elements conveyed to employees has been recognized as one of the potential causes of PCB. As a policy implication, during recruitment process caution needs to be exercised in conveying promises to the job applicants and clearly establish the parameters and conditions of employment during recruitment. Organizations can make realistic job previews (RJP) an important part of their recruitment strategy. RJP accurately depict the behaviors expected within the specific position on entry into the organization, lower grandiose expectations, thereby improving the fit between individual's expectations and organizational ability (Ilgen & Seely, 1974). Moreover, organizations should

focus employee's attention on the most important terms of the deal and promote a common frame of reference. By doing so, they would enable applicants to make a more informed choice about whether or not to acceptant offer of employment (Wanous & Reichers, 2000), thus reducing the probability of unmet promises.

5.3.Limitations and Future Research

Although this study makes significant contributions to theory and practice, like most studies, suffers from some limitations. First, the research was conducted in a single, occupational group-nurses, in India. Generalization of these findings to other vocations or societies should be made with caution. Further, the cross-sectional design of the present study does not allow us to determine the direction of causality among the variables. This limitation means that the arrows that are depicted in Figure 1 should not be interpreted as causal relations but as associations that might suggest a certain causal ordering that should be confirmed in future longitudinal research. Only longitudinal research can adequately disentangle cause and effect in the variables. Finally, our results may partly be influenced by common method variance because all data were collected through self-report. Future research should replicate the findings of this study, ideally, on outcomes measured through methods other than self-report.

References

- Agarwal, U. A. (2014). Linking justice, trust and innovative work behaviour to work engagement. *Personnel Review*, 43(1), 41-73.
- Aiken, L. H., Clarke, S. P., Sloane, D. M., Sochalski, J. A., Busse, R., Clarke, H., & Shamian, J. (2001). Nurses' reports on hospital care in five countries. *Health Affairs*, 20(3), 43-53.
- Allen, N. J., & Meyer, J. P. (1996). Affective, continuance, and normative commitment to the organization: An examination of construct validity. *Journal of Vocational Behavior*, 49(3), 252-276.
- Anderson, J. C., & Gerbing, D. W. (1988). Structural equation modeling in practice: A review and recommended two step approach. *Psychological Bulletin*, 103, 411-423.
- Antonovski, A. (1987). *Unraveling the mystery of health*. Jossey Bass Inc. Publishers, San Francisco, CA.
- Armeli, S., Eisenberger, R., Fasolo, P., & Lynch, P. (1998). Perceived organizational support and police performance: the moderating influence of socioemotional needs. *Journal of Applied Psychology*, 83(2), 288.
- Aselage, J., & Eisenberger, R. (2003). Perceived organizational support and psychological contracts: A theoretical integration. *Journal of Organizational Behavior*, 24(5), 491-509.
- Babakus, E., Cravens, D. W., Grant, K., Ingram, T. N., & LaForge, R. W. (1996). Investigating the relationships among sales, management control, sales territory design, salesperson performance, and sales organization effectiveness. *International Journal of Research in Marketing*, 13(4), 345-363.
- Baron, R. M., & Kenny, D. A. (1986). The moderator–mediator variable distinction in social psychological research: Conceptual, strategic, and statistical considerations. *Journal of Personality and Social Psychology*, 51, 1173–1182.
- Bakker, A. B., & Demerouti, E. (2007). The job demands-resources model: State of the art. *Journal of Managerial Psychology*, 22(3), 309-328.
- Bakker, A. B., & Demerouti, E. (2008). Towards a model of work engagement. *Career Development International*, 13(3), 209-223.
- Baumeister, R.F., Bratslavsky, E., Finkenauer, C., Vohs, K.D. (2001). Bad is stronger than good. *Review of General Psychology*, 5: 323-370

- Blakely, G. L., Andrews, M. C., & Moorman, R. H. (2005). The moderating effects of equity sensitivity on the relationship between organizational justice and organizational citizenship behaviors. *Journal of Business and Psychology*, 20(2), 259-273.
- Blau, P. M. (1964). *Exchange and power in social life*. Transaction Publishers.
- Blegen, M. A. (1993). Nurses' job satisfaction: a meta-analysis of related variables. *Nursing Research*, 42(1), 36-41.
- Casimir, G., Ng, K., Wang, K., & Ooi, G. (2014). The relationships amongst leader-member exchange, perceived organizational support, affective commitment, and in-role performance: A social-exchange perspective. *Leadership & Organization Development Journal*, 35(2), 4-4.
- Coyle-Shapiro, J., & Kessler, I. (2000). Consequences of the psychological contract for the employment relationship: A large scale survey. *Journal of Management Studies*, 37(7), 903-930.
- Cropanzano, R., Howes, J. C., Grandey, A. A., & Toth, P. (1997). The relationship of organizational politics and support to work behaviors, attitudes, and stress. *Journal of Organizational Behavior*, 18(2), 159-180.
- Deloitte report (2014). Global health care outlook, Shared challenges, shared opportunities <https://www2.deloitte.com/content/dam/Deloitte/global/Documents/Life-Sciences-Health-Care/dttl-lshc-2014-global-health-care-sector-report.pdf>, downloaded on 10th Jan 2015.
- Demerouti, E., Bakker, A. B., Nachreiner, F., & Schaufeli, W. B. (2001). The job demands-resources model of burnout. *Journal of Applied Psychology*, 86(3), 499.
- Demerouti, E., Bakker, A.B., Nachreiner, F. and Schaufeli, W.B. (2001a). The job demands-resources model of burnout. *Journal of Applied Psychology*, 86, 499-512.
- Economist Intelligence Unit (2013). World Healthcare Outlook. Downloaded from <https://www2.deloitte.com/content/dam/Deloitte/global/Documents/Life-Sciences-Health-Care/dttl-lshc-2014-global-health-care-sector-report.pdf>, downloaded on 10th Jan 2015.

- Edwards, M. R., & Peccei, R. (2010). Perceived organizational support, organizational identification, and employee outcomes: Testing a simultaneous multifoci model. *Journal of Personnel Psychology, 9*(1), 17.
- Eisenberg, S. P., Evans, R. J., Arend, W. P., Verderber, E., Brewer, M. T., Hannum, C. H., & Thompson, R. C. (1990). Primary structure and functional expression from complementary DNA of a human interleukin-1 receptor antagonist. *Nature, 343*(6256), 341-346.
- Eisenberger, R., Fasolo, P., & Davis-LaMastro, V. (1990). Perceived organizational support and employee diligence, commitment, and innovation. *Journal of Applied Psychology, 75*(1), 51.
- Eisenberger, R., Huntington, R., Hutchison, S., & Sowa, D. (1986). Perceived organizational support.
- El Akremi, A., Colaianni, G., Portoghese, I., Galletta, M., & Battistelli, A. (2014). How organizational support impacts affective commitment and turnover among Italian nurses: a multilevel mediation model. *The International Journal of Human Resource Management, 25*(9), 1185-1207.
- 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 design. *Journal of Organizational Behavior, 27*(8), 1089-1120.
- Greenberg, J. (1990). Organizational justice: Yesterday, today, and tomorrow. *Journal of Management, 16*(2), 399-432.
- Guest, D. E. (2004). The psychology of the employment relationship: an analysis based on the psychological contract. *Applied Psychology, 53*(4), 541-555.
- Hackman, J. R., & Oldham, G. R. (1976). Motivation through the design of work: Test of a theory. *Organizational Behavior and Human Performance, 16*(2), 250-279.
- Hackman, J. R., & Oldham, G. R. (1980). Work redesign.
- Hancock, P. (1999). Reflective practice—using a learning journal. *Nursing Standard, 13*(17), 37-40.
- Hayes, A. F. (2013). *Introduction to mediation, moderation, and conditional process analysis: A regression-based approach*. New York, NY: Guilford Press.

- Hutchison, S., Sowa, D., Eisenberger, R., & Huntington, R. (1986). Perceived organizational support. *Journal of Applied Psychology*, 71(3), 500-507.
- Islam, T., Ahmad, U. N. U., & Ahmed, I. (2014). Exploring the relationship between POS, OLC, job satisfaction and OCB. *Procedia-Social and Behavioral Sciences*, 114, 164-169.
- Kalliath, T. J., O'driscoll, M. P., & Gillespie, D. F. (1998). The relationship between burnout and organizational commitment in two samples of health professionals. *Work & Stress*, 12(2), 179-185.
- Kim, T. Y., & Leung, K. (2007). Forming and reacting to overall fairness: A cross-cultural comparison. *Organizational Behavior and Human Decision Processes*, 104(1), 83-95.
- Lavelle, J. J., Rupp, D. E., & Brockner, J. (2007). Taking a Multifoci Approach to the Study of Justice, Social Exchange, and Citizenship Behavior: The Target Similarity Model. *Journal of Management*, 33(6), 841-866.
- Le Blanc, P. M., Bakker, A. B., Peeters, M. C., van Heesch, N. C., & Schaufeli, W. B. (2001). Emotional job demands and burnout among oncology care providers. *Anxiety, Stress and Coping*, 14(3), 243-263.
- March, J. G., & Simon, H. A. (1958). Organizations.
- Maslach, C., & Jackson, S. E. (1984). Patterns of burnout among a national sample of public contact workers. *Journal of Health and Human Resources Administration*, 189-212.
- Maslach, C., Schaufeli, W. B., & Leiter, M. P. (2001). Job burnout. *Annual Review of Psychology*, 52(1), 397-422.
- Masterson, S. S., Lewis, K., Goldman, B. M., & Taylor, M. S. (2000). Integrating justice and social exchange: The differing effects of fair procedures and treatment on work relationships. *Academy of Management Journal*, 43(4), 738-748.
- Mckinsey (2014). State of health. Downloaded from http://www.mckinsey.com/client_service/public_sector/mckinsey_center_for_government/health_care, downloaded on 10th January, 2014.
- McQueen, A. C. (2004). Emotional intelligence in nursing work. *Journal of Advanced Nursing*, 47(1), 101-108.
- Meyer, J. P., Allen, N. J., & Smith, C. A. (1993). Commitment to organizations and occupations: Extension and test of a three-component conceptualization. *Journal of Applied Psychology*, 78(4), 538.

- Meyer, J. P., Stanley, D. J., Herscovitch, L., & Topolnytsky, L. (2002). Affective, continuance, and normative commitment to the organization: A meta-analysis of antecedents, correlates, and consequences. *Journal of Vocational Behavior*, 61(1), 20-52.
- Moorman, R. H., Blakely, G. L., & Niehoff, B. P. (1998). Does perceived organizational support mediate the relationship between procedural justice and organizational citizenship behavior?. *Academy of Management Journal*, 41(3), 351-357.
- Morrison, E. W., & Robinson, S. L. (1997). When employees feel betrayed: A model of how psychological contract violation develops. *Academy of Management Review*, 22(1), 226-256.
- Morrison, E. W., & Robinson, S. L. (1997). When employees feel betrayed: A model of how psychological contract violation develops. *Academy of Management Review*, 22(1), 226-256.
- Motowidlo, S. J., Packard, J. S., & Manning, M. R. (1986). Occupational stress: its causes and consequences for job performance. *Journal of Applied Psychology*, 71(4), 618.
- Ng, K.-Y., Ang, S., & Chan, K.-Y. (2008). Personality and leader effectiveness: A moderated mediation model of leadership self-efficacy, job demands, and job autonomy. *Journal of Applied Psychology*, 93, 733-743.
- Nunnally, J. C., & Bernstein, I. H. (1994). *Psychometric Theory* (3rd ed.). New York: McGraw-Hill.
- Nisar, Q. A., Marwa, A., Ahmad, U., & Ahmad, S. (2014). Impact of Perceived Organizational Support on Organizational Citizenship Behavior: Empirical Evidence from Pakistan. *International Journal of Research*, 1(5), 231-240.
- Organ, D. W. (1988). *Organizational citizenship behavior: The good soldier syndrome*. Lexington Books/DC Heath and Com.
- Parzefall, M. R., & Hakanen, J. (2010). Psychological contract and its motivational and health-enhancing properties. *Journal of Managerial Psychology*, 25(1), 4-21.
- Podsakoff, P. M., MacKenzie, S. B., Moorman, R. H., & Fetter, R. (1990). Transformational leader behaviors and their effects on followers' trust in leader, satisfaction, and organizational citizenship behaviors. *The Leadership Quarterly*, 1(2), 107-142.
- Randall, M. L., Cropanzano, R., Bormann, C. A., & Birjulin, A. (1999). Organizational politics and organizational support as predictors of work attitudes, job performance, and

- organizational citizenship behavior. *Journal of Organizational Behavior*, 20(2), 159-174.
- Rhoades, L., & Eisenberger, R. (2002). Perceived organizational support: a review of the literature. *Journal of Applied Psychology*, 87(4), 698.
- Rhoades, L., Eisenberger, R., & Armeli, S. (2001). Affective commitment to the organization: the contribution of perceived organizational support. *Journal of Applied Psychology*, 86(5), 825.
- Rich, B. L., Lepine, J. A., & Crawford, E. R. (2010). Job engagement: Antecedents and effects on job performance. *Academy of Management Journal*, 53(3), 617-635.
- Riggle, R. J., Edmondson, D. R., & Hansen, J. D. (2009). A meta-analysis of the relationship between perceived organizational support and job outcomes: 20 years of research. *Journal of Business Research*, 62(10), 1027-1030.
- Robinson, S. L., & Morrison, E. W. (2000). The development of psychological contract breach and violation: A longitudinal study. *Journal of Organizational Behavior*, 21(5), 525-546.
- Robinson, S. L., & Morrison, E. W. (2000). The development of psychological contract breach and violation: A longitudinal study. *Journal of Organizational Behavior*, 21(5), 525-546.
- Robinson, S. L., & Rousseau, D. M. (1994). Violating the psychological contract: Not the exception but the norm. *Journal of Organizational Behavior*, 15(3), 245-259.
- Robinson, S. L., Kraatz, M. S., & Rousseau, D. M. (1994). Changing obligations and the psychological contract: A longitudinal study. *Academy of Management Journal*, 37(1), 137-152.
- Rosen, C. C., Chang, C. H., Johnson, R. E., & Levy, P. E. (2009). Perceptions of the organizational context and psychological contract breach: Assessing competing perspectives. *Organizational Behavior and Human Decision Processes*, 108(2), 202-217.
- Rousseau, D. (1995). *Psychological contracts in organizations: Understanding written and unwritten agreements*. Sage Publications.
- Rousseau, D. M. (1989). Psychological and implied contracts in organizations. *Employee responsibilities and rights journal*, 2(2), 121-139.

- Saks, A. M. (2006). Antecedents and consequences of employee engagement. *Journal of Managerial Psychology*, 21(7), 600-619.
- Schaufeli, W. B., & Bakker, A. B. (2004). Job demands, job resources, and their relationship with burnout and engagement: A multi-sample study. *Journal of Organizational Behavior*, 25(3), 293-315.
- Schaufeli, W. B., Bakker, A. B., & Salanova, M. (2006). The measurement of work engagement with a short questionnaire a cross-national study. *Educational and Psychological Measurement*, 66(4), 701-716.
- Schaufeli, W. B., Salanova, M., González-Romá, V., & Bakker, A. B. (2002). The measurement of engagement and burnout: A two sample confirmatory factor analytic approach. *Journal of Happiness Studies*, 3(1), 71-92.
- Settoon, R. P., Bennett, N., & Liden, R. C. (1996). Social exchange in organizations: Perceived organizational support, leader-member exchange, and employee reciprocity. *Journal of Applied Psychology*, 81(3), 219.
- Shen, Y., Jackson, T., Ding, C., Yuan, D., Zhao, L., Dou, Y., & Zhang, Q. (2014). Linking perceived organizational support with employee work outcomes in a Chinese context: Organizational identification as a mediator. *European Management Journal*, 32(3), 406-412.
- Shore, L. M., & Shore, T. H. 1995. Perceived organizational support and organizational justice. In R. Cropanzano & K. Kacmar (Eds.), *Organizational politics, justice, and support*: 149-164. Westport, CT: Quorum.
- Shore, L. M., & Wayne, S. J. (1993). Commitment and employee behavior: comparison of affective commitment and continuance commitment with perceived organizational support. *Journal of Applied Psychology*, 78(5), 774.
- Stinglhamber, F., & Vandenberghe, C. (2003). Organizations and supervisors as sources of support and targets of commitment: A longitudinal study. *Journal of Organizational Behavior*, 24(3), 251-270.
- Sutton, R. I. (1990). Organizational decline processes-a social psychological perspective. *Research in Organizational Behavior*, 12, 205-253.
- Toode, K., Routasalo, P., & Suominen, T. (2011). Work motivation of nurses: a literature review. *International Journal of Nursing Studies*, 48(2), 246-257.

- Tyler, T. R. (1990). *Why people obey the law*. New Haven: Yale.
- Van Knippenberg, D., & Sleebos, E. (2006). Organizational identification versus organizational commitment: self-definition, social exchange, and job attitudes. *Journal of Organizational Behavior*, 27(5), 571-584.
- Wanous, J. P., Reichers, A. E., & Austin, J. T. (2000). Cynicism about organizational change measurement, antecedents, and correlates. *Group & Organization Management*, 25(2), 132-153.
- Wayne, S. J., Shore, L. M., & Liden, R. C. (1997). Perceived organizational support and leader-member exchange: A social exchange perspective. *Academy of Management Journal*, 40(1), 82-111.
- Whitener, E. M. (2001). Do “high commitment” human resource practices affect employee commitment? A cross-level analysis using hierarchical linear modeling. *Journal of Management*, 27(5), 515-535.
- Zhao, H. A. O., Wayne, S. J., Glibkowski, B. C., & Bravo, J. (2007). The impact of psychological contract breach on work-related outcomes: a meta-analysis. *Personnel Psychology*, 60(3), 647-680.