

**VALIDATION OF THE HERSCOVITCH-MEYER THREE-COMPONENT MODEL OF  
COMMITMENT TO CHANGE IN PAKISTAN**

Hina Jawaid Kalyal

NUST Institute of Management Sciences, National University of Sciences and Technology,  
Rawalpindi, Pakistan  
Email: hina.kalyal@gmail.com

Magnus Sverke

Department of Psychology, Stockholm University, Stockholm, Sweden  
Email: mse@psychology.su.se

Sudhir Kumar Saha

Faculty of Business Administration, Memorial University of Newfoundland, St. John's, Canada  
Email: sksaha@mun.ca

**Preferred stream:** Stream 10 and 11

**Profile:** Hina Jawaid Kalyal is a Ph.D. candidate in Business Administration at the NUST Institute of Management Sciences, Rawalpindi, Pakistan. Her main area of interest is organizational change and she is currently working on her doctoral thesis on commitment to organizational change. Prior to joining the Ph.D. program at NIMS, Mrs. Kalyal had three years of banking experience along with several positions held as a visiting faculty member at various universities in Rawalpindi and Islamabad.

# VALIDATION OF THE HERSCOVITCH-MEYER THREE-COMPONENT MODEL OF COMMITMENT TO CHANGE IN PAKISTAN

## ABSTRACT

Along with an increasing frequency of organizational change efforts, research has highlighted employees' attitudes towards change as a prerequisite for successful change implementation. This paper presents the findings from an investigation conducted in Pakistan to validate the Herscovitch-Meyer three component model of commitment to change. Results of confirmatory factor analysis, based on data from 172 managers in a recently restructured public sector organization, showed that commitment to organizational change could be represented by three dimensions of affective, continuance and normative commitment to change, even if some items were found to be problematic. As expected, affective commitment, which is based on the realization of the inherent benefits of change, was negatively related to job insecurity and all role stressors, while continuance commitment, which reflects the avoidance of the cost of non-compliance towards change, displayed positive correlations with all stressors. However, normative commitment, an obligation based commitment, was unrelated to all correlates. In conclusion, the present findings provide some evidence for the generalizability of the commitment to change model in a non-western setting, but also suggest that the normative commitment items may need some adjustment to the particular cultural setting of Pakistan.

**Keywords:** Organizational Change, Implementing Change, Perceptions, Attitudes, Stress and stress management.

## Introduction

The art of progress is to preserve order amid change and to preserve change amid order

ALFRED NORTH WHITEHEAD

The above quotation by an eminent philosopher, mathematician and educator clearly highlights the importance of effective change management by relating progress to change. External and internal environmental forces pose a serious threat to an organization's survival unless it is able to adapt to such changes. Of the many types of change, planned organizational changes are considered developmental in nature since they are implemented in order to improve the overall organizational performance and to enhance the structural and functional efficiency of an organization.

Planned organizational changes may involve alterations or modifications to an organization's structure, goals, technology or work tasks (Carnall, 1986). Compared to sudden transformational changes, the planned changes are considered relatively less threatening as they are consciously implemented after careful deliberation (Harigopal, 2001). But despite all the planning, any alterations in the major organizational variables may in turn have a negative affect on the employees and their work related behavior (Jimmieson, Terry & Callan, 2004). Uncertainty, which is one of the most common outcomes of organizational change (Sverke, Hellgren, & Öhrming, 1997; Schweiger & DeNisi, 1991) may result in stressors such as job insecurity, role ambiguity, role conflict and role

overload. These stressors are in turn likely to have an adverse effect on employee commitment towards the organizational change process.

The success of any change initiative depends upon the commitment of individuals who are involved in it (Coetsee, 1999; Conner, 1992; Harris & Ogbonna, 1999; Herscovitch & Meyer, 2002; Reichers, Wanous & Austin, 1997). Commitment of employees towards the organizational change process connects them with the organizational goals for change (Conner, 1992). Even the most well planned change efforts can be thwarted due to the non-cooperation and lack of commitment by the employees (Miller, Johnson & Grau, 1994). Commitment to change therefore represents a behavioral intention to work towards the success of a change effort rather than simply showing approval for it. It reflects a positive attitude rather than just the lack of resistance.

Due to a growing interest in individual reactions to change, recent research on organizational change has adopted a micro focus on change at the individual level and the factors that influence the change process (Herscovitch & Meyer, 2002; Judge, Thoresen, Pucik & Welbourne, 1999; Wanberg & Banas, 2000). Such information can enable managers to cope more efficiently with the change process and resulting problems.

Despite the noted importance of employee commitment to organizational change, the construct was operationalized and empirically tested only a few years back for the first time. By extrapolating from research on organizational commitment Herscovitch and Meyer (2002) distinguished three distinct aspects of commitment to change: affective, continuance and normative. Since that time the three component model of commitment to organizational change has not been tested extensively outside North America. Meyer, Srinivas, Lal and Topolnytsky (2007) replicated and extended the findings of the Herscovitch and Meyer (2002) model comparing a sample of Canadian and Indian employees undergoing planned change programs. They were able to replicate most of the findings of the Herscovitch-Meyer study (2002) in Canada and in India, providing evidence of generalizability of the model outside North America.

Cunningham (2006) examined the effects of various forms of commitment to change on employee coping with change and turnover intentions. The results showed that coping with change mediated the relationship between affective and continuance commitment to change and turnover intentions. They found a direct relationship between turnover intentions and normative commitment to change.

Chen and Wang (2007) studied the effects of locus of control on commitment to organizational change in a sample of Chinese customs services officers. They reported that internal locus of control was associated with affective and normative commitment while external locus of control was associated with high continuance commitment to change.

The present study is an attempt to investigate how the Meyer-Herscovitch model of commitment to organizational change applies in a different geographic and organizational setting. We also test the effects of various demographic and stress related variables on commitment to organizational change.

### **Commitment to Organizational Change**

The word commitment can be conceptualized as an employee's attachment to various foci such as the entire organization, an organizational subunit, a supervisor or even a change program (Ford, Weissbein & Plamondon, 2003; Herscovitch & Meyer, 2002). Meyer and Allen (1991) and Allen and Meyer (1990) defined organizational commitment as a psychological state that leads an employee to maintain his or her organizational membership. Meyer and Allen (1984, 1991) and O'Reilly and Chatman (1986) considered organizational commitment to be a multidimensional construct instead of being a uni-dimensional one. The three types of mind sets explained by the model were affective commitment (desire to remain), continuance commitment (avoidance of perceived cost of leaving) and normative commitment (obligation to remain). All three forms of commitment have been found to predict work related behavior.

Meyer and Herscovitch (2001) further proposed a general model of workplace commitment in which some minor adjustments to the original (Allen & Meyer, 1990; Meyer & Allen, 1991) models were proposed in order to make it more applicable to other workplace commitments. Based on these changes, commitment was redefined as "a force (mindset) that binds an individual to a course of action of relevance to one or more targets" (Herscovitch & Meyer, 2002, p.475). Meyer and Herscovitch (2001) also identified two forms of commitment relevant behavior namely discretionary and focal behavior and described how such behavior may be affected by the different commitment components. Herscovitch and Meyer (2002) presented a three component model of commitment to organizational change based on the Meyer-Herscovitch (2001) general model of workplace commitment.

In contrast to previous research which typically defined commitment to change as a uni-dimensional construct (e.g., Conner, 1992; Coetsee, 1999), Armenakis, Harris and Feild (1999) and Herscovitch and Meyer (2002) were the first researchers to describe commitment to change as a multi-dimensional construct. They were also the first researchers to empirically test their model of commitment to organizational change. Herscovitch and Meyer (2002) theorized that commitment to organizational change is made up of similar dimensions that constitute organizational commitment. The three types of commitment to change were described as (i) Affective commitment, i.e., commitment based on the realization of the inherent benefits of change, (ii) Normative commitment; commitment based on obligation, and (iii) Continuance commitment i.e., commitment based on the avoidance of the cost of non-compliance towards change.

## **Correlates of Commitment to Organizational Change**

### *Job Insecurity*

Major organizational changes lead to a sharp change in strategy, power structures and control of the organization (Tushman, Newman & Romanelli, 1986). Such changes often give rise to an environment of uncertainty for the employees. Uncertain job situations lead to an increase in job insecurity (Greenhalgh & Sutton, 1991; Hartley, 1991), resulting in resistance to organizational change (Noer, 1993) and decreased levels of job satisfaction and organizational commitment (Ashford, Lee & Bobko, 1989; Davy, Kinicki, & Scheck, 1997; Sverke, Hellgren, Naswall, 2002). Aside from job insecurity, the changes brought about by restructuring can also lead to job related stress for the employees, which may adversely affect their performance and attitudes towards change.

Employees with high organizational commitment may oppose change as it threatens the circumstances which provide them job security (Baron & Greenberg, 1990). Herscovitch (1999) found perceived job insecurity and punitive organizational climate to correlate most strongly with continuance commitment to organizational change. The same study showed lesser variance in affective and least variance in normative commitment due to job insecurity and punitive organizational climate. A large scale change, such as restructuring of an organization, will alter the working conditions and status quo of that organization. The employees may perceive this as a deterioration of their working conditions and affective commitment to change will be low. Normative commitment to change may also be low if the employees view the change as a breach of their psychological contract and violation of their interests.

### *Role Stress*

The uncertainty arising during organizational change is due to a number of environmental factors which are beyond the control of individual employees. Individuals within such operating environments are likely to experience stress brought about by increased work targets, threats of job losses, changes in job holders' responsibilities and authority and shifts in the balance of power (McHugh & Brennan, 1994). Job or role stress is composed of at least three basic factors: role ambiguity, role conflict and role overload (Iverson, Deery and Erwin, 1995). Role ambiguity has been described as the situation where an individual does not have clear direction about the expectations of his or her role in the job or organization (Rizzo, House & Lirtzman, 1970). Role ambiguity arises when the expectations of the old organization have not been replaced by new ones.

Role conflict arises during organizational change when the expectations of the new organization are in direct contrast to the expectations of the old organization. Role conflict is viewed as incompatibility in

communicated expectations that interfere with perceived role performance (Rizzo et al., 1970). In contrast to role ambiguity, role conflict is not concerned with the clarity of an employee's role, but with the inconsistent demands of it.

Role overload occurs when too many tasks are assigned to an employee in a limited time frame or when the present skills, abilities and knowledge of employees are not consistent with new work requirements. The greater the amount of job performance required, the greater the workload. Several researchers (Iverson, Deery and Erwin, 1995; Mathieu and Zajac, 1990) have identified the negative impact of role ambiguity, role conflict and role overload on organizational commitment.

Herscovitch (1999) argued that in the context of organizational change, the employees who experience improvements in job scope and role clarity, and do not experience role conflict as a result of the introduction of a change initiative, would be more likely to perceive that the change was beneficial and of value. Consequently, these variables were expected to be strongly associated with affective commitment to change. Iverson (1996) found role conflict to have a direct effect on the acceptance of organizational change i.e. the greater the role conflict of employees, lesser the acceptance of organizational change.

#### *Demographic factors*

Age has been found to have a negative impact on employee attitude towards organizational change (Cordery, Barton, Mueller & Parker, 1991; Cordery, Sevstos, Mueller & Parker, 1993). Younger employees are generally more flexible and open to change than the older employees. Tenure is also found to be negatively related to organizational change (Iverson, 1996). The longer the employees are associated with an organization, the more fixed their work habits will be. The level of education of employees is expected to be positively related to organizational change (Iverson, 1996). The higher the level of education, the more flexible an individual is likely to be and will embrace change as an opportunity rather than resisting it as a threat (Cordery et.al., 1993). In terms of gender previous research has shown that men tend to be more resistant to change than women (Cordery et.al, 1991; Vakola & Nikolaou, 2005)

#### **Research Objectives**

Like in many other countries of the world, a whole lot of organizational restructuring has been going on in Pakistan. Unfortunately, studies related to commitment to organizational change are few and far between, and empirical literature on any management or organizational behavior related topic is virtually non existent. An attempt has been made to validate the Meyer and Allen (1991) organizational commitment measure in Pakistan (Tayyab & Riaz, 2004), but no literature is available

on organizational change in general and commitment to change in particular. The present investigation was designed to fill this void. Several objectives underlie this investigation:

Firstly, we wanted to validate if the three-component model of commitment to organizational change (affective, continuance and normative commitment to change) can apply in Pakistan, by investigating the dimensionality and reliability of the three-dimensional representation of commitment to change. Could this model be of any use to Pakistani managers in understanding and managing restructuring process? Boyacigiller and Adler (1991) have underscored the importance of careful validation of theories in different cultural contexts, which is also one of the main research objectives of the present study.

Secondly, this investigation also attempted to determine the effects of job insecurity and work stressors on commitment to organizational change. The extant literature reviewed earlier suggested that such factors may affect commitment to organizational change. Would that also be true for employees working in a restructured Pakistani organization? Thirdly, we also investigated how employees with different demographic characteristics respond to organizational restructuring. Do employees of different demographic characteristics show different level of commitment to change when these employees are under stressors such as job insecurity, role conflict, role ambiguity and role overload?

## **METHOD**

### **Participants and Procedure**

Questionnaire data were collected among management level employees of a research-based public sector organization in Pakistan. The data collection took place one month after the announcement of a major restructuring program, which included major changes in the structure and function of the organization as well as the salary and the performance evaluation system. The basic purpose of the restructuring program was to increase the efficiency and productivity of the organization.

All senior and middle managers (N=400) at the head office and one regional office of the organization were sampled for the survey. The survey was administered with the help of the Human Resources department through their internal mail delivery system and the respondents were given one week to respond. After one week, a reminder mail-out was issued.

A total of 190 questionnaires were received, for a response rate of 47.5%. The final sample size after the elimination of blank or almost blank questionnaires was 172. Since the sample size was relatively small, and given the small portion of internal attrition (0.86%) among the retained participants, we

decided to replace missing values using the multiple imputation (EM) procedures of Lisrel 8.7 (Jöreskog & Sörbom, 2001). Participants' age ranged from 18 to 65, with the majority (45%) being in the 46-55 age category. Men made up the majority of the sample (92%), 60% had a postgraduate degree and 23% a doctorate. The average organizational tenure was 16 years (SD=9).

## **Measures**

Commitment to change was measured by the 18-item scale developed by Herscovitch and Meyer (2002). The measure comprises six items for each of the dimensions affective, continuance and normative commitment, and responses were given on a five-point scale (1=strongly disagree and 5=strongly agree).

A five-point Likert type response scale (1=strongly disagree; 5=strongly agree) was used also for the correlates. Job insecurity was measured by a 3-item scale (Hellgren, Sverke & Isakson, 1999). The coefficient alpha reliability was .80. Role overload was assessed by combining six items from Beehr, Walsh and Taber (1976) and Sverke, Hellgren and Ohrming (1997), with a reliability of .62. Role conflict was measured using five items (Rizzo, House & Lirtzman, 1970), and the internal consistency was .68. Role ambiguity was assessed using a combination of items by Rizzo, House and Lirtzman (1970) as well as Caplan (1971). The four items yielded an alpha coefficient of .61.

In terms of demographics, age was assessed using age intervals (18-25, 26-35, 36-45, 46-55, and 56 years or older). Participants indicated their gender in a dichotomous variable (0=man, 1=woman). Tenure in the organization was measured in years. Level of education was assessed using four overall levels (1=undergraduate, 2=graduate, 3=postgraduate, 4=doctorate).

## **Analysis**

The dimensionality of the commitment to change measure was evaluated using exploratory as well as confirmatory factor analysis. In a first set of analyses, for each dimension of commitment to change we subjected its six items to principal axis factoring in SPSS 13. Using the criterion of eigenvalues greater than 1, and examining communalities and factor loadings, problematic items were deleted, if necessary. In the second set of analyses, all retained items were subjected to confirmatory factor analysis using the robust maximum likelihood procedures of Lisrel 8.7 (Jöreskog & Sörbom, 2001). The proposed three-factor model was contrasted with three other models: a baseline (null) model (assuming no relationships between items), a uni-factor model (assuming one single dimension of commitment to change), and three two-factor models (each combining two different commitment dimensions to one). In the two- and three-factor models, the dimensions were allowed to correlate.



Following conventional procedures (e.g., Hu & Bentler, 1995; Kelloway, 1998), overall model fit was determined using the (Satorra-Bentler) chi-square test and the root mean square error of approximation (RMSEA; Browne & Cudeck, 1993). A good fit to data is indicated by a non-significant chi-square and an RMSEA value of .08 or lower. For descriptive purposes we also report the standardized root mean square residual (SRMR) and the normed fit index (NFI; Bentler & Bonett, 1980). NFI values above .90 indicate good fit, whereas low values of the SRMR signify small residuals. Comparisons between the nested models were conducted using the Akaike measure (AIC; Akaike, 1987), for which lower values indicate a better model, and the chi-square difference test.

The internal consistency of the commitment to change dimensions was addressed by computing Cronbach's alpha (Cronbach, 1951). We used an alpha level of .70 as a criterion for adequate reliability (Nunnally, 1978). The association of the commitment to change dimensions with demographics and stressors were first examined by bivariate correlations. In a subsequent set of analyses we used multiple regression procedures to investigate the relative importance of each correlate for affective, continuance and normative commitment to change.

## **RESULTS**

### **Dimensionality of commitment to change**

In the exploratory factor analysis, all six affective commitment to change items formed one factor with an eigenvalue of 3.00, thus accounting for half of the variance in the items. The factor loadings ranged between .59 and .81. For continuance commitment, the principal axis factoring once again resulted in a single factor. Because one item ("I have no choice but to go along with this change") had a low factor loading (.31), it was dropped from further analysis. The remaining five items formed a single factor which accounted for 57% of the variance (eigenvalue = 2.84), and the factor loadings ranged from .54 to .89. In terms of normative commitment to change, the six initial items produced two factors. One item ("I feel a sense of duty to work toward this change") evidenced negative correlations with several other items, and also had a low communality (.08). After deletion of this item, the remaining five items still formed two factors. One item ("I would not feel bad about opposing this change"; reverse-coded) had weak, sometimes negative, correlations with other items and was therefore omitted from further analysis. The four remaining items formed a single factor but yet another item ("I do not feel any obligation to support this change"; reverse-coded) was deleted due to a low factor loading (.30).

When the 14 retained items were subjected to confirmatory factor analysis, the robust maximum likelihood procedures indicated that the hypothesized three-factor representation of commitment to change provided a satisfactory fit to data (see Table 1). Although the chi-square statistic was

significant, the remaining fit indices were within acceptable standards. Moreover, the three-factor model provided a substantially better fit to data as compared to any of the two-factor solutions. The best fitting two-factor model (which in addition to an affective dimension combined the continuance and normative commitment items into one factor), provided a marked better fit as compared to a uni-factor representation of commitment to change, which, in turn, evidenced a substantially better fit than the structural null model.

Table 1 about here

The factor loadings for the three-factor model are presented in Table 2. All affective commitment items loaded strongly on one factor (range of loadings: .65-.85). The continuance commitment items also evidence fairly strong loadings (.56-.92) on their proposed factor. Despite the fact that all factor loadings were significant, however, one of the normative commitment items had a fairly low factor loading (.35), while the remaining two loaded .80 and .58, respectively, on the normative factor. There was a strong negative correlation between the affective and continuance factors, and a moderately strong positive correlation between continuance and normative commitment, whereas affective and normative commitment were found to be unrelated.

Table 2 about here

### **Reliability**

The internal consistency reliability was within acceptable standards for affective ( $\alpha = .85$ ; 6 items) and continuance commitment to change ( $\alpha = .86$ ; 5 items). However, Cronbach's alpha failed to reach acceptable standards for the three retained normative commitment items ( $\alpha = .53$ ).

### **Association with correlates**

The bivariate correlations of commitment to change dimensions with demographic variables and stressors are reported in Table 3. Affective commitment displayed negative correlations with all stressors whereas continuance commitment had positive correlations with all stressors. Moreover, affective commitment was negatively associated with age as well as tenure in the organization. Normative commitment was unrelated to all demographic and role stress factors.

Table 3 about here

When the relative importance of the various demographic characteristics and stressors for commitment to change were analyzed in a multivariate context, the regression analyses (Table 4) showed that affective as well as continuance commitment were predicted by two of the stressors. Job

insecurity and role conflict evidenced negative associations with affective commitment and positive regression weights for continuance commitment. In addition, affective commitment was found to be negatively associated also with age and organizational tenure. None of the predictor variables evidenced significant associations with normative commitment.

Table 4 about here

## **DISCUSSION**

The main purpose of the present investigation was to test the applicability of the Herscovitch and Meyer (2002) three component model of commitment to organizational change in a non-western setting. Our results suggest that commitment to organizational change can be represented by three dimensions namely, affective, continuance and normative commitment to change. However one item from the continuance commitment to change scale and three items from the normative commitment to change scale had to be dropped in order to obtain a three factor solution through confirmatory factor analysis. The reliabilities were acceptable for the affective and continuance commitment to change scales but fairly low for the normative commitment to change scales.

The higher correlation between NC and CC (rather than between AC and NC as would have been expected in a collectivist culture; Wasti, 2002) corresponds more closely to the Canadian sample in the Meyer et.al (2007) study. This result supports the Gellatly, Meyer and Luchak (2006) study which characterizes normative commitment as having two forms: “moral imperative” (value based commitment) and “indebted obligation” (exchange based commitment). The high NC/CC correlation suggests that with the threat of downsizing looming large, our sample of scientists related more to items suggesting indebted obligation rather than those suggesting moral imperative. In Pakistan employee retention is not an issue in the public sector as public sector employment is considered to be more prestigious and secure than private sector employment and very few consider leaving due to employment security and benefits associated with it (Haque & Khawaja, 2007; Hyder, 2007).

Some of the normative items may not have been relevant for the Pakistani work environment which calls for the development of emic (culture based) items for a re-conceptualization of the construct in a non-western setting (Wasti, 2002; Suliman & Iles, 1999). A perceived breach of psychological contract may also have reduced the moral imperative and raised the level of indebted obligation.

Another purpose of the present study was to determine the effects of job insecurity and work stressors on commitment to organizational change. Affective commitment displayed negative correlations with all stressors whereas continuance commitment had positive correlations with all stressors. This finding is in line with Herscovitch’s (1999) observation which suggested that employees experiencing

role stress and job insecurity will show low levels of affective commitment to change. Since affective commitment to change expresses a willingness to provide support for the change initiative, any work related ambiguity or stress will have a negative impact on this particular type of commitment. Moreover, affective commitment to change was negatively associated with age as well as tenure in the organization. This finding suggests that older more senior employees do not embrace change willingly and are reluctant to forego their established patterns of work.

Continuance commitment to change had positive correlations with all stressors. The explanation for this finding is rooted in the fact that all stressors create ambiguity and uncertainty for those affected by them and as a result the employees only show minimal support for the change. The higher the stress the higher will be the level of continuance commitment to change. These results support Herscovitch (1999) findings that perceived job insecurity and punitive organizational climate to correlate most strongly with continuance commitment to organizational change.

Normative commitment was found to be unrelated to all demographic and role stress factors. Normative commitment is an obligation based commitment. As long as the employee is able to maintain organizational membership he or she remains unaffected by any work stressors (Greenhalgh & Rosenblatt, 1984). The correlation of normative commitment to change with demographic characteristics such as age, gender or level of education is also not significant.

### **Limitations**

Like every study, the present study also has its share of limitations. A notable limitation is the cross-sectional nature of the data which does not allow any assumptions about causality. For future research a longitudinal study is suggested which will be able to provide a better explanation for the cause and effect relationships. The use of self-report measures of behavior leading to common method bias is another limitation. Since the present study deals with the perceptions of the employees therefore self report measures were considered appropriate in order to obtain the employee's personal perception on organizational change. Multi-source data may be obtained to overcome the issue of common method bias.

The administration of the survey in English may have led to some difficulty in fully comprehending certain items in the survey. Some items may not have been culturally suitable to be administered to a Pakistani sample. Careful and in depth translations and development of culturally suitable items may be necessary in order to deal with the problems of comprehension. The sample of employees included only the managerial staff and particularly scientists, which limits our ability to generalize the results of the present study to the entire organization.

## Conclusion

The basic aim of the present paper was to determine the applicability of the Herscovitch and Meyer (2002) three component model of commitment to organizational change in Pakistan. The effects of some work stressors and demographic variables on various components of commitment to change were also examined. Our results provide some evidence for the generalizability of the Herscovitch and Meyer (2002) model in a non-western setting. However the results of the study may be interpreted with caution as the normative commitment to change construct did not provide satisfactory reliability values and factor loadings. The correlation results were as expected, at least for two of the commitment to change dimensions. Affective commitment was found to be negatively related to stressors whereas continuance commitment was positively related to them. Normative commitment to change, however, remained unaffected by any stressors or demographic variables.

These findings differ from the Meyer et al. (2007) study conducted with an Indian sample. Considering the similarities between the Pakistani and Indian cultures, it was expected that the results would be similar. Bergman (2006) has suggested that the weakness of an organization's overall culture and the strength of sub-cultures may affect the level of Affective or Normative commitment to the organization. Meyer et.al (2007) argue that although societal culture has an impact on the level of commitment, the nature of different professions may override the effect of societal culture in affecting the level of commitment. The results may also have been different from the studies on commitment to change conducted in North America and India, due to cultural differences and values. According to Hofstede ([www.geert-hofstede.com](http://www.geert-hofstede.com)), for Pakistan the combination of high Uncertainty Avoidance and Power Distance scores creates highly rule-oriented societies with laws, rules, regulations, and controls in order to reduce the amount of uncertainty. Initiating change in such cultures can receive strong resistance from those likely to be affected.

The results of the present study will have important implications for managers dealing with organizational change. Managerial attempts to foster affective commitment to organizational change during a large scale planned change initiative can ensure its success. This can only be done if the factors which cause uncertainty and stress are removed through effective communication and participation in the planning and implementation of change. These attempts should especially be focused towards the older more senior employees who are generally reluctant to accept or promote change. The older more mature employees form an integral part of the organization in question. Employees at other levels may be getting their cues regarding the change process from these seniors. A change strategy is likely to be undermined from within if the employees do not fully espouse the spirit of change (Durkin & Bennett, 1999).

## REFERENCES

- Akaike H (1987) Factor analysis and AIC, *Psychometrika* 52: 317-332.
- Allen NJ & Meyer JP (1990) Organizational socialization tactics: a longitudinal analysis of links to newcomer's commitment and role orientation, *Academy of Management Journal* 33: 847-858.
- Armenakis AA, Harris SG & Feild HS (1999) Paradigms in organizational change: change agent and change perspectives in Golembiewski R (Ed.), *Handbook of Organizational Behavior*, pp631-658, Marcel Dekker, New York.
- Ashford SJ, Lee C & Bobko P (1989) Content, causes and consequences of job insecurity: a theory-based measure and substantive test, *Academy of Management Journal*, 4, pp. 803-29.
- Baron RA, & Greenberg J (Eds)(1990) *Behavior in organizations*, 3<sup>rd</sup> edn, Allyn & Bacon, London.
- Beehr TA, Walsh JT & Taber TD (1976) Relationship of stress to individually and organizationally valued states: higher order needs as a moderator, *Journal of Applied Psychology* 61: 41-47.
- Bentler PM & Bonett DG (1980) Significance test and goodness-of-fit in analysis of covariance structures, *Psychological Bulletin* 88: 588-606.
- Bergman M (2006) The relationship between affective and normative commitment: review and research agenda, *Journal of Organizational Behavior* 27: 645-663.
- Boyacigiller NA & Adler NJ (1991) The parochial dinosaur: organizational science in a global context, *Academy of Management Review* 16: 262-290.
- Browne MW & Cudeck R (1993) Alternative ways of assessing model fit in Bollen KA & Long JS (Eds.), *Testing structural equation models*, pp 136-162, Sage, Newbury Park, CA.
- Caplan RD (1971) Organizational stress and individual strain: a social-psychological study of risk factors in coronary heart diseases among administrators, engineers, and scientists, Institute for Social Research, University of Michigan, University Microfilms No. 72/14822, Ann Arbor, Michigan.
- Carnall CA (1986) Towards a theory for the evaluation of organizational change, *Human Relations* 39(8): 745-66.
- Chen J & Wang L (2007) Locus of control and the three components of commitment to change, *Personality and Individual Differences* 42: 503-512.
- Coatsee L (1999) From resistance to commitment, *Public Administration Quarterly* 23: 204-222.
- Conner DR (Eds)(1992) *Managing at the speed of change: how resilient managers succeed and prosper where others fail*, Villard Books, New York.
- Cordery JL, Barton K, Mueller W & Parker S (1991) Multiskilling: the views of public sector human resource managers, *Asia Pacific HRM*.29(3): 79-89.
- Cordery JL, Sevastos P, Mueller W & Parker S (1993) Correlates of employee attitudes toward functional flexibility, *Human Relations* 46(6): 705-23.

- Cronbach LJ (1951) Coefficient alpha and the internal structure of tests, *Psychometrika* 16: 297-334.
- Cunningham GB (2006) The relationships between commitment to change, coping with change and turnover intentions, *European Journal of Work and Organizational Psychology* 15: 29-45.
- Davy JA, Kinicki AJ & Scheck CL (1997) A test of job security's direct and mediated effects on withdrawal cognitions, *Journal of Organizational Behavior* 18: 323-349.
- Durkin M & Bennett H (1999) Employee commitment in retail banking: identifying and exploring hidden dangers, *International Journal of Bank Marketing* 17 (3): 124-134.
- Ford JK, Weisbein DA & Plamondon KE (2003) Distinguishing organizational from strategy commitment: linking officer's commitment to community policing to job behaviors and satisfaction, *Justice Quarterly* 20: 159-185.
- Gellatly IR, Meyer JP & Luchak AA (2006) Combined effects of the three commitment components on focal and discretionary behaviors: a test of the Meyer and Herscovitch's propositions, *Journal of Vocational Behavior* 69: 331-345.
- Greenhalgh L & Rosenblatt Z (1984) Job insecurity: toward conceptual clarity, *Academy of Management Review* 3: 438-448.
- Greenhalgh L & Sutton R (1991) Organizational change and job insecurity in Hartley JF, Jacobson D, Klandermans B, & Van Vuuren T (Eds.) *Job Insecurity: Coping with jobs at risk*, Sage, London.
- Haque, NU & Khawaja, I (2007) Public Service: through the eyes of civil servants, *PIDE Series on Governance and Institutions*. Pakistan Institute of Development Economics.
- Harigopal K (Eds)(2001) Management of organizational change: Leveraging transformation, Sage, New Delhi.
- Harris LC & Ogbonna E (1999) Employees response to cultural change efforts, *Human Resource Management Journal* 8(2): 78-92.
- Hartley JF (1991) Industrial relations and job insecurity: Learning from a case study in Hartley JF, Jacobson D, Klandermans B, & Van Vuuren T (Eds.) *Job Insecurity: Coping with jobs at risk* Sage, London.
- Hellgren J, Sverke M & Isaksson K (1999) A two dimensional approach to job insecurity: consequences for employee attitudes and well-being, *European Journal of Work and Organizational Psychology* 8(2): 179-195.
- Herscovitch L & Meyer JP (2002) Commitment to organizational change: extension of a three-component model, *Journal of Applied Psychology* 87: 474-487.
- Herscovitch L (1999) Employee commitment to organizational change: extension and evaluation of a three-component model. *Unpublished master's thesis*, University of Western Ontario,
- Hu LT & Bentler P M (1995) Evaluating model fit. In R. H. Hoyle (Ed.), *Structural equation modelling: concepts, issues and applications* pp. 76-99, Sage, Thousand Oaks, CA:.

- Hyder A (2007) Preference for public sector jobs and wait-unemployment: a micro data analysis. *Pakistan Institute of Development Economics Working Paper Series 20*.
- Iverson RD (1996) Employee acceptance of organizational change: the role of organizational commitment, *International Journal of Human Resource Management* 7(1): 122-149.
- Iverson RD, Deery SJ & Erwin PJ (1995) Absenteeism in the health services sector: a causal model and intervention strategies in Riedel P and Preston A (Eds) *Managing Absenteeism. Analysing and Preventing Labour Absence*, AGPS, Canberra
- Jimmieson NL, Terry DJ & Callan VJ (2004) A longitudinal study of employee adaptation to organizational change: the role of change-related information and change-related self efficacy, *Journal of Occupational Health Psychology* 9: 11-27.
- Jöreskog K & Sörbom D (2001) LISREL 8: User's reference guide (2nd ed.) SSI, Lincolnwood, IL.
- Judge TA, Thoresen CJ, Pucik V & Welbourne TM (1999) Managerial coping with organizational change: a dispositional perspective, *Journal of Applied Psychology* 84: 107-122.
- Kelloway EK (1998) Using LISREL for structural equation modelling - a researcher's guide, Sage, Thousand Oaks, CA.
- Mathieu JE & Zajac DM (1990) A Review and meta-analysis of the antecedents, correlates, and consequences of organizational commitment, *Psychological Bulletin* 108(2): 171-94.
- McHugh M & Brennan S (1994) Managing the stress of change in the public sector International, *Journal of Public Sector Management* 7(5): 29-41
- Meyer JP & Herscovitch L (2001) Commitment in the workplace: toward a general model, *Human Resource Management Review* 11: 299-326.
- Meyer JP & Allen NJ (1991) The three-component conceptualization of organizational commitment. *Human Resource Management Review* 1: 61-89.
- Meyer JP, Allen NJ (1984) Testing the side-bet theory of organizational commitment: some methodological considerations, *Journal of Applied Psychology* 69: 372-378.
- Meyer JP, Srinivas ES, Lal JB & Topolnytsky L (2007) Employee commitment and support for an organizational change: test of the three-component model in two cultures, *Journal of Occupational and Organizational Psychology* 80: 185-211.
- Miller VD, Johnson JR & Grau J (1994) Antecedents to willingness to participate in a planned organizational change, *Journal of Applied Communication Research* 11: 365-386.
- Noer D (Eds)(1993) *Healing the wounds: Overcoming the trauma of layoffs and revitalizing downsized organizations*, Jossey-Bass, San Francisco.
- Nunnally JC (Eds)(1978) *Psychometric theory*, McGraw-Hill, New York:
- O'Reilly C & Chatman J (1986) Organizational commitment and psychological attachment: the effects of compliance, identification and internalization on pro-social behavior, *Journal of Applied Psychology* 71: 429-499.



- Reichers AE, Wanous JP & Austin JT (1997) Understanding and managing cynicism about organizational change, *Academy of Management Executive* 11(1): 48-59.
- Rizzo JR, House RJ & Lirtzman SI (1970) Role conflict and ambiguity in complex organizations, *Administrative Science Quarterly* 15: 150-163.
- Schweiger DM & Denisi AS (1991) Communication with employees following a merger: A longitudinal field experiment, *Academy of Management Journal* 34: 110-135.
- Suliman AM & Iles PA (1999) The multi-dimensional nature of organizational commitment in a non-western context, *Journal of Management Development* 19 (1): 71-82.
- Sverke M, Hellgren J, & Öhrming J (1997) Hospital corporatization: how are nurses' job perceptions and work-related attitudes affected? *Reports from the Department of Psychology*, Stockholm University, No. 839.
- Sverke M, Hellgren J & Näswall, K (2002) No security: A meta-analysis and review of job insecurity and its consequences, *Journal of Occupational Health Psychology* 7: 242-264.
- Tayyab S & Riaz M (2004) Validation of the three-component model of organizational commitment in Pakistan, *Pakistan Journal of Psychological Research* 19(3-4): 123-149.
- Tushman M, Newman W & Romanelli E (1986) Convergence and upheaval: managing the unsteady pace of organizational evolution, *California Management Review* 29(1): 29-44.
- Vakola M & Nikolaou I (2005) Attitudes towards organizational change: what is the role of employee's stress and commitment? *Employee Relations* 27(2): 160-174.
- Wanberg CR, & Banas JT (2000) Predictors and outcomes of openness to change in a reorganizing workplace, *Journal of Applied Psychology* 85: 132-142.
- Wasti SA (2002) Affective and continuance commitment: test of an integrative model in the Turkish context, *International Journal of Intercultural Relations* 26: 525-550.

Table 1. Fit statistics for the confirmatory factor analyses of affective (AC), continuance (CC) and normative (NC) commitment to change.

| Model                          | df | $\chi^2$ | p    | RMSEA | AIC     | SRMR | NFI | Model comparisons |             |                |      |
|--------------------------------|----|----------|------|-------|---------|------|-----|-------------------|-------------|----------------|------|
|                                |    |          |      |       |         |      |     | Models            | $\Delta$ df | $\Delta\chi^2$ | p    |
| 0. Null model                  | 91 | 1375.70  | .000 | .29   | 1403.70 | .37  | .43 | --                | --          | --             | --   |
| 1. One factor                  | 77 | 399.37   | .000 | .16   | 455.37  | .15  | .83 | 1 vs. 0           | 14          | 976.33         | .000 |
| 2a. Two factors<br>(AC/NC; CC) | 76 | 147.35   | .000 | .07   | 205.35  | .12  | .94 | 2a vs. 1          | 1           | 252.02         | .000 |
| 2b. Two factors<br>(AC; NC/CC) | 76 | 137.51   | .000 | .07   | 195.51  | .11  | .94 | 2b vs. 1          | 1           | 261.86         | .000 |
| 2c. Two factors<br>(AC/CC; NC) | 76 | 354.65   | .000 | .15   | 412.65  | .13  | .85 | 2c vs. 1          | 1           | 44.72          | .000 |
| 3. Three factors               | 74 | 106.30   | .008 | .05   | 168.30  | .09  | .96 | 3 vs. 2b          | 2           | 31.21          | .000 |

-- not applicable

Table 2. Factor Loadings

| Item  | Affective | Continuance | Normative |
|---|-----------|-------------|-----------|
| Affective commitment to change  |           |             |           |
| 1. I believe in the value of this change                                      | .75       |             |           |
| 2. This change is a good strategy for this organization                       | .85       |             |           |
| 3. I think that management is making a mistake by introducing this change (R) | .77       |             |           |
| 4. This change serves an important purpose                                    | .65       |             |           |
| 5. Things would be better without this change (R)                             | .71       |             |           |
| 6. This change is not necessary (R)   | .74       |             |           |
| Continuance commitment to change  |           |             |           |
| 8. I feel pressure to go along with this change                               |           | .56         |           |
| 9. I have too much at stake to resist this change                             |           | .87         |           |
| 10. It would be too costly for me to resist this change                       |           | .92         |           |
| 11. It would be risky to speak out against this change                        |           | .93         |           |
| 12. Resisting this change is not a viable option for me                       |           | .65         |           |
| Normative commitment to change  |           |             |           |
| 14. I do not think it would be right of me to oppose this change              |           |             | .35       |
| 16. It would be irresponsible of me to resist this change                     |           |             | .80       |
| 17. I would feel guilty about opposing this change                            |           |             | .58       |
| Inter-factor correlations   |           |             |           |
| Affective   | 1         |             |           |
| Continuance   | -.56      | 1           |           |
| Normative   | .09ns     | .27         | 1         |

ns = non-significant parameter estimate, (R) = reverse-coded item.

Omitted items: I have no choice but to go along with this change (continuance), I feel a sense of duty to work toward this change (normative), I would not feel bad about opposing this change (reverse-coded; normative), I do not feel any obligation to support this change (reverse-coded; normative).

Table 3. Correlations between commitment to change, stressors, and demographics.

| Variable                   | 1      | 2    | 3     | 4      | 5      | 6      | 7      | 8    | 9      | 10    |
|----------------------------|--------|------|-------|--------|--------|--------|--------|------|--------|-------|
| 1. Age                     |        |      |       |        |        |        |        |      |        |       |
| 2. Gender (woman)          | .06    |      |       |        |        |        |        |      |        |       |
| 3. Education               | .17*   | .10  |       |        |        |        |        |      |        |       |
| 4. Organizational tenure   | .80*** | .01  | .08   |        |        |        |        |      |        |       |
| 5. Job insecurity          | .04    | .01  | .15   | .05    |        |        |        |      |        |       |
| 6. Role overload           | .07    | .05  | .03   | .12    | .18*   |        |        |      |        |       |
| 7. Role conflict           | .04    | .01  | -.02  | .10    | .23**  | .51*** |        |      |        |       |
| 8. Role ambiguity          | .01    | -.01 | -.17* | .05    | .15    | .21**  | .40*** |      |        |       |
| 9. Affective commitment    | -.23*  | -.11 | .12   | -      | -      | -      | -      | -    |        |       |
|                            |        |      |       | .29*** | .36*** | .27*** | .36*** | .18* |        |       |
| 10. Continuance commitment | .04    | -.03 | -.10  | .12    | .44*** | .27*** | .41*** | .18* | -      |       |
|                            |        |      |       |        |        |        |        |      | .53*** |       |
| 11. Normative commitment   | -.06   | .03  | -.09  | -.05   | .05    | -.03   | .09    | .11  | .10    | .21** |

\*  $p < .05$ , \*\*  $p < .01$ , \*\*\*  $p < .001$ .

Table 4. Results of multiple regression analyses predicting commitment to change (standardized regression coefficients).

| Predictor             | Affective | Continuance | Normative |
|-----------------------|-----------|-------------|-----------|
| Age                   | -.03      | -.11        | -.02      |
| Gender (woman)        | -.10      | -.03        | .02       |
| Education             | -.03      | -.04        | -.07      |
| Organizational tenure | -.23*     | .16         | -.04      |
| Job insecurity        | -.27***   | .35***      | .03       |
| Role overload         | -.08      | .05         | -.10      |
| Role conflict         | -.22**    | .30***      | .11       |
| Role ambiguity        | -.001     | -.02        | .07       |
| R <sup>2</sup> (adj)  | .26***    | .27***      | .03       |

\* p<.05, \*\* p<.01, \*\*\* p<.001.