

ISSUES AND BARRIERS IN IMPLEMENTING KNOWLEDGE MANAGEMENT IN A BUSINESS SCHOOL IN SRI LANKA

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Abstract- By definition universities are places of creating and sharing knowledge. Knowledge Management (KM) in higher education institutes has become an emerging research area in the recent past. The main purpose of this paper is to present the findings of a research carried out to identify the issues and the barriers in implementing KM in a business school in Sri Lanka. Since the objective of this research was to understand the situation rather than to find any relationships among variables, the exploratory research approach was used. Mainly qualitative data- interviews with the academic staff, observations and secondary data- were used in the analysis. It was revealed that KM had not become a part of the organizational strategy of the selected business school yet. However, few good KM practices of business school were identified. The barriers in implementing KM can be categorised as personal and organizational. The identified personal barriers were lack of enthusiasm in carrying out research, heavy work-load and consideration of research only as a mean of obtaining promotions while the organizational barriers were, weaknesses in the recruitment and promotion schemes and lack of planning for KM. However, it was revealed that the use of technology for KM is fairly good. The management of the school needs to create a culture that will encourage KM by the staff and students within the school. Some of the recommendations made to the school are, encouragement of collaborative research, making necessary changes to the recruitment and promotion schemes and providing opportunities and funding for postdoctoral research for the senior staff. The key contribution of this research is identification of issues and barriers in implementing KM in a business school in a developing country. This knowledge will be useful not only to the selected school but to any similar school of a university to improve KM. This research was limited to one of the eight faculties of the University. This can be extended to other faculties as well with the objective of identifying best practices in each faculty.

Key words- Knowledge Management, Higher Education, Sri Lanka

I. INTRODUCTION

Oxford dictionary defines University as “a high-level educational institution in which students study for degrees and academic research is done”. Therefore, by definition universities are required to be places of creating and sharing knowledge. Reference [1] has identified knowledge creation, knowledge sharing and knowledge transfer as the three main pillars of Knowledge Management (KM) in Higher Education Institutes (HEIs). Traditionally, universities were mostly state-funded and less vulnerable to market forces. However, now universities are forced to search for additional sources of funding from the market, especially with the gradual reduction of state funding [2]. Unlike most other organizations, the main asset of a university is the intellectual capital or the knowledge, which is intangible [3]. In this context, according to [4], universities and their staff should understand their changing role in today’s knowledge-based society. A number of researchers have emphasised the need of identifying enablers/inhabitants in KM in HEIs [1], [3], [4]. With the emergence of KM, a number of researches on the applicability of KM in the HEIs have been carried out in developed countries as well as in developing countries, for example in Mauritius [1], in Jordan [3], in Malaysia [5], in Canada [6], and in Nepal [7]. Even though there are 15 public universities in Sri Lanka, hardly any research has been done on KM in the context of universities. The objective of this paper is

to present the results of a research carried out through a case study to identify issues and barriers in implementing KM in a Business School¹ of a large University in Sri Lanka, a developing country in South Asia with a population of 22 million.

II. LITERATURE REVIEW

The concept of knowledge has been defined from various aspects; some are philosophical and some are practical. According to [8], knowledge is categorised as explicit, formal and systematic knowledge, and tacit, informal and highly personal knowledge. In the practical sense, knowledge can be considered as an object, i.e a thing to be manipulated or stored as well as a process, i.e. applying expertise [9]. Knowledge management is the process of transforming information and intellectual assets into enduring value [10], [11].

Universities can be viewed as knowledge-based organizations involved in the process of developing knowledge workers [12]. The value of a University to society depends on the scientific impact of the knowledge it generates (research), or on its knowledge transfer capabilities (learning) [13]. Reference [7] defines KM in the context of educational institute as,

¹ Convention in Sri Lanka is to use “Faculty” instead of “School”.

The organized and systematic process of generating and disseminating information, and selecting, distilling, and deploying explicit and tacit knowledge to create unique value that can be used to strengthen teaching-learning environment.

Knowledge management involves a number of processes. After an extensive literature review [5] has identified knowledge creation, knowledge capture, knowledge organization, knowledge storage, knowledge dissemination, and knowledge application as elements of KM process in HEIs. Some of the benefits of the implementation of KM in HEIs are improvement of the quality of teaching and research, reduction of the gaps between senior and new faculties, increase of the possibility of attracting more experts, possibility of locating experts and increased efficiency of document management [6].

Reference [14] has broadly categorised barriers to KM as personal barriers, such as perceived lack of usefulness, time and effort and perceived lack of incentives to share knowledge, and organizational barriers, such as lack of leadership, failure to communicate, difficulty of changing culture and too much dependency on IT for KM. However, these two are inter-related [14]. Reference [1] has identified organizational culture and structure, technology, rewards and incentives, leadership, industry-academia linkages, human resources and research repositories as barriers (as well as enablers) of KM in HEIs.

III. METHODOLOGY

According to [15], research can be classified as being exploratory, descriptive, analytical and predicative. The aim of exploratory research is to look for patterns, ideas or hypotheses rather than testing or confirming a hypothesis. Descriptive research is research which describes phenomena as they exist. Analytical or explanatory research aims to understand phenomena by discovering and measuring causal relations among them. Since the objective of the current research was to identify the issues and barriers in implementing KM practices in a business school, the most suitable approach for this research was the exploratory approach.

Different authors have identified techniques such as secondary data analysis, pilot studies, case studies and experience surveys as techniques available for an exploratory research [15] – [17]. The research tools selected for this research were interviews, secondary data analysis, and experience survey. Interviews were held with the staff such as the lecturers, the Dean, and the heads of departments. The author's experience and observations made when he worked as a senior lecturer in the selected school were also used in this research.

IV. THE SCHOOL

The entity selected for this study was the Faculty of Management Studies and Commerce (FMSC), University of Sri Jayewardenepura, Sri Lanka, hereafter mentioned as the Faculty. It is one of the eight faculties in the second largest public university (in terms of the student population) of the country. The Faculty has more than 50 years of history in offering management degrees at both undergraduate and postgraduate levels. It is the oldest and the largest business school in a public university in Sri Lanka. Currently there are more than 4000 undergraduates, more than 500 masters' students and about 50 PhD students in the Faculty. The current internal degree programme portfolio of the Faculty consists of twelve undergraduate programmes, three postgraduate diplomas, four masters' programmes and a PhD programme. Additionally, the Faculty offers three external first degree programmes as well. The official medium of instruction of all the degree programmes is English. However, almost all the communications to the students are done in native Sinhala language. All the meetings such as the Faculty Board, postgraduate study boards and the Senate are conducted in Sinhala. All the minutes of the above mentioned meetings except postgraduate study board are also maintained in Sinhala.

There are 18 professors (including senior professors), 109 senior lecturers (Grade I and II) and 53 junior lecturers, called lecturer (probationary) in the Faculty. The highest qualification of 71 of them is PhD and 66 have obtained a master's degree as the highest qualification. The number of PhD holders among the academic staff of the Faculty has increased by 68% between 2012 and 2017.

V. FINDINGS

The following academic staff members were interviewed to collect data.

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| A | Dean of the Faculty | G | A Senior Lecturer with 22 years' experience, and a head of a department |
| B | A Professor with 24 years' experience and a PhD holder. | H | A Professor with 32 years' experience and a PhD holder |
| C | A Professor with 35 years' experience | I | A Senior Lecturer with 32 years' experience and a PhD holder |
| D | A Senior Lecturer with 15 years' experience and a PhD holder. Has | J | A Lecturer (Probationary) with 4 years' experience and has completed an |

completed two MBA postdoctoral assignments in Australia
 F A Senior Lecturer with 28 years' experience and a PhD holder

B, C, D, E, F and I were former heads of departments and B was a former coordinator of the MBA programme. Secondary data were collected from the offices of the Dean, the MBA programme and the PhD programme. The following section describes issues in implementing KM that were revealed during the data collection stage, under each function of KM.

A. Knowledge creation

The main forms of knowledge creation at the Faculty are research carried out by the academic staff and the PhD students. The Faculty has produced only 8 PhDs (less than 10% completion rate) since the inception of the PhD programme in 2013. One of the problems faced in creating high quality research output in PhD programmes is the lack of full time postgraduate students. Almost all the PhD students are part-time students with little time to spend on research or for proper supervisor consultation. In the case of research publications, the interviewed lecturers had the view that they are overwhelmed with teaching and assessments. Further, it was found that another reason for lack of involvement in research was that it was not demanded by the university. Lecturers can survive in the job with little or no research. Those who are engaged in research also do it individually as the present marking scheme for promotion to the post of professor allocates higher marks for single author research publications. For example, if there are three authors in a research paper published in a journal, including the applicant, only one third of the marks will be allocated to the applicant. This lack of team work in research has prevented the transfer of tacit knowledge to the junior lectures as well. According to lecturer J, even though she has worked for four years in the Faculty, she has not engaged in any joint research with a senior academic during her tenure. According to the Dean, even though the Faculty is ready to provide research grants, only very few lecturers apply for such grants. On the other hand, interviews with the lecturers revealed that lecturers did not apply for research grants because they had to spend more time for administrative work related to the grant such as replying to audit queries regarding the expenses under the grant rather than carrying out the research. Further, non-allocation of payment for the lecturers' time and effort under the research grant is another reason for lack of enthusiasm for application of research grants.

During the last decade a large number of academic staff have acquired PhDs from countries such as the United Kingdom, Australia, New Zealand and

Malaysia. Most of these PhDs have been funded by National Centre for Advanced Studies in Humanities and Social Sciences, a government-funded agency. The theses produced by these PhD holders is also another major form of knowledge creation.

During the interviews, it was revealed that academic staff engaged in administrative work such as the Dean, the heads of the departments or the coordinators of MBA or PhD programmes were busy with meetings and paper work. So they rarely have time for research.

B. Knowledge capture

The Faculty mainly depends on academic staff in capturing knowledge. Almost all the lecturers have been recruited as junior lecturers, called a probationary lecturer, after graduation from the same Faculty. Postgraduate studies have provided an opportunity for academic staff not only to create knowledge but also to capture knowledge as well. All academic staff above Senior Lecturer Grade II are awarded Rs. 250,000 (US\$ 1,400) every two years to present papers in academic conferences or to attend training programmes. However, participants of the interviews have the view that lecturers do not capture much knowledge in conferences as they are interested only in presenting their paper. It was revealed that lack of postdoctoral research opportunities for the senior academics also affects knowledge capture negatively. Less than 3% of the senior academics of the Faculty had the opportunity to engage in research in a developed country during their sabbatical. According to participant D, who has completed two postdoctoral assignments in Australia, he has immensely benefited by the tacit knowledge of the academics of the host university.

C. Knowledge organisation

Knowledge organisation is done through filtering to identify and cross list the useful dimensions of knowledge for different products and services of the HEIs [5]. Currently there is no system in the Faculty to organize the created knowledge. For example, research publications of the staff or the students of the Faculty can be organized under subject areas or types such as conference papers, journal articles etc. Minutes of the official meetings such as the Faculty Board, the Senate and the Curriculum Review and Development Committee, an important part of explicit knowledge, are organized manually on paper-based files.

D. Knowledge storage

Mostly the captured knowledge is stored in the form of teaching materials such as PowerPoint slides stored in the Learning Management System (LMS) of the Faculty. During the interviews, it was revealed that when compared to the situation 5 years back, now most of the lecturers use LMS for storing teaching materials. However, lack of standardisation in coding of materials in LMS had made it difficult to use the knowledge stored in the LMS by another lecturer if

the previous lecturer left the Faculty. Even though there is an online staff portal in the university website to store articles published by the academic staff of the university, including staff of the Faculty, it is hardly used now. Lecturers prefer to use knowledge sharing sites such as Google Scholar and Researchgate due to worldwide exposure of these sites. Most of the lecturers have not updated the staff portal with their latest research publications. Hence the university staff portal has become redundant.

E. Knowledge dissemination

The main form of knowledge dissemination is undergraduate and postgraduate teaching. However, it was found that the lecturers hardly use their own research publications for teaching purposes. They mainly use the captured knowledge from the standard text books for teaching rather than knowledge created by themselves. As mentioned previously, storing the articles in knowledge sharing sites is also a way of dissemination of knowledge. The Faculty and few departments of the Faculty organize conferences to disseminate knowledge. However, these conferences have become a platform for scholars from other institutes to present the findings of their research rather than for the staff or the students of the Faculty. But doctoral colloquiums organized in parallel with the conference organized by the Faculty has become a platform for PhD students to present their research findings.

F. Knowledge application

Interviews with the academics revealed that the main objective of carrying out research by lecturers is career advancement. Therefore, they select research on the basis of convenience rather than applicability or relevance of research to the industry. The management of the Faculty also has no plan to use the created knowledge, even in the case of research funded through university research grants, for the advantage of the institute.

VI. DISCUSSION AND IMPLICATIONS

According to [8], even though the knowledge is created by the individuals, it is the responsibility of the organization to articulate and amplify it. This is true for a university as well. From the discussions it was clear that the KM would not be a part of the strategy of the Faculty in the foreseeable future. As a part of a public university, the Faculty is fully-funded by the government. Therefore, there is no pressure for the administration of the Faculty and the University to generate its own funds. Further, due to the severe competition for admission to the public universities which do not charge tuition fees, the Faculty has no issue in attracting undergraduates for its degree programmes. Further, as the oldest and the largest business school in the country, it can attract undergraduates who have obtained the best results in

the General Certificate of Education (Advanced Level) examination. This may be one of the reasons for less enthusiasm for using knowledge for the competitive advantage. But the management of the Faculty/university is accountable for public money. Therefore, it is their duty to use the most valuable asset of the institute, knowledge effectively to generate money rather than depending on public money.

Even though there is no explicit effort towards KM, some activities of KM can be identified in the Faculty. For example, former chairpersons of the previous Curriculum Review and Development Committees have been appointed to the present committee. This will ensure the transfer of tacit knowledge of previous chairpersons to the present curriculum development process. The use of technology for knowledge storage is also fairly good. LMS of the Faculty is used effectively by the students as well as the staff. Another positive development is providing funds to lecturers to pursue postgraduate studies and to attend conferences.

Some KM initiatives have been taken place at the University level as well. For example, the University recently established Innovation, Invention and Venture Creation Council with the objective of commercialization of innovations and inventions of the academics and postgraduate students of the university. However, this centre mainly caters to the faculties in the STEM (Science, Technology, Engineering and Mathematics) areas.

The weakest area of KM in the Faculty is knowledge application. Application of knowledge will not only generate funds for the Faculty but also contribute to the development of the industry as well. Hence, the Faculty should establish a consultation unit with the objective of applying the created and the captured knowledge to solve problems in the industry.

In order to increase the applicability of knowledge, it is necessary for lecturers to carry out not only theoretical research but also more empirical research targeting specific industry problems as well. During the interviews, it was revealed that lecturers in the field of Finance used their own research in teaching because most of their research were based on data from the Colombo Stock Exchange. The Faculty should encourage the lecturers to include a person from industry as well in the research team in order to make the research projects more relevant to the industry. Outside participants may bring the knowledge about the particular industry into the research.

It seems that the findings of the present research validate the findings presented in Japanese context by [18]. According to them the culture in the universities are individualistic. In the case of the selected entity, the individualistic nature can be attributed to the fact that joint researches are evaluated less favourably in promotions. Therefore, the academic staff always try to publish as the sole author, except with postgraduate

students. Joint publications by several lecturers of the Faculty are very rare. Collaboration and collective effort will lead to efficient and effective knowledge creation. Therefore, the Faculty should convince and encourage group research rather than individual research and changing the promotion scheme to encourage such research is an essential prerequisite. Collaborative research will also be an answer for the heavy work-load of lecturers that prevents them from carrying out research. Further, this will create an opportunity for junior lecturers to use the tacit knowledge of senior academics.

It was found that the institutional portals for storing the articles have become redundant because of the availability of free knowledge portals such as Researchgate, and Academia. Therefore, it is necessary to change the structure of the institutional portals by including links of the above mentioned websites on the lecturers' personal webpages rather than storing articles in the institutional repositories.

Even though it is not up-to-date, the Faculty has a repository of research articles published by the staff. However, it is not the case with respect to the publications done by the PhD students. Therefore, the PhD programme office of the Faculty or the Faculty of Graduate Studies should maintain an electronic repository under their webpages. Various reports such as minutes of the meetings, circulars and publications are also part of knowledge, especially the explicit knowledge. Since these are currently stored manually in paper-based files, access is limited and very time consuming. Therefore, the Faculty should develop an electronic repository to store such knowledge as well. However, indexing such documents will be an issue because most of them are in Sinhala. Therefore, the management of the Faculty should take a policy decision on official language of the Faculty. Until that a tagging system can be used to improve the accessibility of such knowledge when they are required.

The Faculty should reconsider the current recruitment policy that is biased towards the graduates of the Faculty. Probably the Faculty can learn from its sister faculty, the Faculty of Applied Sciences which recently recruited more than 30 PhD holders with H-index of 10 or more. That kind of new recruitments will bring new knowledge to the Faculty. Further, if their tacit knowledge is used properly, a new breed of researchers could be produced from the Faculty.

Government funding for PhDs for the staff is a very good development in terms of knowledge creation. However, it was found that the research output of these PhD holders after the PhD is not that impressive. Upon their return they have to engage in teaching in undergraduate and masters by coursework programmes and in various administrative work. So they have very little time for research. Since the Faculty has a reasonable number of lecturers with PhD qualifications, now the management of the Faculty must implement programmes to increase not

only the quantity but also the quality of the research carried out by these lecturers. These lecturers should be encouraged and funded to engage in postdoctoral research in universities with a good research culture. That will allow them to work with experienced researchers and to be benefited by these researcher's tacit knowledge. From this analysis it was clear that, all the barriers identified by [1], except technology, were barriers in KM in the case of the Faculty as well.

VII. FURTHER RESEARCH AND CONCLUSION

In the analysis it was found that KM has not been considered as part of the organizational strategy of the Faculty or the University. Even though the Faculty has shown a good progress in the area of knowledge creation, currently they have no plan for using that knowledge for competitive advantage. Similar to findings reported in previous researches, the Faculty also has barriers in KM namely, organizational culture, rewards and incentives, leadership, lack of planning and attitudes of the lecturers. However, it was revealed that the technology aspect of KM is fairly good.

The present research was restricted to one faculty of the university. This can be extended to other faculties of the university as well with the objective of identifying the best practices in different faculties. The current research was essentially an exploratory and qualitative research. This can be extended to a quantitative study that will explain the relationships of various factors identified in this study.

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