The Changing Roles of Librarians as Knowledge Manager in Academic Institutions: Empowerment and Advocacy

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Abstract

This case study made in a government organization academic background. Knowledge management is not one discipline. Rather, it is the integration of a variety of business and fields of study. focused knowledge management in libraries. It provides an overview of some of the terms and concepts, explains the framework, provide examples of how to use it, and explore various potential application areas. Pressure knowledge management tools and techniques have maneuvered to share knowledge through communication and collaboration tools that determine the transition from process to practice.

Keywords: Knowledge Management, Information Management, Retrieval-Ware, Web-Based Tool.

Introduction

Knowledge management can be define as a systematic asset management of an organizational knowledge for the purpose to creating value and to meet a strategic requirements that consists of the initiatives, processes, strategies, and systems to sustain and enhance the storage, assessment, sharing, refinement, and creation of knowledge. According to Sharimali, Maheswari & Pamecha (2013), the importance of knowledge management has been already accepted by the corporate world to enhance the productivity and capabilities of the organization. Then, Skyrme and Amidon (1997) said that the knowledge management is continuously growing and a through several studies already established the relevance of knowledge as a foundation to improve operational efficiency as well as for competitive advantage.

Ibnu Firnas Library was chosen for the case study of the implementation of Knowledge Management (KM) as one of the organizations that implement a knowledge-based education as a whole. The college, as the academic institution has been operating on May 25th, 2014 which located in Selising, Pasir Puteh. The very first intake of this college consist of about 1060

students from various states such as Kelantan, Terengganu, Pahang, Selangor and also Johor, not to forget about 123 orang asli students from those states. Kolej Matrikulasi Kelantan is constructed in an area of 100 acres land which situated at Bukit Merbau, Pasir Puteh, Kelantan. Kolej Matrikulasi Kelantan is located 4.8 km from Kok Lanas town, about 18 km away from Pasir Puteh town, 30 km from Machang town and 26 km from the city of Kota Bharu. The location of Kolej Matrikulasi Kelantan is quite near to Politeknik Kota Bharu and Kolej Komuniti Kok Lanas making it well connected to the other 2 academic institutions which enable them to share resources such as facilities and also knowledge together.

Initially, Kolej Matrikusi Kelantan scheduled to be operational on May 2013 with the start of the 2013/2014 academic session. However, due to problems that did not to avoid, it is disabled to operate according to the plan. Therefore, 700 first intake students had to be placed in Kolej Matrikulasi Johor, Kolej Matrikulasi Kedah, Kolej Matrikulasi Selangor and also Kolej Matrikulasi Perak. Kolej Matrikulasi Kelantan's project was approved under Rancangan Malaysia Ke-9 (RMK9) and starts on October 6, 2009. Kolej Matrikulasi Kelantan is the 14th matriculation colleges that available in Malaysia under the Ministry of Education. There are about 134 lectures ranging from various grade of DG41 to DG54 and 60 staffs are placed in this college. All of the lectures are previously from other matriculation college in order to get an experienced lecturers to ensure the performance of the college can be developed in well. Kolej Matrikulasi Kelantan only offers one year study (PST) in the science and accounting fields. The admission to attend courses offered by the Division of Matriculation determined based on the SPM result in order to meet the conditions set. Learning study conducted in the form of lectures, tutorials and practical. The teaching processes are focused and generate students to achieve excellence move along with the motto, vision and mission of the college.

The Kolej Matrikulasi Kelantan is able to accommodate around 2000 students at one time and will be placed at four residential blocks known as block Al-Nasawi, Al-Majriti, Al-Mahani, Al-Karaji which is equipped with various facilities including student accommodation rooms, reading rooms and recreation rooms. There have two cafeterias in each student residential block that will provide catering services to students and one cafeteria for staffs. In carrying out the teaching process, there are 2 large lecture halls and 4 small lecture halls are equipped with LCD screen, audio systems and various advanced technological equipment in order to facilitate teaching and learning process. The lecture hall can accommodate between 150-250 students in one time.

Knowledge management can be define as a systematic asset management of an organizational knowledge for the purpose to creating value and to meet a strategic requirements that consists of the initiatives, processes, strategies, and systems to sustain and enhance the storage, assessment, sharing, refinement, and creation of knowledge. According to Shrimali, Maheswari & Pamecha (2013), the importance of knowledge management has been already accepted by the corporate world to enhance the productivity and capabilities of the organization.

The Ibnu Firnas Library was chosen for the case study of the implementation of Knowledge Management (KM) mainly because as one of the unit that implements a knowledge-based education as a whole. As quoted by Skyrme and Amidon (1997), the knowledge management is continuously growing and thorough studies already established the relevance of knowledge

as a foundation to improve operational efficiency as well as for competitive advantage. Therefore, it is incremental to identify the occurrence of Knowledge Management Activities in the department because as a unit that plays important role in holding up information, Ibnu Firnas Library is entrusted with the responsibilities to not only storing and capturing all the information but also to disseminate the information and by that, to use every medium available in order to make the activity possible and run smoothly.

The objective of this study is mainly to identify the occurrence of KM activities in this Ibnu Firnas Library. The single most important factor that ultimately defines the competitiveness of an organization is its ability to acquire, evaluate, store, use and discard knowledge and information (Knock et.al, 1997). Therefore, if there is such activity available, how does the the organization initiated the KM practices in their respective departments. One of the important parts in KM practice is to make people aware of such activities that are happening or available in the department. Therefore, in order to make people aware about the KM practices, how far does the management promote such activities and what is the management action to make the people aware about the occurrence of KM practices in this organization. The intended audience for the activity also plays major role, therefore this study will identify the people involved in this KM process and their level of involvement in the process i.e. the students, staff and the academicians.

As we all know, the technology in KM keeps changing from time to time, from age to age. Therefore it is important to know how did the department adapting to the changes in terms of technology and others as well. For example in terms of any facilities provided to enhance the KM practices. The study also will identify the types of Knowledge Management (KM) process that is available. Apart from that, the management support also play a very huge role in making sure KM activities is successful and running smoothly, therefore we need to identify whether there is any policy for this KM practice to ensure the practice is being manage properly and in orderly manner and any other support being placed by the management towards ensuring the success of KM activity in Ibnu Firnas Library.

Result from the study findings are expected to provide valuable information or knowledge to the top level management in regards of knowledge management. The study is beneficial in terms of the importance of knowledge management activities to be instilled in the organization to further enhance the productivity and capabilities of the organization

Findings
There are many definitions of knowledge management. The scholars, academicians, economics, researchers have many point of view towards knowledge and how to manage it. Taken from Farida *et al.,* (2015), various definitions of knowledge management has been stated. From Davenport et al., in Rowley (1998) defined KM as "the exploitation and development of the knowledge assets of an organization with a view to furthering the organization's objectives. The knowledge to be managed includes both explicit, documented knowledge, and tacit, subjective knowledge. Management comprises all of those processes associated with the identification, sharing and creation of knowledge. This requires systems for the creation and maintenance of knowledge repositories, and to cultivate and facilitate the sharing of knowledge and organizational learning. While Ahmed et al. (2002) viewed KM as the deployment of organizational processes, information processing technologies,

organizational strategies and culture for the enhanced management and leverage of human knowledge and learning to the benefit of the company. Generally, knowledge management is about creating, capturing, organizing, retrieving, disseminating, sharing/transferring and re-using knowledge for the benefit of organizations.

The definition of Davenport et al. 1998 (cited by Rowley, 1999, p. 418) entails all the above-mentioned processes: "Knowledge management is concerned with the exploitation and development of the knowledge assets of an organization with a view of furthering the organization's objectives". Knowledge assets include employees' expertise and experience, which need to be captured; information services and sources; and information technology facilities that an organization owns or requires to achieve its goals. Based on all definitions, perceptions and opinions from above, knowledge management emphasis on tacit and explicit knowledge those are the core elements of knowledge management itself. Both types of ability are related each other to enhance the capability and benefited the organizations and institutions. By implement the knowledge management itself must be supported by the systematic systems to facilitate, storage, and disseminate the information and knowledge.

The relationship between the knowledge management and librarian can be concluded by three variables. As stated by Farida *et al.,* (2015) taken from Lynch (2003) and Drake (2004) – people collaboration, process and technological functions and used are the perfect combination to elaborate connections between them. It might be similar with the Open Access Institutional Repository (OAIR) that being implement to the higher education institutions. The method also can be used in the library organization as the knowledge management sharing. People collaboration means that the contribution from the librarian, knowledge manager and information officer towards the organizational goals and objectives.

The contribution may come in the process or guidance on how to retrieve valid information, packaging the data and knowledge for the use of the community and institutions and continuously leading the role of providing the right data and information. Meanwhile, process here referred to how the data, information and knowledge can be transferred to the target groups. The skills and expertise of the librarians can be test in this situation where the community can benefited from the knowledge that the librarians have on how to disseminate the information. By using the technologies provided, the process or the cycle of these variables can be completed successfully.

In this new era of ICT, librarians and knowledge officers faces more challenges to enhance their capabilities to counter the needed and requirement made by the users. The request may variable and various in terms of subjects, forms and norms, but as professionals in handling the data, information and knowledge, librarians must have initiatives to cater these needs. As stated by Synman (2006), duties of the librarian as the knowledge manager include:-

1. Conducting an information and knowledge audit which includes: identification of information and knowledge needs of the organization and the resources and services currently provided to meet these needs; mapping of information flows within the organization and between an organization and its external environment; analysis of gaps, duplications, inefficiencies and areas of over-provision which enables the identification where changes are needed;

2. Development of information and knowledge databases, for example, expert databases or knowledge repositories; and
3. Utilization of a combination of technologies such as the intranet and groupware for speedy information access and dissemination.

As we can see, there are big different in terms of tasks and jobs by the librarians nowadays compared in the last few years. Cataloguing, shelving, book labelling, data entry and library's promotions are the common tasks by the librarians. But in this new era, knowledge management played the main roles in shaping the job and tasks by the librarians. Knowledge audit played major roles in preparing the librarians to faces the users. The librarians must be progressive in terms of selecting, sorting, divide, parting and packaging the right data and information for the use of the users. They also must be clearly guided on what to do, aware on what types of information must be disseminate, how to disseminate, and what are the right target group suitable for the data and information for them. The librarians also must or at least mapping the systematically and user friendly systems to enhance capabilities and access of data and information by the user.

Also by Synman (2006), stated that the responsibilities acknowledge for librarians are to:-

- create awareness about the benefits of knowledge sharing;
- encourage teamwork;
- establish platforms which are conducive to informal discussions and interactions (for example, development of Communities of Practice);
- build and maintain expert and Best Practice databases;
- become active in the design and development of the organizational intranet and portals; and
- To take the lead in developing a knowledge sharing culture in the organization.

In order to enhance capabilities and be responsive in the new millennium, the task and roles of the librarians must be levelled with the current situation. Besides leading the group for discussion for enhancing knowledge and sharing the information and data, librarians also must establish various steps and processes in order to enhance the awareness of receiving the right data and information to their end users. The teamwork established by the librarians must also include other persons from outside the library organizations. It is to make sure that the directive and processes can be continuously done and the knowledge can be shared among the users in the organization and institutions itself. Also by using and providing the IT tools, the development of knowledge management can be develop and progresses more rapidly and the message can be transferred more rapidly and fast among library and end users in the organization.

The identification and retrieval of data and information for the users are the best task to describe the job of reference librarians. In terms ok knowledge management, as stated also by Synman (2006), Librarians have the potential to make a significant impact on developing corporate information literacy by assisting employees and users to:

- ✓ access and gather data in order to organize and communicate information;

- ✓ navigate and integrate information sources, including electronic resources, more meaningfully;
- ✓ assess and evaluate information found or knowledge shared;
- ✓ create, record, store and archive information;
- ✓ identify the potential value that relevant information can add to business processes;
- ✓ properly use information technology facilities;
- ✓ filter and discard irrelevant information;
- ✓ make decisions based on validated information; and
- ✓ define an organization's information needs and provide suggestions on how to satisfy these needs.

End-to-end of the processed needed to be done to the information are described in here. From document handling to storage, best method to retrieval and disseminate, and also define and identified suitable receiver for the information and data to be used are the main task of the librarians as the knowledge officers and information managers. The activities might be similar in the beginning of the librarian but the task and processes might be different. In other word, the handling of the information, data and document must be done properly. In this situation, knowledge management are best described on what to be lead or what to be mastered by the librarians.

Discussion

The image of the librarians nowadays is related to the guardians of the storage or piles of information and papers. The information and papers in these terms are focuses on books, journals, magazines, newspapers, proceedings and related data and information regarding the institutions and organizations itself. By focusing and leading the way on how to disseminate, produce, storage, used and manipulate the data and information, the librarian naturally become a knowledge workers. According to the International Adult Literacy Survey, workers of the "information age" not only must have higher levels of education, but also the ability to adapt, learn and master new skills quickly and efficiently. The level of "information skills" – especially the ability to filter out information (or lack thereof) may be the primary cause of either professional success, or failure of a knowledge worker. A part of librarian tasks is to meet and consult the users and peoples on their product and services, ideas and knowledge, types of materials and data available for access and related activities in the organizations. Thus, the skill related to the knowledge workers as stated by Materska (2004) is:-

Communication skills.

These relate to the ability to convey somebody's knowledge to other people effectively. Forces shaping today's new knowledge age, have made communicating information a must for all organizations and their employees. This involves not only making oral presentations, but also preparing written reports, and the like. If librarians refuse to communicate with knowledge workers" communities they will not be taken into account in the knowledge world at all – and the knowledge workers are a group whom librarians should serve in the knowledge age before any other.

Interpersonal skills.
These rely on the ability to work with other people. In business this may involve explaining a warranty to a customer, working in a team environment to solve a problem, negotiating contract terms with a supplier, or a variety of other people interactive tasks. In the age of ubiquitous information retrieval systems the problem of disintermediation (Downie, 1999), or the act of bypassing librarians and other information specialists, appears in the literature more often. This means that end users are trying to find their own way through the information universe.

Also by Materska (2004) negotiate that the librarians must need to understand certain important point to become knowledge workers that is:-

i. The true nature of information (what makes certain information highly valuable and other information completely worthless).
ii. Knowledge – how knowledge is acquired, constructed, transferred and otherwise shared with other members of the organization or society (in a way that seeks to achieve the organization's/society's objectives).
iii. Changing needs of knowledge workers (librarians in particular should be aware that today's users are tomorrow's knowledge workers. They should know their users – not only have information about them).
iv. How to harness the power of individuals by supporting them with communication and information technologies and other tools (being technologically literate).
v. How to enhance the learning capabilities of individuals and groups (sustaining lifelong learning).
vi. How to prepare/stimulate, maintain and strengthen the knowledge culture it cannot be assumed that people will share information and knowledge just because the network allows them to. The problem is to get people to change the way they think about sharing their knowledge as a natural process).
vii. How to extend their skills into managing knowledge, how to manage "knowledge space" (enabling research, supporting innovation).
viii. The ethical responsibilities of working with information and knowledge.

As discussed before, tasks and responsibilities of the librarian in terms of knowledge managers and knowledge workers are not limited. From having an interpersonal and communication skills to mapping and leading the document and information to the right person at the right time; the task and responsibilities are wider than expected. It is because the blended process from top to bottom in crucial and vital in order to appraise the data, information and knowledge to make sure it make the right journey to the rightful person at the right time. Besides that, librarians also must be knowledgeable on how to manage data and information (that is document handling) in terms of storage, retention, auditing and disseminating for the benefit of the organization and institutions.

Electronic Context In Knowledge Management Of Library
In terms of electronic content development and environment, appraisal and disseminate, there are 7 different roles that can best described the relationship between the librarian and knowledge management norms and activities. According to Omekwu (2006) taken from Klobas (1999); the task and responsibilities for the librarians are the educators, information

managers, information management consultants, custodians of information, information providers and publishers, change agents and custodians of public library facilities that is:-

1. As educators, librarians can increase awareness among their clients of information networks, their contents and potential use. They can help clients who are new to electronic networks, and those who have poor interpersonal networks, to locate sources of information on the network.
2. As information managers, librarians need access to information resources of many types, in many disciplines. They have the skills to build navigation tools for networked resources in the same way that develop navigation tools for published information in library catalogues and national bibliographies.
3. As information management consultants, librarians can help network users build and maintain personal information systems, which provide access to the subset of networked information sources relevant to each user's work.
4. As custodians of information, librarians are facing apparent challenge to their role, as physical resources migrate into electronic form and on-demand electronic delivery becomes more common. The ephemeral nature of much electronic materials (such as newsgroups) does, however create a need to identify and where appropriate, archive authoritative versions of electronic information.
5. As information providers, librarians can make available much more widely collections which now can be sued only within a single physical library location. A wide range of publications and access formats can be accommodated, from remote log-in catalogues and indexes, to provision of electronic copies of entire collection or works, in print or other formats.
6. As change agents, library staff can lobby managers and governments as appropriate, for network access for themselves and their users.
7. As custodians of public library facilities, library can provide workstations, network gateways, printers and software that may not be otherwise available to the public.

The method that is being used to conduct this study is basically being done through interview, observation and reading current issues about the topic. Based on that, a set of questions is prepared to further facilitate and smooth the interview process. The main focus of this study may only be garnered towards a specific group of people and the facilities that related to the knowledge management activities. The main centre of this study is none other than the Head of Department of Ibnu Firnas Library himself, Mr. Shahrin Osman, staff of Ibnu Firnas Library and also users of the library or library patron which includes students and academic staff of Kolej Matrikulasi Kelantan.

The interview is done mainly to get their overview on their level of awareness on any kind of KM activities available and their opinion on the effectiveness of the programs offered. It was estimated that the population that resides in Kolej Matrikulasi Kelantan is around 1200 which consist of students and staff considering all departments. However, due to the time constraints and cost limitations faced by us, the interview session on the KM activities in Ibnu Firnas Library is being held to only a small number of students and selected staff only which we believe could give us a clear picture about the services offered and their overview of the services.

Data Description

This study used a survey method as a method that requires a period of time shorter, cheaper and allows researchers to obtain almost 100% response rate (Mahmud, 2008). Two instruments have been deployed, which is a questionnaire with items which measure respondents 'knowledge management, and interview face-to-face to gauge respondents' perception towards the required characteristics in the library.

The main study was built on an exploratory study covers 7 staff and 50 people where 20 teachers and 30 college students. Self-administered questionnaire was used as data collection methods for investigating officers and support staff perceptions of the services and facilities that were built and Ibnu Firnas provided by the library in information management. Questionnaires were distributed to staff and users selected at random. Staff and users have been briefed on the objectives and also how to fill out this questionnaire before completing employee questionnaire survey forms and support staff and users, in their offices. They were briefed on the objectives and also how to fill out this questionnaire before filling out the survey form. The second instrument is the interview with the top management of the Ibnu Firnas Library En.Shahrin Bin Othman as Head of Department library to understand the strengths, weaknesses, opportunities and the future of the college.

Secondary data will also be used in this study to be provided by Ibnu Firnas Library. where every employee will be given the responsibility for keeping any record of where it will be stored and made statistical reports to be sent to the National Library. Ibnu Firnas Library still build their collection of books, news cuttings, speeches, policy papers, biography, video recording and voice recording to be the premier resource center in Malaysia's history of nation-building, especially in education. To enrich the source, Ibnu Firnas Library has collaborated with institutions such as the National Library, Kok Lanas Community College, Polytechnic Kota Bharu and UiTM Machang and keen to collaborate with more organizations. Material we share the loan book, especially for a limited edition book.

Data collected will be used for predictive purposes to focus on information management in their organizations, and ended with a personal view of the future. Data, information and knowledge from different types and subjects. topics discussed also multi touch issues, from politics to economics, education, religion and so on. As a user, which determines the level of access to what data, information and knowledge necessary for future use. The involvement of sharing knowledge born here and use data and information that is being started to increase. In another perspective, ethics in the handling, use and manipulate data, information and knowledge cannot be controlled and monitored. The involvement of multiple levels of user education differences, backgrounds and believe added to the unethical use of data, information and knowledge.

Conclusion

In today's environment, the usage of information and knowledge has increased in all types of organization in order to simplify all the activities and enhance the decision making process. Therefore, the importance of managing the knowledge becomes a vital role that encourages the organization's to invest money, times as well as efforts. Knowledge Management (KM) is a discipline that improves the ability of organizations to solve problems better, adapt, evolve to meet changing business requirements, and survive disruptive changes such as staff

turnover. Other than that, the Knowledge management can be a powerful tool if successfully implemented into an organizational structure. Uncovering the latest methods, tools, trends, and strategies in organizational knowledge management should be a priority for individuals working in a variety of industries.

Knowledge management consists of several main steps that allow the flows of knowledge among all interest users in the organization. The first step is knowledge creation, which is entering of the knowledge in the system. The second step is maintains the knowledge by remaining it in the system which is refer to knowledge retention, the flow of knowledge from one part to another within the system (Knowledge Transfer) and finally implementing the knowledge in the organization decision making and any business process which is refers to Knowledge Utilization. These whole processes of capturing, storing and distributing knowledge in the entire organization help employees work smarter, minimize duplication, and deliver more innovative products and services that meet the customers' requirements.

It is clearly seen that there is Knowledge Management practices being implemented in Ibnu Firnas Library. The library is being equipped with adequate and advanced facilities as well as technologies, which enhance the KM implementation in the organization. There are several KM activities being conducted in library including knowledge sharing sessions between the lecturers, students and others, knowledge retention which involves the employees and knowledge creation that encourage new innovation from the lecturers, staffs as well as students. However, the KM implementation is still in the beginning phase. There are several issues or challenges faced by Ibnu Firnas Library in implementing the KM practices, including the technological aspect, personnel aspects, organizational aspects and others. Thus, to ensure the successful of KM implementation in Ibnu Firnas Library, there are still a lot of efforts and improvements needed from the management in order to achieve the stated mission and vision of the library.

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