



## GENDER DIFFERENCE EFFECTS ON CONTRIBUTING FACTORS OF INTENTION TO BE INVOLVED IN KNOWLEDGE CREATION AND SHARING

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### ABSTRACT

*The paper analyses the moderating effects of demographics factors of organizational members on the contributing factors of intention to be involved in Knowledge Management (KM) process; knowledge creation and knowledge sharing. The KM processes were operationalized through knowledge creation theory (SECI process). Data were collected from 313 executives in the Sri Lankan Telecommunication Industry using self-administered questionnaires. Two KM enablers; 'trust & collaboration' and 'ICT use and support for search and sharing', and two individual acceptance factors; 'performance expectancy of KM', and 'effort expectancy of KM' were considered as contributing factors of intention to be involved in KM process. The study found that gender moderates the relationship between 'ICT use and support for search and sharing', 'performance expectancy of KM' and intention to be involved in KM process. The findings suggest that if the policy makers in the industry are planning to implement KM initiatives, they should consider gender differences of the executives and the strategies should be formulated accordingly.*

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**Keywords:** Knowledge management (KM), KM enablers, Moderating effects, KM readiness, SECI process, Hierarchical multiple regression.

### 1. INTRODUCTION

The main objective of the current work is to investigate whether the demographic factors of organizational members moderate the relationship between the intention to be involved in knowledge management (KM) and its contributing factors. As the scope of the KM is very wide, this study confined to knowledge creation and knowledge sharing. The KM processes were operationalized through SECI (socialization, externalization, combination, and internalization) process (knowledge creation theory) introduced by (Nonaka *et al.*, 1994). (Karim *et al.*, 2012)

have found that the SECI process is a significant and reliable measure to assess the organizational members' intention to be involved in KM process. Similarly, (Karim *et al.*, 2012) have verified that trust & collaboration, ICT use and support for search and sharing, performance expectancy of KM, and effort expectancy of KM as the contributing factors of intention to be involved in KM. The present work is considered as an extension to the works of (Karim *et al.*, 2012) and (Karim *et al.*, 2012). Gender, age, experience, and organizational position's management level were considered as demographic factors in this study.

## 2. STUDY BACKGORUND

Knowledge management (KM) has become an important trend in the business practices (Nonaka, 1994) today. However, the KM processes implementation stress on changes in the organization and its members' attitude (Holt *et al.*, 2007). Therefore, an evaluation of organizational readiness for KM process implementation is recommended before embarking on actual implementation (Siemieniuch and Sinclair, 2004; Holt *et al.*, 2007). To date only a limited number of empirical research works were published in this regard. To name a few, (Holt *et al.*, 2007) and (Shirazi and Mortazavi, 2011) have conducted surveys, which takes into account the implementation of KM as a change management process. Meanwhile, the work of (Taylor and Schellenberg, 2005) measures the gaps between the importance and the effectiveness of KM related organizational practices. Similarly, (Wei *et al.*, 2009) have identified several dimensions of KM success factors, KM strategies, and KM process and assessed the organizational readiness for KM through the level of actual implementation of the above mentioned factors.

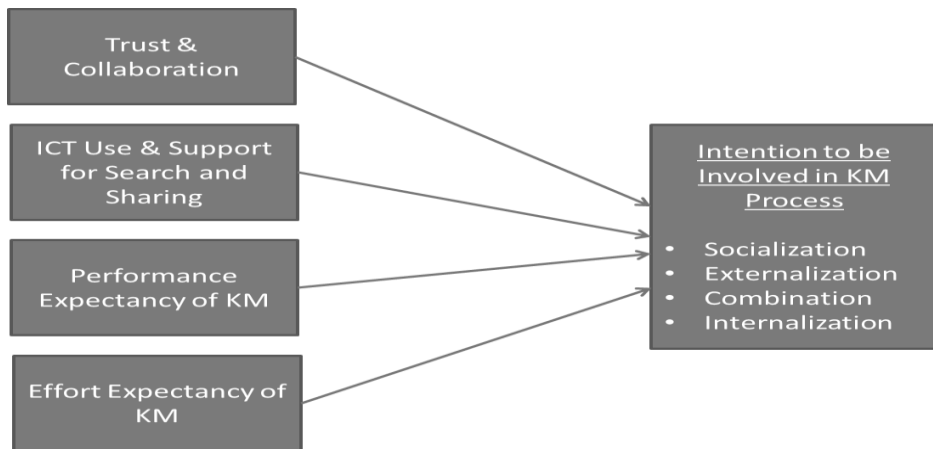
However, none of the above mentioned studies considered the readiness dimension from the organizational members' perspective for KM process implementation. Nevertheless, (Karim *et al.*, 2012; Karim *et al.*, 2012), have emphasized the importance of assessing the readiness for KM from organizational members' perspective and defined KM readiness as employees' collective intention to be involved in KM process.

Organizational readiness for KM, especially for knowledge creation and sharing, is perceived when the employees collectively give high level of intention in getting involved with the SECI process (Karim *et al.*, 2012). SECI process means four different modes of knowledge conversion: tacit knowledge to tacit knowledge (socialization), explicit knowledge to explicit knowledge (combination), tacit knowledge to explicit knowledge (externalization), and explicit knowledge to tacit knowledge (internalization) (Nonaka, 1994). (Becerra-Fernandez and Sabherwal, 2001) explain that SECI process describe the ways in which knowledge is shared through the interaction between tacit and explicit knowledge. (Karim *et al.*, 2012) have empirically proved that the SECI is a significant and reliable measure to assess the organizational members' intention to be involved in KM process.

Intensive review of KM literature reveals that there are several organizational factors that should be considered as pre-conditional factors for successful KM implementation. (Lee and Choi, 2003) termed it as KM enablers. Similarly, there are many theories in the information systems (IS)

literature, such as theory of reasoned action (TRA) (Fishbein and Ajzen, 1975), diffusion of innovation (DOI) (Rogers, 1995), theory of planned behavior (TPB) (Ajzen, 1991), technology acceptance model (TAM)(Davis, 1989), unified theory of acceptance and use of technology (UTAUT) (Venkatesh *et al.*, 2003) and so on, which stress on the importance of individual acceptance of any organizational change, such as, initiation for KM process implementation. Accordingly (Karim *et al.*, 2012), as shown in figure 1, have found that there are four significant contributing factors of intention to be involved in KM process; two KM enablers and two individual acceptance factors; namely ‘trust & collaboration’, ‘ICT use and support for search and sharing’, ‘performance expectancy of KM’, and ‘effort expectancy of KM’.

**Figure-1.** Adopted from (Karim *et al.*, 2012)



### 3. MODERATING EFFECTS

A number of moderating factors which influence on the relationship between behavioral intention and its antecedence have been documented in the literature, especially in the information systems literature,. For instance, (Venkatesh *et al.*, 2003) have considered gender, age, experience, and voluntariness of use as moderators in the UTAUT model on behavioral intention. Similarly, (Sun and Zhang, 2006) have classified the moderating factors as organizational factors, technological factors and individual factors. The individual factors consist of gender, age, and experience. User types and usage types have been used in the study of (King and He, 2006) as moderating variable. In addition, (Schepers and Wetzels, 2007) have taken the type of respondents as one of the moderating factors to their study. Furthermore, (AbuShanab and Pearson, 2007) and (Al-Gahtani *et al.*, 2007) have considered gender, age, and experience as moderating variables. Considering the relevancy of these individual characteristics, the factors of gender, age, experience, and management level have been considered in this study as the moderating variables on the relationship between intention to be involved in KM process and the contributing factors. Hence, the following hypotheses were advanced.

H1: The relationship between ‘trust & collaboration’ and the intention to be involved in KM process will be moderated by personal characteristics (gender, age, experience, and management level).

H2: The relationship between ‘ICT use and support for searching and sharing’ and the intention to be involved in KM process will be moderated by personal characteristics (gender, age, experience, and management level).

H3: The relationship between performance expectancy of KM and the intention to be involved in KM process will be moderated by personal characteristics (gender, age, experience, and management level).

H4: The relationship between effort expectancy of KM and the intention to be involved in KM process will be moderated by personal characteristics (gender, age, experience, and management level).

#### 4. METHODOLOGY

Self-administered survey method was used to conduct this research and data were collected from 313 executives of seven companies in the Sri Lankan Telecommunication Industry. This industry was selected because it is considered as one of the most knowledge intensive industries (Wei *et al.*, 2009) in Sri Lanka. Statistical Package for Social Sciences (SPSS) 16.0 was used for data analysis. Table 1 depicts the profile of respondents. The results of factor analysis, reliability test, descriptive analysis, and relationship analysis (stepwise multiple regression analysis) were already reported in (Karim *et al.*, 2012).

**Table-1.** Profile of the Respondents

Characteristics	Item	Frequency	Percentage
Gender	Male	229	73.2%
	Female	80	25.6%
Age	Below 30 years	155	49.5%
	31-35 years	73	23.3%
	36-50 years	79	25.2%
Experience	Below 5 years	110	35.1%
	6-10 years	121	38.73%
	11 & Above years	77	24.6%
Organisational Position	Operational level	174	55.6%
	Tactical level	83	26.5%
	Strategic level	47	15.0%

The moderation effect analysis was carried out using SPSS hierarchical multiple regression following (Coakes *et al.*, 2008). The hierarchical multiple regressions has been advocated as more appropriate method for determining whether a quantitative variable has a moderating effect on the relationship between two other quantitative variables (Baron and Kenny, 1986; Cramer and ebrary, 2003). In this method, the orders in which independent variables are entered into the regression equation were known, and were based on logical or theoretical considerations (Tabachnick and Fidell, 2001; Yiing and Ahmad, 2009).

The following steps were followed for moderation analysis;

1. Correlation analysis was performed based on different level of moderating factors (gender, age, experience, and positions) as a preliminary analysis, which as suggested by (Warner, 2008) would examine any difference in correlation between different level of the moderating variables and the dependent variable.
2. In order to perform the hierarchical multiple regression, the categorical moderating variables were coded using dummy coding technique, which in turn, makes it is easy to implement, and makes the interpretation of the results relatively straightforward (Aguinis, 2004). Accordingly, the gender was coded as “Male = 0, Female = 1”. The other moderating variables; age, experience, and positions, those have three levels, were coded as indicated below:

	D1	D2
<u>Age</u>		
Below 30 Years	1	0
31-35 Years	0	1
36-50 Years	0	0
<u>Experience</u>		
Below 5 Years	1	0
6-10 Years	0	1
11 and Above	0	0
<u>Position</u>		
Operational Level	1	0
Tactical level	0	1
Strategic Level	0	0

3. As recommended by (Cohen *et al.*, 2003), a two-step hierarchical multiple regressions analysis was performed to examine the moderating effect of each moderating variable on the relationship between each independent and dependent variable. In the first step, the main effects represented by independent and moderator variables were entered. In the second step, the moderation effects (Baron and Kenny, 1986), also known as interaction variables were computed as products of independent and moderator variables were entered in the equation. Moderation effects were determined based on following criteria;

- A moderating variable (X2) is a moderator of an independent (X1), dependent variable (Y) relationship if there is an interaction between the independent variable (X1) and the moderating variable (X2) as predictors of the dependent variable (Y) (Warner, 2008)
- A significant increment of R2 (Cohen *et al.*, 2003) in Step 2, indicates the presence of moderation effects (Aguinis, 2004).
- A moderating effect is detected when the regression coefficient of the interaction term is significant. The F-value in Step 2, illustrates the significance of the regression model, which, in turn, represents the moderation effects.

4. Then, the results are interpreted by representing the regression equations graphically in order to explain the way of moderating effect is established.

## 5. FINDINGS

The hypotheses testing gave mixed results and only the 'gender' became as a moderator. The subsequent section describes the findings in detail.

### 5.1. Trust & Collaboration (H1)

The overall correlation between 'Trust & Collaboration' and 'Intention to Be Involved in KM Process' was .483\*\*. Similarly the correlations based on different levels of all moderators (gender, age, experience, and organizational positions) also showed a modest correlation (from .435\*\* to .612\*\*) between these two variables. Hence, the results might be an indication of no moderation effect of personal characteristics on the relationship between 'Trust & Collaboration' and 'Intention to Be Involved in KM Process'. To verify the above indication, a two-step hierarchical multiple regression analysis was performed among these variables. The results (Table 1) confirmed that personal characteristics have no any moderation effect on the relationship between these two variables as there is no significant increment of R2 ( $\Delta R^2$ ) after adding the interaction terms of any moderating variable to the regressions models.

### 5.2. ICT Use & Support for Searching and Sharing (H2)

The overall correlation between 'ICT Use & Support for Searching and Sharing' and 'Intention to Be Involved in KM Process' was .416\*\*. However, the correlations based on different levels of moderators' showed a mixed level of positive correlation between these two variables that designated a possible moderation effect. To verify the above possible moderation effect, a two-step hierarchical multiple regressions analysis was performed and the summary of the results are shown in Table 2. Model 2 of the interaction effect of gender shows the results after the interaction term of gender has been entered. The addition of the interaction term resulted in an R2 change of .013,  $F(1, 305) = 4.698, p < .05$ . This report supports the presence of a moderating effect. In other words, the moderating effect of gender explains 1.3% of variance in 'Intention to Be Involved in KM Process' above and beyond the variance explained by 'ICT Use & Support for Searching and Sharing' and gender.

There is a .147 difference between the slope of 'Intention to Be Involved in KM Process' on 'ICT Use & Support for Searching and Sharing' between the female (coded as 1) and the male (coded as 0). As shown in figure 2, the slope regressing 'Intention to Be Involved in KM Process' on 'ICT Use & Support for Searching and Sharing' is steeper for female as compared to male. In other words, the relationship is stronger for females as compared to male group. That means, making female executives to use ICT more/less will increase/decrease the intention of them to be involved in KM more than their male counterparts.

**Table-1.** Summary of Hierarchical Regression Analysis (H1)

Intention to be involved in KM Process							Change Statistics	
Source	Model 1			Model 2			<i>ΔR<sup>2</sup></i>	<i>Sig. F</i>
	<i>b</i>	<i>SE</i>	<i>t</i>	<i>b</i>	<i>SE</i>	<i>t</i>		
<b>Int. effect of Gender</b>								
<b>R<sup>2</sup></b>	<b>.236</b>						<b>.246</b>	<b>.009</b>
(Constant)	3.461	.200	17.315**	3.681	.229	16.088**		
Trust & Collaboration	.367	.038	9.731**	.325	.043	7.477**		
Gender	.010	.083	.118	-.854	.451	-1.892		
Trust & Col. X Gender				.168	.086	1.946		
<b>Int. effect of Age</b>								
<b>R<sup>2</sup></b>	<b>.237</b>						<b>.240</b>	<b>.002</b>
(Constant)	3.447	.212	16.283**	3.538	.380	9.320**		
Trust & Collaboration	.366	.038	9.665**	.349	.071	4.918**		
AgeD1	.077	.104	.741	-.337	.546	-.617		
AgeD2	.015	.089	.173	.052	.479	.108		
Trust & Col. X AgeD1				.080	.103	.775		
Trust & Col. X AgeD2				-.008	.091	-.084		
<b>Int. effect of Experience</b>								
<b>R<sup>2</sup></b>	<b>.259</b>						<b>.260</b>	<b>.001</b>
(Constant)	3.459	.204	16.938**	3.341	.370	9.023**		
Trust & Collaboration	.361	.037	9.688**	.384	.071	5.424**		
ExpD1	.156	.092	1.692	.405	.482	.841		
ExpD2	-.060	.094	-.639	-.012	.510	-.023		
Trust & Col. X ExpD1				-.048	.091	-.526		
Trust & Col. X ExpD2				-.009	.098	-.094		
<b>Int. effect of Positions</b>								
<b>R<sup>2</sup></b>	<b>.249</b>						<b>.250</b>	<b>.002</b>
(Constant)	3.364	.217	15.500**	3.235	.430	7.519**		
Trust & Collaboration	.378	.038	9.944**	.403	.081	4.950**		
PosD1	.122	.116	1.051	.073	.574	.127		
PosD2	.032	.105	.303	.309	.513	.602		
Trust & Col. X PosD1				.010	.110	.095		
Trust & Col. X PosD2				-.054	.097	-.552		

\*p ≤ .05, \*\*p ≤ .001

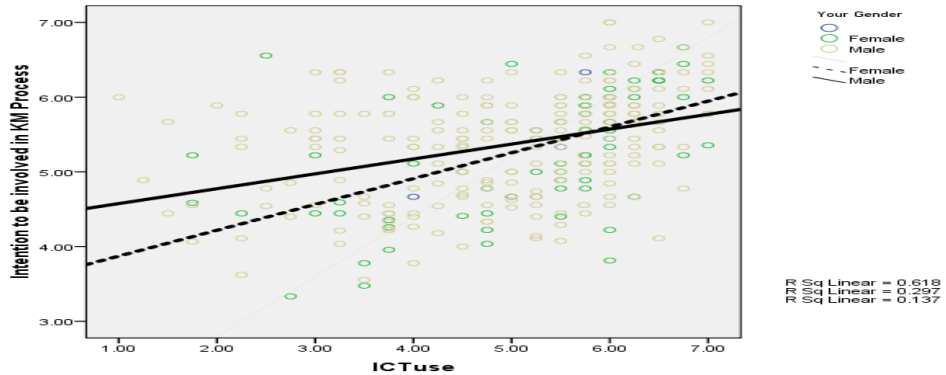
**Table-2.** Summary of Hierarchical Regression Analysis (H2)

Intention to be involved in KM Process							Change Statistics	
Source	Model 1			Model 2			$\Delta R^2$	Sig. F
	<i>b</i>	<i>SE</i>	<i>t</i>	<i>b</i>	<i>SE</i>	<i>t</i>		
Int. effect of Gender								
R <sup>2</sup>				.174			.187	.013
(Constant)	4.199	.151	27.741**	4.377	.171	25.548**		
ICT Use	.235	.029	8.031**	.199	.033	5.951**		
Gender	-.088	.087	-1.018	-.849	.361	-2.349*		
ICT Use X Gender				.147	.068	2.168*		
Int. effect of Age								
R <sup>2</sup>				.175			.181	.006
(Constant)	4.212	.164	25.725**	4.298	.279	15.385**		
ICT Use	.233	.029	7.960**	.216	.054	3.984**		
AgeD1	.043	.108	.396	-.457	.422	-1.082		
AgeD2	-.065	.092	-.703	-.006	.356	-.016		
ICT Use X AgeD1				.100	.082	1.222		
ICT Use X AgeD2				-.011	.069	-.163		
Int. effect of Experience								
R <sup>2</sup>				.188			.190	.002
(Constant)	4.239	.158	26.779**	4.220	.275	15.323**		
ICT Use	.224	.029	7.694**	.228	.055	4.119**		
ExpD1	.103	.097	1.058	-.010	.370	-.027		
ExpD2	-.130	.098	-1.320	.067	.383	.174		
ICT Use X ExpD1				.021	.072	.294		
ICT Use X ExpD2				-.039	.076	-.520		
Int. effect of Positions								
R <sup>2</sup>				.002			.680	.178
(Constant)	4.140	.176	23.581**	4.181	.368	11.369**		
ICT Use	.235	.029	8.032**	.227	.071	3.197*		
PosD1	.076	.122	.623	.218	.463	.469		
PosD2	.029	.109	.261	-.124	.423	-.294		
ICT Use X PosD1				-.028	.090	-.318		
ICT Use X PosD2				.030	.081	.372		

\*p ≤ .05, \*\*p ≤ .001



**Figure-2.** Moderation Effect of Gender on the Relationship between ‘ICT Use & Support for Searching and Sharing’ and ‘Intention to Be Involved in KM Process’.



This suggests that extensive use of ICT and support for searching and sharing probably induce female executives more than the male executives to be involved in KM process in the Sri Lankan Telecommunication Industry. Similar to the factors, such as different orientation between male and female (Eagly, 1987), that contributed for female executive to be more sensitive to the IT support, females’ appreciation for resources and supports (Hu *et al.*, 2010), and females’ willingness to comply with the manifest of the organization than male (Hu *et al.*, 2010) might have influenced ICT use and support for search and sharing as well.

Other than the moderation effects of gender, there is no evidence for any more moderation effect on the relationship between ‘ICT Use & Support for Searching and Sharing’ and ‘Intention to Be Involved in KM Process’ as the change in R2 ( $\Delta R^2$ ) is not significant after adding the interaction of age, experience and organizational position to the regression model.

### 5.3. Performance Expectancy of KM (H3)

The overall correlation between ‘Performance Expectancy of KM’ and ‘Intention to Be Involved in KM Process’ was .497\*\*. Nevertheless, the correlations based on different levels of moderators’ showed a mixed level of positive correlation between these two variables that can be an indication of a possible moderation effect. The two-step hierarchical multiple regressions analysis results as shown in Table 3, model 2 of the interaction effect of gender shows the results after the interaction term of gender has been entered. The addition of the interaction term resulted in an R2 change of .017,  $F(1, 305) = 6.963$ ,  $p < .01$ . This report supports the presence of a moderating effect. In other words, the moderating effect of gender explains 1.7% of variance in ‘Intention to Be Involved in KM Process’ above and beyond the variance explained by ‘Performance Expectancy of KM’ and gender. There is a .201 difference between the slope of ‘Intention to Be Involved in KM Process’ on ‘Performance Expectancy of KM’ between the female (coded as 1) and the male (coded as 0). As shown in figure 3, the slope regressing ‘Intention to Be Involved in KM Process’ on ‘Performance Expectancy of KM’ is steeper for female as compared to male. In other words, the relationship is stronger for females as compared to male group. That

means, increase/decrease in the performance expectancy of KM of the female executives will increase/decrease the intention of them to be involved in KM more than their male counterparts.

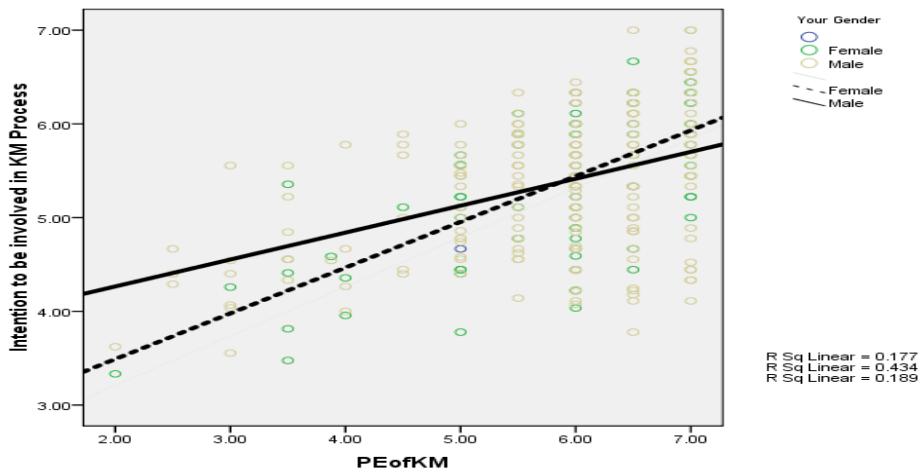
**Table-3.** Summary of Hierarchical Regression Analysis (H3)

Intention to be involved in KM Process							Change Statistics		
Source	Model 1			Model 2			$\Delta R^2$	Sig. F	
	<i>b</i>	<i>SE</i>	<i>t</i>	<i>b</i>	<i>SE</i>	<i>t</i>			
Int. effect of Gender									
R <sup>2</sup>							.265	.017	.009
(Constant)	3.383	.201	16.792**	3.692	.231	15.965**			
PE of KM	.340	.034	10.044**	.287	.039	7.346**			
Gender	-.010	.082	-.127	-.1177	.450	-2.618*			
PE of KM X Gender				.201	.076	2.639*			
Int. effect of Age									
R <sup>2</sup>							.261	.001	.825
(Constant)	3.328	.211	15.765**	3.449	.415	8.315**			
PE of KM	.348	.034	10.272**	.327	.070	4.702**			
AgeD1	.139	.103	1.352	-.147	.536	-.275			
AgeD2	-.040	.087	-.458	-.094	.517	-.182			
PE of KM X AgeD1				.050	.091	.548			
PE of KM X AgeD2				.009	.087	.107			
Int. effect of Experience									
R <sup>2</sup>							.285	.007	.231
(Constant)	3.388	.201	16.843**	3.510	.355	9.900**			
PE of KM	.340	.033	10.219**	.319	.061	5.184**			
ExpD1	.128	.091	1.404	-.397	.476	-.834			
ExpD2	-.149	.093	-1.611	.102	.498	.204			
PE of KM X ExpD1				.090	.081	1.108			
PE of KM X ExpD2				-.042	.085	-.494			
Int. effect of Positions									
R <sup>2</sup>							.272	.005	.354
(Constant)	3.337	.210	15.858**	2.842	.438	6.492**			
PE of KM	.356	.034	10.441**	.445	.077	5.780**			
PosD1	.025	.115	.215	.841	.580	1.450			
PosD2	-.085	.104	-.817	.436	.519	.840			
PE of KM X PosD1				-.145	.101	-1.437			
PE of KM X PosD2				-.094	.090	-1.040			

\*p ≤ .05, \*\*p ≤ .001

This suggests that usefulness of KM probably induce female executives more than the male executives in the Sri Lankan Telecommunication Industry when shaping their attitudes toward KM. This different can be attributed to gender differences, a fundamental socio-cultural factor, that can influence people’s perceptions and behaviors significantly (Gefen and Straub, 1997). According to (Hu *et al.*, 2010), gender plays an important role in determining a person’s frame of reference in evaluating a technology; e.g. usefulness or ease of use. However, some empirical evidence suggests the perceived usefulness as more salient for men than for women (Venkatesh and Morris, 2000), a phenomenon which needs further investigations. Nevertheless, the determination of final behavioral intention does not differ on the gender basis. It implies that the female and male executives similarly rely on the perceived usefulness of KM to make their intention to be involved in KM process.

**Figure-3.** Moderation Effect of Gender on the Relationship between ‘Performance Expectancy of KM’ and ‘Intention to Be Involved in KM Process’.



Other than the moderation effects of gender, there is no evidence for any more moderation effect on the relationship between ‘Performance Expectancy of KM’ and ‘Intention to Be Involved in KM Process’ as the change in R<sup>2</sup> ( $\Delta R^2$ ) is not significant after adding the interaction terms of age, experience and organizational position to the regression model.

**5.4. Effort Expectancy of KM (H4)**

The overall correlation between ‘Effort Expectancy of KM’ and ‘Intention to Be Involved in KM Process’ was .495\*\*. Similarly the correlations based on different levels of all moderators also showed a modest correlation (from .398\*\* to .588\*\*) between these two variables, which suggest that the personal characteristics have no any moderation effect on the relationship between these two variables. The two-step hierarchical multiple regressions analysis also confirmed (Table 4)that there is no significant increment of R<sup>2</sup> ( $\Delta R^2$ ) after adding the interaction terms of any moderating variable to the regressions models.

**Table-4.** Summary of Hierarchical Regression Analysis (H4)

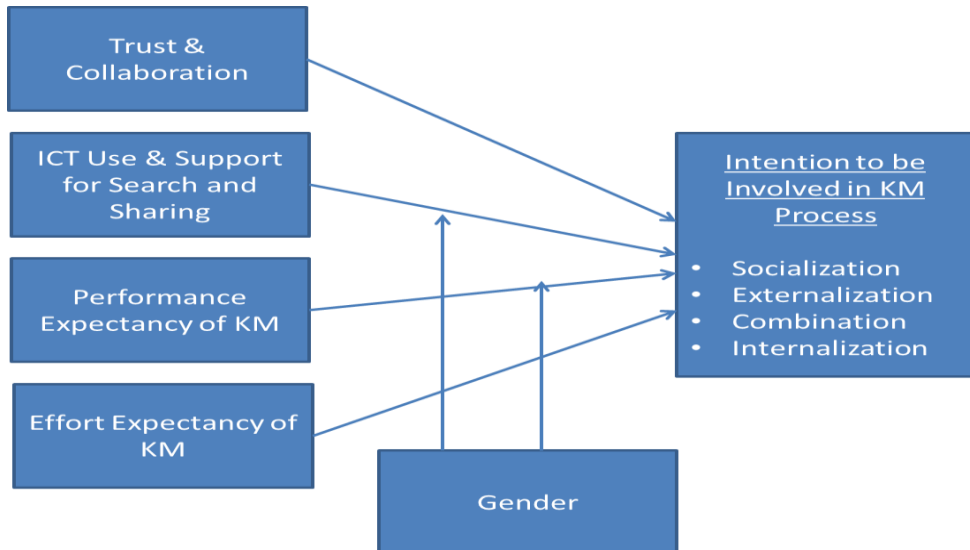
Intention to be involved in KM Process							Change Statistics		
Source	Model 1			Model 2			$\Delta R^2$	Sig. F	
	<i>b</i>	<i>SE</i>	<i>t</i>	<i>b</i>	<i>SE</i>	<i>t</i>			
<b>Int. effect of Gender</b>									
<b>R<sup>2</sup></b>	<b>.247</b>						<b>.250</b>	<b>.003</b>	<b>.240</b>
(Constant)	2.727	.266	10.237**	2.932	.318	9.218**			
EE of KM	.470	.047	10.017**	.434	.056	7.708**			
Gender	-.080	.083	-.962	-.763	.587	-1.301			
EE of KM X Gender				.120	.102	1.177			
<b>Int. effect of Age</b>									
<b>R<sup>2</sup></b>	<b>.250</b>						<b>.258</b>	<b>.008</b>	<b>.216</b>
(Constant)	2.749	.272	10.122**	3.506	.512	6.846**			
EE of KM	.472	.047	10.001**	.336	.091	3.677**			
AgeD1	-.047	.104	-.452	1.194	.761	-1.568			
AgeD2	-.076	.088	-.868	1.062	.637	-1.666			
EE of KM X AgeD1				.204	.133	1.531			
EE of KM X AgeD2				.177	.113	1.563			
<b>Int. effect of Experience</b>									
<b>R<sup>2</sup></b>	<b>.250</b>						<b>.251</b>	<b>.002</b>	<b>.706</b>
(Constant)	2.822	.274	10.313**	3.141	.544	5.780**			
EE of KM	.449	.048	9.434**	.391	.097	4.028**			
ExpD1	.085	.093	.911	-.485	.699	-.694			
ExpD2	-.068	.094	-.723	-.333	.703	-.473			
EE of KM X ExpD1				.101	.123	.821			
EE of KM X ExpD2				.048	.126	.379			
<b>Int. effect of Positions</b>									
<b>R<sup>2</sup></b>	<b>.253</b>						<b>.260</b>	<b>.007</b>	<b>.263</b>
(Constant)	2.636	.282	9.360**	2.027	.693	2.926*			
EE of KM	.474	.047	10.070**	.582	.121	4.790**			
PosD1	.097	.116	.837	1.375	.864	1.591			
PosD2	.051	.104	.485	.511	.776	.658			
EE of KM X PosD1				-.227	.152	-1.495			
EE of KM X PosD2				-.081	.136	-.598			

\*p ≤ .05, \*\*p ≤ .001

**Table-5.** shows the summary of moderation analysis and figure 4 shows the revised research model after the moderation analysis.

**Table-5.** Summary of Moderation Analysis

Hypothesis No.	Independent Variable	Moderators	Explanation
H1	Trust & Collaboration	None	
H2	ICT Use & Support for Searching and Sharing	Gender	Effect stronger for female
H3	Performance Expectancy of KM	Gender	Effect stronger for female
H4	Effort Expectancy of KM	None	

**Figure-4.** Revised Research Model

## 6. CONCLUSION

Gender, age, experience and management level were assumed to be the moderating factors on the relationship between the 'intention to be involved in KM processes' and its contributing factors. However, the findings of moderation analysis show that only the gender deference moderates couple of above relationships in the Sri Lankan Telecommunication Industry. Therefore, these findings suggest that if the policy makers in the industry are planning to implement KM process, they should consider gender differences when making strategic decisions especially regarding IT related factors and making relevancy of KM process with job performances. The managers should give more consideration to provide more IT facilities if the workforce at executive level comprises more female than male. Similarly, the potential improvement of the job performance as a result of involving in KM process also should be made explicit to get the maximum from the female executive towards KM process.

The moderation hypotheses were advanced in this study based on information systems literature where the relationship between intention and its antecedence were believed to be moderated by the personal characteristics of the respondents. However, the findings of this study create an indistinct whether the moderation effects of personal characteristics is only applicable in the information systems adoption/success environment. This question warrants further empirical clarifications.

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