

**ADDRESSING THE CHALLENGES OF THE
INFORMATION AND KNOWLEDGE SOCIETIES:
THE CASE FOR OPTIMUM CURRICULUM IN THE
SCECSAL REGION**

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Abstract

The paper rotates on the question whether Information Management (IM) Curriculum is equally appropriate for Knowledge Management (KM). Using the Conceptual Framework of Knowledge Management Processes (CFKMP), the concepts "information management" and "knowledge management" are explained and related in the context of optimum curriculum. The processes/activities of information management and knowledge management are examined to identify similarities or differences and to establish the base of knowledge and competencies/skills required. Based on Corral (2005) and comparative analysis of other literature, it is established that both IM and KM professionals require similar knowledge and skills/competencies. It is deduced therefore that the same curricula would be appropriate for both. The paper further suggests that two strategies could be adopted in teaching of such curricula. The first, would be the core-elective approach whereby IM and KM are taught as electives along the core required by the information profession. The second would be the specialization strategy approach by which IM and KM are taught as different programmes.

INTRODUCTION

Information and Knowledge (I&K) systems need educated and qualified professionals to plan, implement and regularly review these systems' sustained development. The professionals may be known by different titles - information manager or knowledge manager. Notwithstanding, the titles, these professionals undertake education and training programmes adhering to curricula designed by relevant stakeholders and approved by authority. Such curricula should deliver knowledge/theory and practical experience. According to (Ocholla, 2000:37), curriculum "... describes the course content or what is studied... But that is not all, a ... curriculum is a blueprint that provides fundamental guidelines ... on what is studied; why;

might require though not exclusively different handling techniques or skills.

- (i) Explicit knowledge which is expressed in symbols and words and resides in product specifications, scientific formulae, computer programmes, artefacts, printed, audiovisual and electronic formats.
- (ii) Tacit knowledge. This is personal knowledge and represents personal beliefs, values, intuition and insight. It is difficult to communicate.

KM SCOPE OF ACTIVITIES

Regarding KM scope of activities, no final theory has been evolved. Part of the problem is that KM embraces many disciplines including human resources, information technology and library and information science. Barclay and Murray (1997) state that KM is a cross-discipline and therefore draws from several disciplines such as cognitive science, expert systems, artificial intelligence and knowledge based systems, computer-supported work (groupware), LIS, technical writing, document management, decision support systems, semantic networks, relational and objective databases, simulation and organisation science.

Three approaches to organizational knowledge have been floated:

- (i) The mechanistic approach which focuses on the application of technology and associated resources - tools that facilitate access and utilisation of knowledge by organizations
- (ii) The cultural behavioral approach emphasizing innovation and creativity - the adoption of new ways of doing things, to adopt holistic approach to relationships with the environment that would affect the organizations development and progress
- (iii) The systematic approach which uses systems thinking and incorporates all types of knowledge management to ensure evaluation and sustained development. This uses cross-discipline to develop KM systems and processes.

KM CORE PROCESSES

KM core processes have been stated to include:

- (i) Knowledge identification
- (ii) Knowledge acquisition
- (iii) Knowledge development
- (iv) Knowledge sharing and distribution
- (v) Knowledge utilisation
- (vi) Knowledge retention. Barclay and Murray (1997)

PRINCIPLES GOVERNING KM

Principles governing KM processes have been identified. They are briefly explained below:

1. Knowledge is an asset that must be identified, captured and have value added to it. The processes involved under this are knowledge capture; editing and repackaging; knowledge categorization (classification); applying IT infrastructure for storage and distribution; and teaching techniques of creating, sharing and using knowledge. KM is expensive.
2. KM is interdisciplinary and aims at dealing with cross-disciplinary problems. A mixture of skills is needed to address complex day-to-day problems and to achieve hybrid of solutions involving people and technology.
3. Knowledge is power: one with knowledge has a competitive advantage
4. Knowledge must be managed. Knowledge managers must be versed in securing key resources, collecting and categorizing knowledge, establishing knowledge oriented technology infrastructure and monitoring use of knowledge.
5. Knowledge must be shared between a given environment or community. Therefore knowledge maps must be produced.

knowledge assets show where and how particular knowledge assets are stored in the organisation and facilitate transparency in knowledge management

6. Although KM emphasizes sharing, sharing and using knowledge are often unnatural acts. There are always people who keep knowledge to themselves to perpetuate power and prestige. It is very important that the knowers or generators of knowledge are acknowledged, or compensated so that they are automatically motivated to share.
7. KM means improving work processes. The organisation must facilitate knowledge generation, utilisation and transfer by putting in place appropriate policies, resources and facilities.
8. Information and knowledge are not useful unless they are applied in specific situations. Both explicit and tacit knowledge must be exploited in relevant contexts.
9. Similar to the process of scientific research, where research builds on other works, KM never ends. Knowledge generation, utilisation and transfer are ever necessary because new problems arise because new problems and situations arise and require new solutions.
10. Knowledge requires a knowledge contract. Legal frameworks, rules and regulations, such as copyright laws, patent laws, trade marks and trade laws, should be put in place to encourage competition, co-operation as well as protecting individuals' and government property. It is important to identify who owns what and has a right to use individual's knowledge

RELATIONSHIP BETWEEN INFORMATION AND KNOWLEDGE MANAGEMENT

The nature and functions of IM are well known in the LIS profession. Curricula have been designed and are reviewed regularly to afford information professionals current and accurate knowledge, skills and competencies required and to accommodate change in the fields particularly those accruing from ICT.

Corrall, (2005:6)

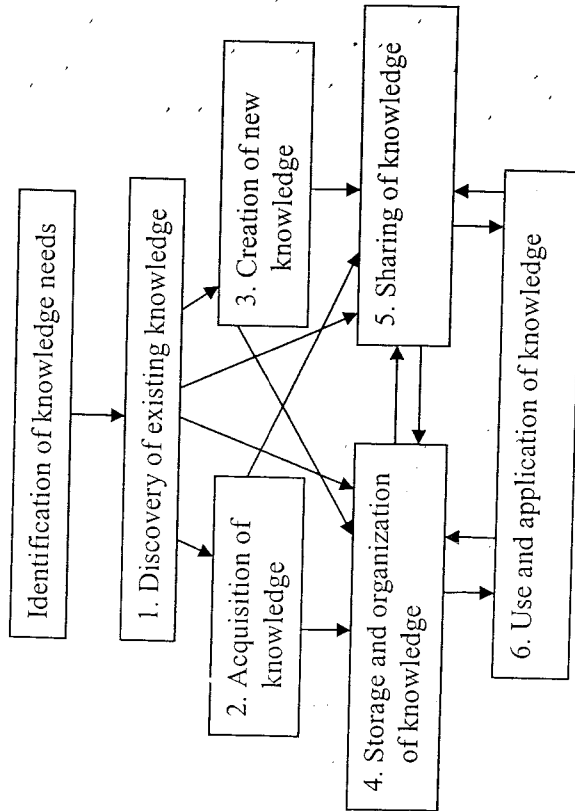
“ the core skills of library and information professionals are both relevant and essential to effective knowledge management, but they are often underutilized and undervalued. Surely it is our job to put that right.”

We cross examine this important statement by looking at the Conceptual Framework of Knowledge Management Processes (CFKMP) and some statements from KM experts in order to relate them to IM and draw similarities and differences and their implications to curricula. The CFKMP drawn below stipulates 6 key processes which are preceded by “Identification of needs.” These are:

- (i) Discovery of Existing knowledge
- (ii) Acquisition of knowledge
- (iii) Creation of new knowledge
- (iv) Storage and organization of knowledge
- (v) Sharing of knowledge
- (vi) Use and application of knowledge

The above appear to be similar to IM processes namely: literature search and analysis, selection and acquisition, processing and storage, retrieval and dissemination, and research, respectively.

Conceptual Framework of Knowledge Management Processes



KM PROCESSES/ACTIVITIES

The following knowledge management processes/activities are listed
<http://www.itmweb.com/essay538.htm> (11/17/2005)

- (i) Knowledge capture - creation of documents and moving documents onto computer systems
- (ii) Adding value to knowledge through editing, packaging and pruning
- (iii) Developing knowledge categorization approaches and categorizing new contributions to knowledge
- (iv) Developing IT infrastructures and applications for the distribution of knowledge
- (v) Educating employees on the creation, sharing and use of knowledge

The above are similar to the following IM processes/activities matching the above respectively:

- (i) Database management
- (ii) Information Repackaging
- (iii) Classification/cataloguing (organization of knowledge) /abstracting/indexing
- (iv) Automation
- (v) User education.

KM CROSS-DISCIPLINARITY

Barclay and Murray (1997) note that KM is a cross-discipline and therefore draws on many disciplines including: cognitive science; expert systems, artificial intelligence and knowledge based systems, computer supported work (groupware), technical writing, document management, decision support, semantic networks, relational and objective databases, simulation and organization science, systems. IM curricula, though not comprehensively, has addressed these operations through ICT application particularly in respect of MIS and Networking

SHIFTING TO INFORMATION ARCHITECTURE

Manville <http://www.brint.com/km/whatis.htm>, (7/11/2005) advises a shift from the traditional emphasis on transaction processing, integrated logistics and workflows to systems that support competencies for communications building, people networks, and on-the job learning. Three architectures have been isolated:

- (i) A new information architecture that includes new languages, categories, and metaphors for identifying accounting for skills and competencies
- (ii) A new technical architecture that is more social, transparent, open, flexible, and shows respect for the individual users.
- (iii) New application architecture oriented toward problem solving and representation, rather than output and transactions.

This shift of emphasis will bridge up the remaining gap between IM and KM.

In the final analysis, managers need to develop a greater appreciation for their intangible human assets captive in the minds and experiences of their knowledge workers, because without these assets, the companies are simply not equipped with a vision to foresee or to imagine the future while being faced with a ~~log~~ of unknowingness. But these assets were information in their primary state.

CONCLUSION

The above synthesis shows that neither IM nor KM is isolated from the other; they are complementary. Though baptized different names they could be referred to as identical twins. Their umbrella purpose is the same namely to generate, acquire, process, store, retrieve and disseminate information/knowledge for their jurisdictions. While they co-exist they are too big to be one entity.

IM and KM curricula should not be isolated. In curricula terms we are reminded of the concepts "core", "electives" and "specialization". The core concept reminds us of "the assumption that there is a body of knowledge that is central to all librarianship (now read information and knowledge), sufficiently central indeed, that all prospective information/knowledge workers should be required to master, no matter what the type of library or type of function speciality may be" (Asheim, 1978).

On the other hand the philosophy of "electives" reminds us that the information/knowledge profession programme is integrated, building from the general to the specific. Electives take further the framework that was established and consider the role a particular type of...service, the service to a particular community group, or the utilization of certain categories of materials. They should demonstrate the relationship between the individual areas of study and the whole Pattern for professional career.

Specialization could be the strategy the curriculum could address information and knowledge management generally as separate entities.

However, specialization has been accused of disuniting the profession and promoting "pseudo-specialization" implemented in haphazard manner and taking in account transit enthusiasm, institutional rivalry and monitoring expediency. The best approach to specialization could be to offer a single specialization "information or knowledge management" as long as it teaches the principles and procedures common to all sectors of the information field. A specialized programme is a cluster of courses assembled to form an integrated whole. It consists of a sequence of planned courses bearing defined relationships to each other and the basic core.

The old saying "All roads lead to Rome" holds very true to information and knowledge management. IM and KM are birds of the same feather. Naturally they should fly together!!!

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