MOBILE LEARNING: ENHANCING COMPANY LAW LEARNERS' PARTICIPATION IN THE MYLMS FORUM

Rosmah Mohamed, Faculty of Business and Management, Open University Malaysia, Malaysia, rosmah_mohamed@oum.edu.my

Tuan Fatma Tuan Sulaiman, Faculty of Business and Management, Open University Malaysia, Malaysia, tuanfatma@oum.edu.my

Jaspal Kaur Naranjan Singh, Faculty of Information Technology and Multimedia Communications, Open University Malaysia, Jaspal_kaur@oum.edu.my

Wei Wen Shyang, Faculty of Science and Technology, Open University Malaysia, Malaysia, wswei@oum.edu.my

Abstract:

The interest in mobile learning has increased tremendously in recent years due to the changes in wireless technology and handheld devices. This paper attempts to answer the following questions of What are the patterns of learners' participation in the myLMS forum for learners whose learning is facilitated by the SMS tutoring?; and Is there any difference in the pattern of learners' participation in the myLMS forum for learners whose learning is not facilitated by the SMS tutoring? SMSes containing keywords were sent to learners throughout the September 2009 semester. Randomly stratified data were collected from five tutors' forums for the Company Law subject in September 2008 and September 2009 semesters. The results showed that SMS tutoring has increased the number of postings for at least two tutors' forums in the year 2009 for all keywords. We hope that further research on the learners' performance for the same subject for subsequent semesters will be carried out.

INTRODUCTION

Open University Malaysia and its blended pedagogy delivery mode

Open University Malaysia (OUM) was established in August 2001 by a consortium of 11 public universities in Malaysia. OUM adopts the motto "University for All" in line with its philosophy of democratisation of education. This philosophy underlies the belief that education should be made available to all, regardless of time, place, age and social economic background. Starting from a humble enrolment of 753 learners in August 2001, OUM's enrolment has now exceeded 89,000 learners. Currently, OUM has five faculties and one school which offer 72 diploma, degree, master and PhD programmes. To date, OUM has produced more than 20,000 graduates.

OUM practices a blended form of pedagogy (Figure 1) which consists of self-managed learning, face-to-face learning and online or e-learning to provide learners with guidance and attention parallel to that of an actual classroom. Self-managed learning forms the most important part of OUM's delivery mode. In this mode, learners are provided with learning materials such as print modules, CD ROMs and other materials to facilitate self-managed learning. For each course, learners will attend five face-to-face tutorial sessions which are conducted during weekends. These tutorial sessions are conducted twice a month and lasts for two hours for each session. Tutors for these tutorials are appointed from qualified academics from various public and private higher learning modes, learners participate in online forum discussions through OUM's learning management system which is known as myLMS. This online discussion platform enables learners to ask and discuss any matters related to the course such as the assignments and the course content, with their peers and tutors. They may also share learning resources for the course.

Short messages system (SMS) tutoring

SMS tutoring is based on the short messaging system technology to deliver the messages to the learners. It is a complement to the face-to-face tutorials in open and distance learning (ODL) mode of which the meeting time between the tutors and learners is limited to ten hours per semester (Abas 2009). The messages were designed to enhance learning by triggering learners to perform specific learning tasks related to the print module, face-to-face tutorials or online discussions. Thus, it is to enhance the three primary learning modes in OUM blended pedagogy (Figure 2).

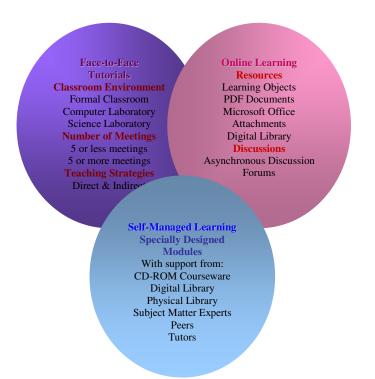


Figure 1: OUM's blended pedagogy delivery mode

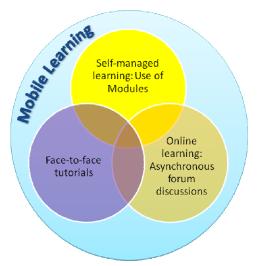
As the market leader in the ODL industry in Malaysia, OUM consistently innovate new ideas for teaching and learning purposes for the best of its current and potential learners. To further enhance learners learning resources, OUM decided to embark on the mobile learning to compliment the existing learning mode. For example, in May 2009, OUM has initiated a mobile learning project using SMS tutoring to support learners' learning and engage them in the learning process. The subject of Learning Skills for Open and Distance Learners (OUMH1203) was chosen for the pilot project. This mobile learning project was continued in September 2009 semester with more subjects involved. The subjects involved were Learning Skills for Open and Distance Learners (OUMH1203), Company Law (BBUS2103) and Renal Nursing (NBNS3504). The project is still on-going as to give opportunities to other learners to experience the mobile learning via SMS tutoring approach.

The SMS used in this mobile learning project consists of five categories which are content, forum, tips, motivation and course management. Each category has its own purpose. For example, the purpose of Forum category of SMS is to remind and motivate learners to participate in discussion forums (Table 1).

Category	Content	Forum	Tips	Motivation	Course
					management
Purpose	To help learners locate/remember important course facts easily	To remind and motivate learners to participate in discussion forums	To provide hints/strategies to learners on how to do well in their studies	To motivate learners to persevere in the learning process	To provide timely announcements/ reminders on tutorial dates, assessments and other aspects related to course management

 Table 1: Categories of SMS and purposes





Acknowledging the advantages of using mobile learning via SMS tutoring, the question now is to what extent the SMS tutoring enhances the learners' participation in the myLMS forum. What are the patterns of learners' participation in the myLMS forum for learners whose learning is facilitated by the SMS tutoring? Is there any difference in the pattern of learners' participation in the myLMS forum for learners whose learning is not facilitated by the SMS tutoring? This study will attempt to answer those questions.

LITERATURE REVIEW

Mobile Learning

Mobile learning is learning via handheld devices such as Personal Digital Assistants (PDAs), mobile phones and laptops (Taniar 2009). As defined by MOBIlearn (2003), mobile learning is "any sort of learning that happens when the learner is not at a fixed, predetermined location, or learning that happens when the learner takes advantage of the learning opportunities offered by mobile technologies". It is a new learning paradigm emerged when the advances in computer technology, intelligent user interfaces, context modeling applications and advances in wireless communications have offered a wide array of new possibilities for technology users (Paul 2007). Mobile learning is becoming an important learning platform for the learners. Generally, the wireless mobile devices that can be considered for mobile learning are notebook, tablet personal computer, PDAs and mobile/smart phone. According to the Malaysian Communications and Multimedia Commission Report (2008), the penetration rate of mobile phones in Malaysia is high, at 96.8%. Whereas the number of personal computer owners is relatively low at 35%. This gives high potential to mobile learning application via mobile phone especially among the ODL learners.

According to the observation of Valentine (2004), he drew three conclusions about mobile learning as follows:

- i) Mobile learning is a sub-set of e-learning. Mobile learning need to be considered within a blended learning mode in the same way as other learning delivery mode.
- ii) Mobile learning is meant to enhance to learners learning experience, not a primary method for delivery course.
- iii) Mobile learning is a very powerful method for engaging learners especially for ODL learners which face to f ace meeting is very limited.

Flexibility

The ideal of learning 'anytime anywhere, accessible to the masses, but tailored to the individual (Thomas 2005) is considered as a goal for pervasive learning environment in the digital age. This is particularly crucial for the ODL environment. In term of learning flexibility, learners should be given choice when and where they learn. Flexibility offer by mobile learning can support self managed learning, one of the important component of the OUM blended learning mode. It support the learners chosen learning environment and provide engagement with a personalised learning that will improve learner's motivation (Ostlund 2008).

Engagement

As ODL learners, the attrition rate is higher than the traditional classroom based university. Hence, the effective and efficient blended learning that able to engage the learners are very important. Field (2005) said, "achieving effective learning requires learners-centred approach that encourages engagement with module content and concepts". Through the use of mobile learning, it can support and engage the learners by providing study tips, course summary and positive motivating affirmation. Abas (2009) found that mobile learning via SMS tutoring is helpful in motivating learners to participate in online discussion forum. Jaspal (2005) research of frequency of online interaction and learners achievement found that the higher the frequency of learners participation in the online forum, the higher the examination achievement.

As a conclusion, learners' interaction and participation in the myLMS forum are vital to enhance their learning process. The advances in wireless communications have offered a wide array of new possibilities for learners to experience their learning process more flexible. Hence, engaging the ODL learners via SMS tutoring to increase the participation rate in the myLMS forum is very important to their learning success.

The general purpose of this paper is to examine the pattern of learners' participation in the myLMS forum in OUM. In particular, this paper aims:

- i) to examine the pattern of learners' participation in the myLMS forum for learners whose learning is facilitated by the SMS tutoring;
- ii) to examine the pattern of learners' participation in the myLMS forum for learners whose learning is not facilitated by the SMS tutoring;
- iii) to compare the pattern of learners' participation in the myLMS forum between the learners whose learning is facilitated by the SMS tutoring and learners whose learning is not facilitated by the SMS tutoring.

Research Methodology

This study is a descriptive study which examines the pattern of learners' participation in the myLMS forum for the learners whose learning is facilitated and is not facilitated by the SMS tutoring. To achieve the aims of this study, quantitative method was applied. The samples were learners from various faculties, programmes, and levels who enrolled in the Company Law (BBUS2103) subject in September 2008 and 2009 semesters in OUM. There were 52 tutors and 828 learners involved in this study. Table 2 shows the number of tutors and learners involved in this study. Five tutors were selected at random from the population. These tutors have taught BBUS2103 in both September 2008 and September 2009 semesters.

Samula	Sem	Total		
Sample	September 2008	2008 September 2009		
Tutor	30	22	52	
Learner	585	243	828	

Data for September 2008 and 2009 semesters were gathered from the myLMS archive and were classified according to 13 keywords from nine prominent SMSes sent to the learners in September 2009. The nine SMSes were from the Forum category of SMS (Table 3). The purpose of this category of SMS is to encourage learners to discuss in myLMS forum. The subject of BBUS2103 was chosen for this paper. BBUS2103 is one of the courses offered by the Faculty of Business and Management. It is offered to learners pursuing the degree in Bachelor of Business Administration, Bachelor of Accounting, and Bachelor of Information Technology and Management. The objective of this subject is to provide the learners with the knowledge of the principles of Malaysian Company Law relevant to the discipline of business and accounting.

No.	SMS	Keyword	Category
1.	There are 4 types of business structure in Malaysia. Discuss the advantages and disadvantages of each type in the forum. Refer to 1.2 and 1.3	Business structure, sole proprietorship	K1
2.	Why is partnership business structure very popular among entrepreneurs in Malaysia? Discuss in myLMS forum. Refer to 1.3.2	Partnership	K2
3.	Can an article of association be altered without reference to the MoA or Companies legislation? Discuss your views in the forum. Refer to 3.3	Article of Association, Memorandum of Association	К3
4.	Discuss the development of the ultra vires rules in the forum. Refer to 2.2	Ultra vires	K4
5.	If a person is a shareholder of a company, does that mean the person is also a member of a company? Discuss in the forum. Refer to 4.2	Shareholder, member, membership	K5
6.	In your opinion can a company return paid up capital to the respective members? Why? Discuss in myLMS forum. Refer to 8.2.	Capital	K6
7.	Go to Figure 7.1 and Table 7.1 in sub topic 7.1.2 and discuss them with your tutor and classmates in the forum.	Corporate finance	K7
8.	What are the key fiduciary obligations of company directors? Refer to 5.5.2 and discuss in the forum.	Directors	K8
9.	What are the duties of a liquidator? Discuss in the forum.	Liquidators	К9

Table 3: Nine SMSes from Forum category and their keywords

The procedure of data collection

The selected tutors archive forum postings were taken and analysed for the 13 keywords. These 13 keywords taken from the SMSes represent key concepts in the BBUS2103 topics. Since certain keywords are related, they are classified into nine categories K1 to K9. Each posting that had a keyword was highlighted and counted. If same keyword occurs in the same posting, it is not counted. Data were sorted in the excel worksheet by year, keyword, and tutor (Table 5).

Findings and Discussions

Five tutors were chosen from the population, having met the criteria that they have taught the same course in September 2008 and September 2009 semesters. The list of tutors and the forum posting data is shown in Table 4. The number of learners in each tutor's is higher in September 2008 than in September 2009, which then correlates with the number of overall postings in each of the forums.

	Number of Posting by tutor		Overall Posting		Number of Learners	
Tutor	2008	2009	2008	2009	2008	2009
Abd Aziz Abdullah (T1)	61	40	277	184	20	13
Dayang Siti Nurbani (T2)	125	81	928	357	34	11
Hatman Abdullah (T3)	12	8	160	159	14	11
Mohair Nizam Johari (T4)	82	101	625	429	23	24
Putera Ab Rahaman (T5)	74	125	309	288	19	6

Table 4: Forum posting data by selected tutors

Based on the SMS sent to the learners and tutors, 13 keywords were chosen that best represent the chapter's discussion for that week. The list of categories of keywords is given in Table 3. Each of the forum postings were observed for the occurrences of the keywords. The occurrence of a unique keyword for one forum posting contributed towards the total. From the totals, the percentages of totals for each tutor were calculated against the total number of postings for that tutor. The data is shown below for each of the categories in Table 5.

Category	Year	T1	T2	Т3	T4	Т5
K1	2008	0.7	1.2	0.6	1.3	2.9
	2009	2.2	2.0	0.0	3.3	3.8
K2	2008	5.4	3.3	2.5	4.3	5.2
	2009	1.1	2.5	0.0	6.5	8.7
K3	2008	5.4	1.5	9.4	1.4	1.9
	2009	0.5	6.4	5.0	3.7	20.5
K4	2008	1.1	1.9	1.9	0.6	1.6
	2009	1.6	2.0	0.6	4.0	21.5
K5	2008	8.3	3.3	3.1	5.0	5.8
	2009	3.3	26.3	5.7	13.3	17.0
K6	2008	6.9	4.2	1.3	4.0	1.0
	2009	2.7	7.8	3.1	23.3	29.5
K7	2008	0.0	0.0	0.6	0.0	0.0
	2009	0.0	0.0	0.0	0.5	0.0
K8	2008	10.5	15.6	5.0	4.3	8.7
	2009	3.3	10.9	8.8	36.8	12.8
K9	2008	1.1	4.3	1.3	1.9	2.9
	2009	1.1	1.7	3.8	8.9	0.7

Table 5: Percentages of number of categories against total postings

From this data, a bar chart is presented in Appendix A, which shows that the comparison for the five tutors's forum postings for years 2008 and 2009. It can be observed that some keywords are more frequently discussed than others. K7 seems to be the only one that is consistently not discussed by all tutors and learners in both the years. The analysis of data by each category is given in Appendix B, where the data is compared for each of the five tutor's forums for the two years.

From our observation, the data for K1 to K4 have elevated percentages for T4 and T5 in 2009 compared to 2008. This is also true for T2, except for K2. Nevertheless, T1 can be observed having higher percentage for K2 and K3 in the year 2008. Also, T3 has omitted K1 and K2 in the year 2009. T5 seems to regard K4 highly in 2009 compared to 2008. This is because the K1 to K4 are basic principles that the learners have to know, and the tutors have consistently discussed the subject matter with their learners.

K5 and K6 are part of two topics that have consistently higher levels of percentages by T2, T3, T4 and T5. The exception is T1, where it could be due to many reasons, which are only known to the tutor. K7 is regarded as an unpopular topic for all tutors, except for T3 in 2008 and T4 in 2009. This again could be due to many reasons, one of which is that this topic is only briefly discussed in the BBUS 2103 module. K8 is part of the assignment for 2009. Again T3, T4 and T5 have increased percentages of discussion on this category compared to 2008. T3 and T4 and their learners have regarded K9 to be important to discuss in 2009, as there is an increase of percentage of postings for that year. With the exception of T1, which has the same level of percentages for both the years, T2 has actually decreased percentages of postings for both K8 and K9. Although the data points to a mix-match of percentages recorded for 2008/2009 for all five tutors, it can be observed that SMS tutoring has increased the number of postings for at least two tutors in the year 2009 for all categories.

Conclusion

In our attempt to study the pattern of learners' participation in the myLMS forum through SMS tutoring for Company Law subject, we found that increased percentages of postings for 2009. We also found that SMS tutoring has increased the number of postings for at least two tutors in the year 2009 for all categories. This shows that the mobile learning through SMS tutoring endeavour is successful for the Company Law learners. Since mobile learning through SMS tutoring is new, OUM would benefit from implementing this for all their subjects.

References

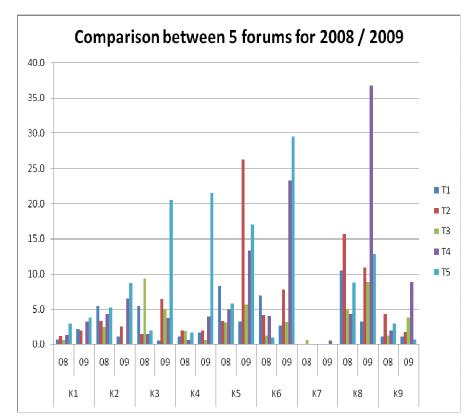
- Abas, Z.W. & Fadzil, M. (2008). Towards a More Effective Engagement of Learners and Tutors in Online Discussion Forums. *TheAAOU Annual Conference, 2008,* Asian Association of Open Universities, Tianjin China, 421–430.
- Abas, Z.W., Sankaran, T., Wan Abu Bakar, W.L.L. & Johari, H. (2008). *OUM tutor's handbook*, Kuala Lumpur: Open University Malaysia.
- Abas, Z.W., Tina, L., Harvinder, K., and Wei, W.S. (2009). Design and Implementation of Mobile Learning at Open University Malaysia. *The SEAAIR 2009*, South East Asian Association for Institutional Research, Penang Malaysia.
- Field, R. (2005). Favourable Conditions for Effective and Efficient Learning in a Blended Face-to-Face/Online Method. *The ASCILITE 2005*, Australasian Society for Computers in Learning in Tertiary Education. Brisbane Australia.

http://en.wikipedia.org/wiki/MLearning

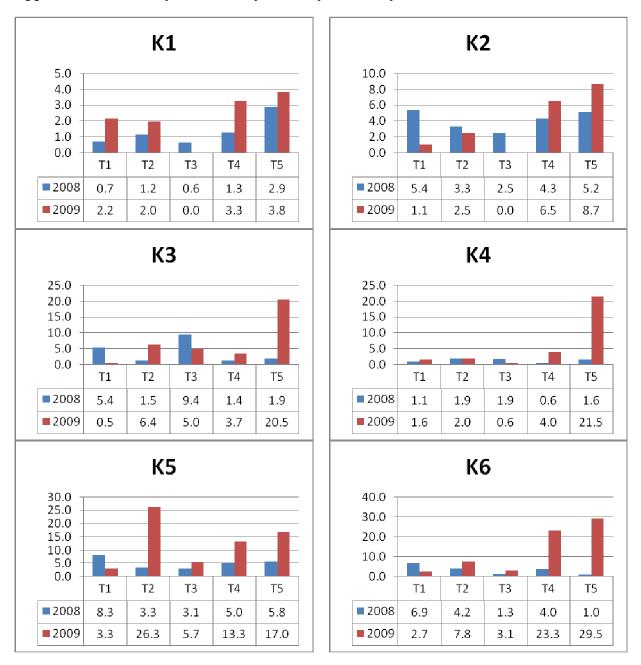
- http://www.skmm.gov.my/facts_figures/stats/pdf/SKMM_Postal_Courier_1H_2008.pdf
- Jaspal, K., & Lee, Y. L. (2005). An Analysis of Frequency of Online Interaction and Learners Achievement in Distance Education Course. *ICDE International Conference on Open Learning and Distance Education at IGNOU 2005*, New Delhi India.

Malaysian Communications and Multimedia Commission Report. 2008. Malaysia.

- MOBIlearn. (2003). Guidelines for learning/teaching/tutoring in a mobile environment. http://www.mobilearn.org/download/results/guidelines.pdf. Retrieved June 8, 2009.
- Ostlund, B. (2008). Interaction and collaborative learning: if, why and how? European Journal of Open, Distance and E-Learning, 1–9.
- Paul, B.M. (2007). MLearning: pedagogical, technical and organisational hypes and realities. *Campus-Wide Information Systems*, 24(2), 97-104.
- Taniar, D. (2009). Mobile computing: concepts, methodologies, tools, and applications. Australia: Idea Group Inc.
- Thomas, S. (2005). Pervasive, Persuasive eLearning: Modelling the Pervasive Learning Space. *The International Conference on Pervasive Computing and Communications Workshops*, 2005, IEEE Computer Society, Kauai Island Hawai'i, 177-190.
- Valentine, E. (2004). Unplugged Learning: A Report on the Rise of Mobile Technology in Learning. *The eFest Conference 2004*, Wellington New Zealand.



Appendix A: The comparison for the five tutors' forum postings for years 2008 and 2009



Appendix B: The analysis of data by each keyword for years 2008 and 2009

