

Knowledge Sharing Patterns among Undergraduate Students in Universiti Teknologi MARA (UiTM) Johor, Malaysia

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Abstract

Due to the technology cultured in today's world, the learning process has started to change. Student nowadays are persistently required to do some transformation in gaining knowledge. Concerning to this, a considerable Knowledge Management (KM) are important so that students are expected to gain the capability of managing their knowledge and to achieve their superior performance. As the consequence, Knowledge Sharing (KS) process will be subsist, as KS is a part of KM. By implementing KS, students will share their knowledge better with their friends in a diligence ways and platform. Two research objectives were addressed in this research that is to examine how culture affect knowledge sharing among Information Management Undergraduate Students' in UiTM Johor and to investigate the behaviours of Information Management Undergraduate Students' in UiTM Johor when sharing their knowledge among colleagues. This study use quantitative method to collect and gather the data in which Probability Sampling that is Unrestricted or Simple Random Sampling are chosen as the Sampling Techniques. The researchers are able to collect 70 percent of the distributed questionnaires. Findings show that knowledge sharing activities does exist in UiTM Johor. This study proposed some changes in attitudes and behaviors, trust and innovation, top management support, strong relationship between academicians

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and students and lastly, rewards to reinforce knowledge sharing behaviors as the recommendation to the organization.

Keywords: Knowledge sharing, culture, behaviors, trust, Undergraduate students.

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Introduction

The indulgence of information in this age presented one platform for the utilization of information among students in their learning process. Students currently exposed to the variety of resources available that assists them in their learning development. Thus, embarking of this information simultaneously will lead towards the Knowledge Sharing (KS) activities, especially when there is a demand in education field. Through the centuries, KS has given benefit to both individuals and groups (Tohidinia, 2010). Research has provided much evidence that KS collaborative learning results in reflection and learning (Walker, 2002), and all participants benefit in terms of cognitive gains and positive learning outcomes (Rafaeli and Ravid, 2003). Despite growing recognition of the importance of knowledge influences on KS, there is a lack of related empirical research in education field. Thus, this study attempts to discover how culture and behaviour act as a mechanism in sharing knowledge among Undergraduate Students in UiTM Johor. As emphasized by the Deputy Director-General of Education, Datuk Dr Amin Senin the transformation of the education curriculum in the Malaysia Education Development Plan (PPPM) 2013-2025 focuses on the Higher Order Thinking Skills (HOTS) concept which aims to produce knowledgeable students who are critical and creative in their thinking and can compete at the international level. Based on the demands in education field nowadays, students are required to have a good knowledge sharing activities in order to fulfill the goal of Malaysia Education Plan. Unfortunately, studies done by Alstyne (2005) found that the lack of trust is an important factor as it is the key to positive interpersonal relationships in various circumstances which encourages knowledge sharing. It was supported by Ikhsan and Rowland, (2004) when they found that lack of time and non-existence of knowledge sharing culture in the learning environment are likely to impede knowledge sharing among students.

Objectives

- To examine how culture affects knowledge sharing among Information Management Undergraduate Students' in UiTM Johor.
- To investigate the behaviour of the Information Management Undergraduate Students' in UiTM Johor when sharing their knowledge among colleagues.

Literature Review

Knowledge Sharing (KS)

Generally, knowledge sharing is about communicating information or knowledge within a group of people. The group may consist of professionals engaged in a formal organization, colleagues in a workplace, or even interaction between friends that can be simplified as a communication involving two or a multiple of individuals. The underlying purpose of communication is to utilize available facts or information in order to improve individual understanding (Alavi and Leidner, 1999 and Salisbury, 2003). Tsui (2006) in his study found that knowledge sharing is defined as the process of exchanging knowledge like skills, experience, and understanding among researchers, policymakers, and service providers. Knowledge sharing is becoming increasingly important to ensure that practice and policy are based on sound evidence. On the other hands, Ming et al (2008) added that individuals share what they have learned and transferred what they knew to those who have the collective interest and who have found the knowledge useful. The sharing process consists of collecting, organizing and conversing knowledge from one to another (Hooff and Ridder, 2004).

As the sharing process involves more than just collecting data and information, generally, the value of knowledge will be extended when it is shared and moreover when it is applied. Normally, KS is identified as a process through which explicit or tacit knowledge is communicated to other individuals. KS may take place across individuals as well as across groups, department or organizations. KS means effective transfer, so that the recipient of knowledge can understand it well enough to act on it. The former involved the recipient acquiring the shared knowledge as well as having the ability to take action based on it (Abdus Sattar 2005).

Cummings (2003) on the other hand identified KS as the means by which an organization obtains access to its own and other organizations' knowledge. Successful KS involves extended learning processes rather than simple communication processes. According to Teece (2000), KM involved the panoply of procedures and techniques used to get the most from an organization's tacit and codified know-how. KS is a deliberate act in which knowledge is made reusable for one party through its transfer by another places more emphasis on the knowledge transfer process.

In general, KS occurs at the individual and organizational levels. At individual level, KS involves talking to colleagues to help them obtained something in a better way, more quickly, or more efficiently. Meanwhile, for an organization, KS is capturing, organizing, reusing, and transferring experience-based knowledge that resides within the organization and making that knowledge available to others in the business. A number of studies have demonstrated that KS is essential because it enables organizations to enhance innovation performance and reduce redundant learning (Calantone et al., 2002; Scarbrough, 2003).

Culture in Knowledge Sharing

Studies done by Yang (2006) found that culture is not genetically inherited, and cannot exist on its own, but is always shared by members of a society. Yang (2006) defines culture as the collective programming of the mind which distinguishes the members of one group from another, which is passed from generation to generation, and it is changing all the time because each generation adds something of its own before

passing it on. It is usual that one's culture is taken for granted and assumed to be correct because it is the only one, or at least the first, to be learned.

Connelly and Kelloway (2003), in their findings stated that culture involves what people think, what they do, and the material products they produce. It is shared and it is a social phenomenon. Culture is learned, not biologically inherited, and involves arbitrarily assigned, symbolic meanings. Meanwhile, Jervis (2006) claim that culture is that it is learned and transmitted from one generation to the next, rests on the human capacity to think symbolically. Language, perhaps the most important feature, is a symbolic form of communication. The word table, for example, is nothing other than a symbol for the actual thing, a table. Language is a form of communication. Without language, culture could not be transmitted, people could not learn from one another across generations, and there would be no cultural continuity.

Chaudhry (2005) stated that culture plays an important and influential role in KS, for example the Kiasu attitude (afraid to lose mentality) is considered a distinct character of Singapore culture. 'Kiasuism' in Singapore society has been found a major barrier in KS in several studies. A number of researchers have pointed out that there is no initiative to help knowledge workers cope with job insecurities resulting in a mentality is also associated with 'knowledge is power'. It is difficult to eliminate 'kiasuis' but it can be managed to reduce the detrimental effects it has on KS.

Behaviours in Knowledge Sharing

Kim and Lee (2006) address that attitude toward a specific behaviour is defined as a person's evaluation of that behaviour when deciding to perform it. Behavioural control is the person's perception of the extent to which she or he has control over a specific behaviour (Ajzen and Fishbein, 2005). Lin and Lee (2004) found that perceived behavioural control had a positive effect on intention to share knowledge. The lack of perceived behavioural control may negatively affect intention to share knowledge. People's intention to share knowledge is a determiner of desired behaviour (Ryu et al., 2003).

It was supported by Connelly and Kelloway (2003), when they defined knowledge sharing as a set of behaviours that involve the exchange of information or assistance to other. It is separate from information sharing, which typically involves management making information on the organization available to employees. Whereas knowledge sharing contains an element of reciprocity, information sharing can be unidirectional and unrequested.

Based on interviews conducted in 20 organizations Abrams, Cross, Lesser, and Levin (2003) identified ten behaviours and practices that promote interpersonal trust in a knowledge sharing context. They suggested that the effectiveness of these "trust builders" (e.g., engage in collaborative communication and disclose one's own expertise and limitations) depends on characteristics of the organization. Trust has also been examined as an antecedent or mediator of knowledge sharing (e.g., Butler, 1999; Lin, 2007b).

Research has shown that affect- and cognition-based trust have positive influence on knowledge sharing at the dyadic and team levels (Chowdhury, 2005; Mooradian, Renzl, & Matzler, 2006; Wu et al., 2007). Further, Bakker et al. (2006) examined three dimensions of trustworthiness: capability, integrity, and benevolence. They found that individuals tended to share less knowledge with team members whom were perceived to be very capable (capability) and share more knowledge when they believed other team members were honest, fair and followed principles (integrity). Whether a trustee was believed to have good will to the trustor (benevolence), however, was not significantly related to knowledge sharing.

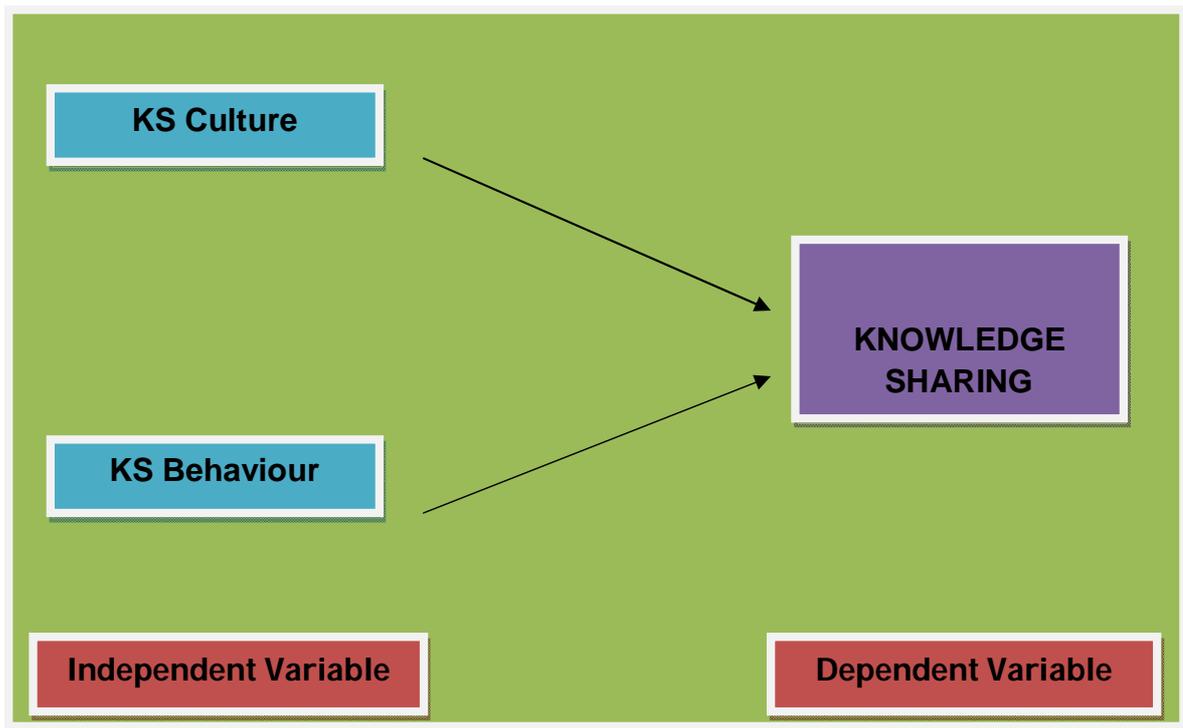


Figure 1: Basic Research Framework

Research Methodology

This study is a descriptive research and it used quantitative measures to collect and gather the data. Questionnaires were used as the instruments for data collection. The population of this study were those students from the Faculty of Information Management in UiTM Segamat Johor which are 181 students. This research used convenient sampling. According to Krejcie and Morgan Table (1976) for determining the valid sample size of the given population, the minimum number of respondent that can represent the 181 total population is about 118 students. 130 questionnaires were sent, and only 91 of them were returned and usable. Data were analyzed by using SPSS Software Version 20.0.

Findings and Discussions

Table 4.1 shows the demographic profile of the students. Majority of the students who answered the questionnaires were female (68.8%) and only 31.2 percent were male. Most of them are 23 years old (40.9%) and majority of them were from semester four and six (33.3%). More than half of them have CGPA's of 3.00 to 3.49 (65.6%).

Table 1 Demographic background

	frequency	Percentage (%)
Gender		
<i>Male</i>	29	31.2
<i>female</i>	64	68.8
Age		
<i>20 years old</i>	6	6.5
<i>21 years old</i>	29	31.2
<i>22 years old</i>	20	21.5
<i>23 years old</i>	38	40.9
Semester		
<i>Three</i>	21	22.6
<i>Four</i>	31	33.3
<i>Five</i>	10	10.8
<i>Six</i>	31	33.3
CGPA		
<i>3.50 – 4.00</i>	11	11.8
<i>3.00 – 3.49</i>	61	65.6
<i>2.50 – 2.99</i>	20	21.5
<i>2.00 – 2.49</i>	1	1.1

RQ1: How far cultures affect knowledge sharing among Information Management Undergraduate Students' in UiTM Johor?

The finding shows that culture somehow plays crucial role in influencing knowledge sharing among community. Among these students' community it can be indicated that most of them agree ($m = 4.1662$, $std. dev. = .38421$) that culture does help in enhancing knowledge sharing among them. Most of them claimed that knowledge sharing is a part of their learning process (97.8%) and it is also a part of their knowledge based (93.6%). They further agreed that knowledge sharing often takes place when they care about the needs of each other's (92.5%). The findings somehow are consistent with study conducted by Tai-Kuei Yu, Long-Chuan Lu and Tsai-Feng Liu (2010) when their findings also implies that knowledge sharing culture does play a role as a motivator of formalized knowledge sharing. Chih-Jou Chen and Shiu-Wan Hung (2010) in their studies discovered that knowledge sharing self-efficacy plays a vital role the

knowledge- sharing activities and was found to influence members' knowledge contributing and collecting behaviors. Supported by Sheng Wang and Raymond A. Noe (2010) in Cabrera et al., 2006; Lin, 2007 stated that several studies have shown that individuals who are more confident in their ability to share useful knowledge are more likely to express intentions to share knowledge and report higher levels of engagement in knowledge sharing..

Table 2 Culture in Knowledge Sharing

items	Disagree	Neither	Agree	Mean	Std. Deviation
1. Knowledge Sharing is a part of my knowledge base.	1.1	5.4	93.6	4.1183	.52852
2. Knowledge sharing is a part of my learning process.	-	2.2	97.8	4.2366	.47544
3. Knowledge sharing takes place when students care about the needs of each other's.	-	7.5	92.5	4.2043	.56259
4. I always share my knowledge with my colleagues.	-	11.8	88.2	4.2366	.64938
5. I am confident to provide knowledge to others when they considered it as a valuable.	-	15.1	84.9	4.1505	.65849
6. It is my pleasure to share my experience and knowledge with colleagues voluntary.	-	10.8	89.2	4.2796	.64884
7. I will notify my colleagues when I learned something new.	-	15.1	84.9	4.1720	.66958
8. I like to share my information with my colleagues by using social network.	2.2	11.8	86	4.2258	.73911
9. I am encouraged and motivated to share knowledge in learning environment.	-	10.8	89.2	4.0538	.51848
10. Colleagues like to share their experiences and ideas with me.	1.1	10.8	88.1	4.1505	.64177
11. I will be informed by my colleagues when they learned something new.	3.2	15.1	81.7	4.0000	.70711
Total Mean				4.1662	.38421

RQ 2: How far have behaviours leads to knowledge sharing among the students in UiTM Johor in sharing their knowledge among colleagues?

The findings indicate that most of them neither agree nor disagree ($m= 3.4774$, $std. dev. =.71128$) that trust are an important part of behaviour as the willingness to rely or depend on some event, individual, or group in having the effective knowledge sharing activity. However, most of the respondents stated that trust plays a critical role in facilitating deeper exchange of relationship in knowledge sharing (92.4%). They also concurred that trust is a necessary condition in knowledge sharing (92.5%) and trust can facilitate knowledge sharing if it is warranted (90.3%). Research done by Hsua, et al. (2007) shows that personal outcome expectations have significant influence on knowledge sharing behavior. This finding is consistent with Bock and Kim's study (2002). They argue that if individuals believe they could improve relationships with others by offering their knowledge, they would develop a more positive attitude toward knowledge sharing. The greater the anticipated reciprocal relationships are, the more favorable the attitude toward knowledge sharing will be (Bock et al., 2005). The findings somehow are consistent with study conducted by Adel Ismail Al-Alawi, Nayla Yousif Al-Marzooqi and Yasmeen Fraidoon Mohammed (2007) in which their findings found that the mean for trust increases among the categories of respondents as their knowledge sharing assessment improves. In other words, knowledge sharing is positively related to trust. Chih-Jou Chen and Shiu-Wan Hung (2010) studies recovered that interpersonal trust significantly and positively influenced members' knowledge contributing and knowledge collecting behaviours. These were supported by Zarraga and Bonache. (2005), when their studies found that the impact of the team atmosphere on knowledge outcome provides evidence that a favourable atmosphere within the group encourages individuals to share knowledge.

Table 3 Behaviour in Knowledge Sharing

	Disagree	Neither	Agree	Mean	Std. Deviation
1. Trust can facilitate knowledge sharing if it is warranted.	1.1	8.6	90.3	4.0108	.49988
2. Trust is a necessary condition in knowledge sharing.	1.1	7.5	92.5	4.1183	.50754
3. Trust plays a critical role in facilitating deeper exchange of relationship in knowledge sharing.	1.1	6.5	92.4	4.1505	.57002
4. I am aware and curious of the knowledge other colleagues have.	2.2	24.7	73.1	3.8817	.70479
5. I often feel anxious in sharing the proprietary information.	11.9	32.3	47.7	3.5484	.87869
6. I'm a person who difficult to believe when I receive information.	14.0	38.7	47.3	3.4731	.97347

7. I will investigate the reliability of information	1.1	19.4	79.5	4.1075	.74400
8. I will spread information even I know the information is unauthentic.	25.8	21.5	52.7	3.3441	1.29795
9. I have enough time to share knowledge with my colleagues.	3.2	23.7	73.1	3.9892	.81420
10. I have the mindset that sharing knowledge is a type of plagiarism.	50.6	8.6	40.8	2.8495	1.35892
11. I feel that I might be penalized by the lecturer for sharing information and knowledge with my colleagues.	37.6	17.2	45.2	3.0215	1.28519
12. When I share knowledge with my colleagues, I believe I will lose my knowledge.	59.1	7.5	33.4	2.4731	1.47877
13. Mis-apply or misuse is the reason why I am afraid to share my knowledge with my colleagues.	38.7	19.4	41.9	3.0538	1.21015
14. I prefer to share my knowledge with colleagues rather than acquired knowledge from colleagues.	29	28	43	3.2688	1.22598
15. I hate to share my knowledge with colleagues but I love to acquire knowledge from others.	47.3	14	38.7	2.8710	1.49074
Total Mean				3.4774	.71128

Recommendation

The results of this study have many implications for the students and the univeristies. The relationship proved to exist between knowledge sharing and culture, behavior and trust indicates that those importance factors prerequisites for the accomplishment of knowledge sharing. Thus, there are some recommendation given that should be emphasized in universities so that the process of sharing goes smoothly and success. First, a culture emphasizing trust and innovation is conducive to knowledge sharing. It appears that the importance of organizational culture lies in its ability to have a direct effect on students ' knowledge sharing behavior. Students should be exposed to the sharing concept during their learning period. Second, accomplishing a strong relationship between academicians and students along with expressing the significance

of knowledge sharing. Third, top management should provide sufficient information systems to share knowledge in order to facilitate knowledge diffusion among students. Fourth, effective rewards to reinforce knowledge sharing behaviors bearing in mind the variations in students' needs and objectives by the academicians. By rewarding system, students will feel appreciate and this will lead to the continuation of sharing process with the others.

Future Research

In future research, more research is required to further investigate and seek for others potential Undergraduates Students. Hence, this will boost up Malaysian Higher Education System in order to support the student learning style preferred. Furthermore, it is encouraged to further extent the research by examine the relationship on students and technology. And, it is significance to conduct a comparative study in between Undergraduate students in Malaysia Public Universities and Malaysia Private Universities. Hence, this might provide strong benefit towards Malaysian government and Ministry of Higher Education in producing more students with a high quality and skill as demand by organization.

Conclusion

This study has revealed the clear pictures on how Undergraduate Students' in UiTM Johor share their knowledge with their colleagues in the helicopter view. Thus, UiTM Johor will have the chances on improving the culture of knowledge society evolution in Malaysia. This study also attempts to discover the behaviours of Undergraduate Students' in UiTM Johor in their learning process. Furthermore, this study has divulged on how Undergraduate Students' in UiTM Johor used technology as an enabler in sharing knowledge through internet and e-collaboration a system for training and learning through virtual communities such as the using of Student Portal, I-LEARN and Blended Learning in their learning development. It are expected that this study contribute in developing a general understanding about the knowledge-sharing behavior of university students, which will help UiTM Johor, especially to the educators in selecting an appropriate learning approaches to encourage more interaction and knowledge sharing culture among students. It is expect that the study on knowledge sharing among Information Management Undergraduate Students' will be expand to other existing faculty in UiTM Johor so that the management of UiTM can disclose the actual information culture subsist among their students in the learning process.

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