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Full Length Research Paper

Contemporary issues in information management: A fresh look for information professionals

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To investigate contemporary issues in information management, explore the role of information professionals in adapting to the current information environment, and suggest possible solutions and recommendations. The investigation utilized recently published articles from the internet, conference papers and literature surveys. The paper investigates the contemporary issues or trends in information management and the crucial role of information professionals in provision of information services. These include: knowledge society, emergence of knowledge management, professional competencies, skills and attitudes, information communication technology (ICT) and globalization of information services. In light of this, information professionals face challenging information environment in terms of demand, user expectations and technological innovations. The crucial role of information professionals is to ensure proper management of information services, which is instrumental in bridging the information gap between the information systems and the information managers. Therefore, information professionals need to equip themselves with adequate professional knowledge, skills and competencies to remain relevant in the ever changing information environment. The paper reveals that globally the area of information management is facing tremendous changes that pose serious threats to information professionals. A review of the existing literature carried out identified several contemporary or emerging issues in information management that have a direct bearing on information professionals such as: knowledge society, knowledge management, professional competencies, skills and attitudes, ICT and globalization of information services.

Key words: Contemporary issues or trends, emerging issues or trends, information management, knowledge management, information professionals, information services.

INFORMATION MANAGEMENT: EMERGING PERSPECTIVES

Contemporary issues or trends are sweeping across professions in the world including the information profession. However, the issues are more felt in the area of information management. A number of emerging issues have risen in the recent times ranging from information society and knowledge society to information management and knowledge management to professional competencies, skills and attitudes to ICT and globalization of information services. These issues are now driving the need for change in information management. In light of this, the information profession is undergoing tremendous change. Change from free information to pay information, information to knowledge, conventional library to digital library, and globalization to technological innovation. Newman et al. (2001) have predicted: No profession will undergo more radical change between 2000 and 2010 than will the information profession.

However, people and organizations alike always resist change whether beneficial or not. Omekwu et al. (2006) while quoting Rutkowski (2000) points out that: change is the constant that is constantly being challenged. People resist change and changes even though it may lead to new knowledge or to a better life. Organizations also resist change even though it may lead to a better and more effective system. Most people desire to stay with the known rather than venture into the unknown and most organizations stay the course, at best making incremental change rather than launch revolutionary transformation. For information professionals tapping into these issues and having a fresh look is equally essential in information

management.

Data, information, knowledge and wisdom

A review of the existing literature shows that since time memorial various attempts have been made to define these closely related concepts (Al- Hawamdeh, 2002; Bellinger, 2004; Faucher et al., 2008; Hicks et al., 2006; Singh, 2007). Hence, it is essential to understand the definition, difference and relationship among data, information, knowledge and wisdom before information management (IM) and knowledge management (KM). However, there is no consensus within the literature on the agreed definitions. A number of authors (Awad et al., 2004; Faucher et al., 2008; Hicks et al., 2006; Singh, 2007; Wiig, 2004) have noted strongly that the literature on information management and knowledge management is replete with distinctions among data, information, knowledge and wisdom. Consequently, Faucher et al. (2008) observe that: the linguistic origins of these terms shed some light on the derivation of their meaning (Table 1), but only broadly hint at the concepts as they are currently understood. Interestingly, the earliest recorded usage of each of the terms occurs in reverse order from their generally perceived level of simplicity according to the traditional knowledge hierarchy: wisdom is the oldest term, and data the newest, in English.

Data is factual information (measurements or statistics) used as a basis for reasoning, discussion, or calculation. Information is the communication or reception of knowledge or intelligence. Knowledge is the condition of knowing something gained through experience or the condition of apprehending truth or fact through reasoning. And intelligence is the ability to understand and to apply knowledge (Bouthillier et al., 2002) . Consequently, Awad et al., (2004) define wisdom as the highest level of abstraction, with vision, foresight, and the ability to see beyond the horizon. In the same vein, most recently, Thierauf et al. (2006) define wisdom as the ability to judge soundly over time. In another related development, Wiig (1999) defines information as facts and data organized to characterize a particular situation and knowledge as a set of truths and beliefs, perspectives and concepts, judgments and expectations, methodologies and know-how. Therefore, information can be seen as data made meaningful by being put into a context; and knowledge as data made meaningful through a set of beliefs about the causal relationships between actions and their probable consequences, gained through either inference or experience (Mitchell, 2000).

There is a relationship or hierarchy among the concepts of data, information, knowledge and wisdom. This relationship or hierarchy is usually seen as a pyramid ascending from data to wisdom. However, other authors have strongly argued against this usual approach and suggested other options. Tuomi (1999) suggested reversing that hierarchy on the basis that data were more important than knowledge, also pointing out that knowledge had to come first in order to create data. Also, Nissen (2002) proposed a dual approach, making a distinction between knowledge seekers and knowledge creators. From the seeker point of view, data is put into context to create information and information that is actionable becomes knowledge, which is in turn needed to create data.

Bellinger (2004) explains this relationship as follows: information is a relationship between data. Beyond relation there is pattern, where pattern is more than simply a relation of relations. Pattern embodies both a consistency and completeness of relations which, to an extent, creates its own context. When a pattern relation exists amidst the data and information, the pattern has the potential to represent knowledge. It only becomes knowledge, however, when one is able to realize and understand the patterns and their implications. A pattern which represents knowledge also provides, when the pattern is understood, a high level of reliability or predictability. Knowledge differs from information in that it is predictive and can be used to guide action while information merely is data in context. Wisdom arises when one understands the foundational principles responsible for the patterns representing knowledge being what they are. And wisdom, even more so than knowledge, tends to create its own context.

Data, information, knowledge and wisdom represent an emergent continuum. Indeed, one's understanding develops as one progresses along the continuum. Everything is relative, and one can have partial understanding of the relations that represent information, partial understanding of the patterns that represent knowledge, and partial understanding of the principles which are the foundation of wisdom (Bellinger, 2004). Hence, these concepts are nodes that connect and relate to form useful meaning. Data when connected, it becomes information. Information when connected it becomes knowledge. Knowledge is a connection of information. And knowledge when connected it becomes wisdom. However, it seems sensible that a general hierarchy of data, information, knowledge and wisdom should permit transition in both directions of ascending and descending (Williams, 2008).

Transition to knowledge society

The concept of information society dates back to the 1970s. Ever since that time, the concept has continued to evolve and change. Indeed, it is in the information services environment where the concept of change is seen as a norm rather than an exception (Pugh, 2007). While writing on the same topic Wood (2000) demonstrates this fact of change clearly, as follows, change from free information to pay information; traditional library systems to digital information systems; library mergers with related or associated departments (like information communication technology) and many more. However,

Table 1. Linguistic origins of key terms relevant to knowledge management

Team	Origin	First recorded usage in English[a]
Data	Latin (Datum, dati)	1646 Hammond: "From all this heap of data it would not follow that it was necessary"
Fact	Latin (Fact, factum)	1539, Henry VIII, Act31 c.8:" Every such…persons shall be adiudged a traytour, and his facte high treason"
Information	Adopted from old French (informacion), adapted from latin (inform ti n, informationem)	1386. Chaucer. "Whanne Melibee hadde herd the grete skiles and resons of Dame Prudence, and hire wise informacion and techynges
Knowledge	Middle English (knaulauge, knowleche). Construction on Old English and teutonic origins	1300 approx., Cursor M.: To make knaulauge with sum-thing Til sir august, bair ouer-king"
Wisdom	Old English and Frisian (wisd m) as well as old saxon (wisd m)	888 AEfred Boeth: ba com bær gan in to me heofencund WISDOM"

[a]Oxford English Dictionary, 2nd ed, under revision (2006) available at www.oed.com/ Source: Faucher et al., (2008).

this change became rather evident in the 1980s when the society (people) began to value, appreciate and accept information; and use computers and telecommunication systems. This particular act opened the information space and marked a big turning point in the history of information society. This has progressively continued to change depending on the dictation and demands of the society.

Information society has been evolving in the last 40 years or so. This saw the emergence of information as a basic need in the society. It is the main ingredient for human beings in terms of development and survival upon which nothing can be done or achieved. In the initial stages of evolution the main focus was information economy. But in the recent past there has been a swift change from information economy to knowledge economy. This is the main focus in the society today. The fact of the matter, however, is that knowledge is not exclusive to those countries of the advanced economies. Neither is the concept of knowledge driven economy (Ariyo, 2000). In addition, this aspect is reinforced by the mere fact that information is increasingly becoming ever important in the society with the infiltration of ICT systems in all human aspects. Indeed, many see it as the main source of competitive advantage in the society.

However, the concept of "information" is slowly being replaced with "knowledge" (Singh, 2007; Omekwu, 2005; Materska, 2004; Scammel, 2001). It would be rather argued that the universally accepted concept now is "knowledge". Pugh (2007) quotes Guy St. Clair as acknowledging that: "while many are not comfortable with the substitution of "knowledge" for "information" (or vice-versa) such casualness in the management community is now something that most people accept". In the past it was "information" while in the present and in future it is "knowledge". Consequently, the information age is now being replaced with the knowledge age. The information economy is progressively being replaced by the knowledge economy. Ariyo (2000) noted that: the concept of knowledge economy is used to describe an economy in which the generation and the exploitation of knowledge have come to play the predominant part in the creation of wealth. It is about the more effective use of all types of knowledge and creativity in all manner of economic activity.

In the information age the economy is built on information rather than industry. However, the concept of "knowledge age" with "knowledge" as the main ingredient is slowly being accepted and acknowledged. Consequently, in the knowledge society age the vital strategic resource is knowledge. The knowledge-based economy has brought with it better means to manage knowledge. This can be seen clearly in the current economic revolution with new ideas to library and information centers like: automated reasoning, artificial intelligence and integrated information systems.

However, there is still confusion on which term is appropriate to use. The 20th century is associated with 'information' and the 21st century with "knowledge". This confusion is still there because "information" and "knowledge" are being used interchangeably or in an overlapping manner (Singh, 2007).

Emergence of knowledge management

In the recent past, there has been a growing interest in knowledge management as an emerging practice (Bouthillier et al., 2002; Bechman, 1999; Ives et al., 1998). Singh (2007) refers information management as an interdisciplinary field that focuses on information as a resource, with greater emphasis on the acquisition and management of external information and to some extent the management of internal records and other documents. Information management mainly deals with managing documented and explicit knowledge (that is,

information), which can be easily transferred or shared within or outside the organization. According to Townley (2001) knowledge management is the set of processes that create and share knowledge across the organization to optimize the judgment in the attainment of missions and goals. Knowledge management is the process of capturing organizational collective expertise wherever it resides in databases, on paper, or people's head and distributing it to wherever it can help produce the biggest payoff (Dubey, 2003).

Thus, information management is a prerequisite of – but only part of – knowledge management. Knowledge management is an efficient use of human knowledge that exists within an organization through sound practices of management principles and information management to achieve organizational goals and objectives. However, the distinction between knowledge management and information management is far from being well-articulated in the KM literature and this is compounded by the confusion around the concepts of knowledge and information (Bouthillier et al., 2002). In addition, Singh (2007) noted that: the line of demarcation between information management and knowledge management is still very blurred. As a result, both of these terms are used interchangeably.

Historical perspective

The emergence of knowledge management has a long historical perspective. Wiig (1999) explained that: historically, the roots of knowledge management can be traced back to the ancient times, both in the West and the East, as well as to the modern times more so those associated with cognitive and information sciences. Knowledge, including knowing and reasons for knowing, were documented by Western philosophers for millennia, and with little doubt, long before that, Eastern philosophers had an equally long documented tradition of emphasizing knowledge and understanding for conducting spiritual and secular life. Much of these efforts were directed to obtain theoretical and abstract understandings of what knowledge is about.

The history of managing knowledge goes back to the earliest civilizations (Wiig, 1997). As civilizations passed and changed from generation to generation, great care and efforts were put in place to capture, store, preserve and distribute knowledge gained over these great periods of time. During this time there was need to preserve knowledge which lead to the development of great libraries of antiquity like the Library of Alexandria in Egypt, which was founded in the 3rd century BC and lasted almost 1,000 years. At its peak the library contained more than 500,000 hand-written works, copies of which were made and disseminated throughout the world (Ives et al., 1998). However, the need to capture, organize, store, preserve and distribute knowledge effectively and efficiently lead to the development of new technologies.

For example, take text in which the invention of papyrus lead to the recording and transporting of real literary and academic works. The invention of text had lead to the knowledge revolution. This very act expanded the possibilities for knowledge capture, organization, storage, preservation and distribution.

The greatest technological invention made in the history of human civilization was the printing press. The direct impact of printing technology was the wider dissemination of recorded information around the world. The result is the emergence of a knowledge economy with increasing numbers of people engaged in one form of knowledge work or another. This made it possible to disseminate knowledge exponentially and affordably to as many people as possible (Omekwu et al., 2006). The printing press increased production of information tremendously. Since the 15th century, the sheer quantity of information has steadily increased as the technologies for creating and preserving knowledge have progressed (Ives et al., 1998). Although print increased the production of information, it limited the type of information accessed, stored and transmitted.

Technological advances especially in ICT have created, opened new and better means of capturing, or-ganizing, storing, preserving and distributing knowledge. Modern requirements dictate use of ICT systems such as artificial intelligence, automated reasoning, integrated information systems and digital information systems to enhance knowledge management practices. The evolu-tion of digital information systems has made it possible to solve several distinct knowledge capture and distribution limitations. Additionally, technological advances are not only addressing the increasing scalability requirements, but they are also expanding the opportunities of managing and providing knowledge. Print technology was limited in another way that digital technology is helping to overcome.

Knowledge management, in its most current sense, may generally be thought of as the effort to make the knowledge of an organization available to those within the organization who need it, where they need it, when they need it, and in the form in which they need it in order to increase human and organizational performance (Ives et al., 1998) . Knowledge management is an emerging discipline as the potential uses, features and benefits of the current incarnation of knowledge management are still being defined and as increasing numbers of people and organizations begin to explore this new form of communication and organizational learning (Shariq, 1997).

Competencies, skills and attitudes

Professional training

The information environment keeps on changing posing serious threats to information professionals. In light of this, they need to invent and adopt innovative ways to

survive in this dynamic and competitive environment. Information professionals should equip themselves with adequate professional skills and competencies to remain relevant in the mainstream of information services. In this regard, professional training for information personnel is a must in the current information services industry. It is essential to provide continuous training for staff in order to improve professional competence to meet the information needs and support improvements in information transfer services. The information staff needs to be trained in new emerging areas of the information industry like ICT.

In addition, they must recognize that best results can be achieved by focusing on the needs and demands of the information audience, working in a team and sharing knowledge and experience to achieve best collective results. Information professionals should develop themselves in such a way that they can contribute to organizational productivity and profits. This will bring them recognition as active and strategic partners of the organization. For this, they must have strong background in information management skills, good communication skills, and an understanding of human behavior and cognitive science. They must update regularly to stay competitive in any information-intensive and highly dynamic market. Meeting users' expectations should be the goal. Technological change has ushered in many great challenges for information professionals to face, which require continuous efforts on their part to enhance their abilities to learn, adapt and change by acquiring new skills and competencies. Those who ignore the need to change cannot survive in this constantly changing environment.

Information professionals need to have the required knowledge, skills and competencies in order to manage information services effectively. If information professionals are to assert themselves as key players in the information society, they will need to involve themselves as active participants in the information environment and be assertive in representing the needs and requirements for organizing and providing access to information in all formats. Information professionals should be articulate regarding a host of complex issues including: system design, dissemination of unpublished electronic information, security and privacy of information, equal access to information for all users and the continuing use of copyright and ownership. Information professionals have entered a new era which is unfamiliar and confusing both ethically and legally.

Information literacy and lifelong learning

The ever increasing amount of information available adds another twist in information management and information profession namely: information literacy and lifelong learning. This entails that information professionals play a key role in imparting lifelong learning skills to the information audience. The origin of this concept of information literacy dates back to 1970s. However, the concept has evolved over the years and has been essential in the development of the information society. Materska (2004) distinguishes the two terms namely "information" and "literacy" while quoting OECD as: information literacy is a survival skill in the information age. While literacy is a means to achieving individual goals and developing knowledge and potential. In addi-tion, Materska (2004) and Wallis (2005) agree in principle on the need for information literacy skills and the role of information professionals in achieving lifelong learning knowledge and skills in this information age.

Direct access to information services has changed the role of information professional from traditional keepers to guides. Information literacy skills are needed to enable one to use information and information communication technology effectively, and to access appropriate digital resources, as noted by (Materska, 2004). In addition, Kavulya (2007) observes that: to ensure that digital libraries are fully utilized, there is, need to develop learning and education as a lifelong process through information literacy programmes. This is because in a digital environment, end-users are expected to interact directly with computers to fulfill their information needs. Information professionals must be proactively involved in this process of imparting knowledge and skills. Now more than ever, lifelong learning knowledge and skills becomes important for library and information centers, information professionals and information audience.

Information communication technology

The role of ICT

Keeping up with the demands of information services is one of the biggest challenges facing information professionals today. Singh (2007) notes that: in the current technological environment, libraries are passing through a challenging phase, which is posing serious threats to library and information centers and information professionals. The increasing role of ICT systems in information services has been so fast that information professionals are now concerned about their role, which is increasingly becoming dependent on ICT. The most significant example of how ICTs have changed the role of information professionals has been the development of wired information services such as: internet, virtual reference services (via web-based chat, instant messaging, text messaging and e- mail), online or electronic services, online information literacy, artificial intelligence, and digital information systems. With this development library and information centers are in a position to offer information services around the clock or 24/7 services as well as access information even from remote sources.

In addition, technological innovation has presented the possibility of automating all aspects of traditional or con-

ventional library and information centers. After almost three decades of computerization of the operations of information services, a dramatic change is already evident in the way information services are being provided. Technological innovation has affected the role and responsibilities of the information professionals, changed working relationships and communication patterns as well as provided additional functions and services to the existing information services. Omekwu (2006) discusses the impacts of information technology revolution on libraries and emerging issues like globalization and digitization among others. In the same vein, in 2004 a group of researchers in Spain developed the UJI online robot. This robot is able to navigate the library, look for the specified book and upon its discovery, carefully take it from the shelf and deliver it to the user. Because of the robot's extremely limited function, its introduction into libraries poses little risk of the employment of librarians, whose duties are not defined by menial tasks such as the retrieval of books. The same could be said of other technology developments including the internet and the current radio frequency identification (RFID).

With the help of technology library and information centers are increasing, expanding and offering new information products and services such as computer mediated information services including: chat reference and instant messaging, blogs, online databases and online delivery. Konata (2006) notes that: all these efforts are as a result of library applying the business/economic principle of “supply and demand.” Libraries are reinventing themselves by going where the customers are, for instance, internet search engines such as Google and Yahoo! among others. Current information customers are more hooked to the internet than to books where information is current and accessed very fast by the click of a mouse. Libraries must full embrace the use of technology in managing and delivering information.

ICT exists in many ways mainly computers, telecommunications with local, national and international networks offering bibliographic, textual and graphic products and sophisticated fax equipment. Today, at least most information professionals and information audience have access to the use of computers. The traditional or conventional information products, services, skills and practices are changing as new ones are being developed. The information audience also has high expectations of an information service due to the introduction of various electronic devices. In addition, they face the challenge of becoming more information and computer literate. Indeed, information services have expanded and new ones evolved combining traditional and electronic resources, hence, giving the customer a variety of information products and services. As a result, each individual is faced with the possibility of learning a variety of new ICT skills. Information professionals need relevant technological skills and experience to work.

Various trends in information provision can be detected as information systems move into the knowledge era. The integration of various databases onto the same platform which is easily accessible by all in the same institution or organization is a particular development. This system of devolution of information and information services has not only changed the face of library and information centers but also the image of information professionals.

The internet and related technologies

Technological innovations have provided new opportunities and challenges to manage information. An example of this is the development of the internet and related technologies such as the World Wide Web (WWW), the one single development which is having the greatest impact as a huge information resource and a channel of distribution. This started as a technological solution for the transfer of information with little or no awareness by the information profession for many years. The internet provides a rich source of information that can be globally accessed easily and quickly. The information professionals’ skills as a database searcher are becoming even more sought after, to navigate the internet and locate relevant information for users. Some users initially think that the internet is a panacea, and all information required for use and other needs will easily be found at the touch of a button. They quickly find out that this is not so, and this is when the information specialists involve-ment and knowledge is essential. However, information professionals are yet to catch up with this vital technology. Utilizing this technology makes it quite possible to manage information services by integrating traditional skills (classification, indexing and subject control) with modern skills.

Electronic information environment

Digital information systems

Technological innovations have rapidly changed the traditional information service to digital systems. This provides a unique opportunity to the information staff and the audience to integrate with the available information on the net. This has effectively enhanced and replaced traditional collection. Digital information services are readily available 24/7 from anywhere anytime in the world. However, to the information professionals, the digital approach seems more threatening in the sense that they will be rendered less useful in the information industry. This is not the case since the digital revolution has brought with it new emerging trends in the information service environment for the information professionals.

Library and information centers in developing countries

including Kenya have responded albeit slowly in regard to the development of digital information systems. In the mid-1900s the concern was what happens "when the virtual becomes the real". Today, the virtual has not only become real but also created virtual realities (Omekwu et al., 2006). Again, digital libraries depend on information and communication technology infrastructure to facilitate distributed processing, high-speed networks, information processing, storage and retrieval, user interfaces, geographical distribution, security, high quality presentation and perpetual availability of digital information (Chowdhury et al., 1999).

The present information environment is rapidly changing from conventional to digital information systems. Electronic information in terms of electronic books (e-books), electronic journals (e- journals), electronic theses and dissertations (e-thesis and dissertations), electronic learning (e- learning), electronic commerce (e-commerce), electronic banking (e-banking) and electronic repositories (e-repositories) are all systems that represent the present information environment. The importance of the digital revolution is the ability to convert textual, audio, video, sound, photographic and graphics to digital computer – readable and storage formats of information (Omekwu et al., 2006). Several digital library initiatives have been reported in the Sub-Saharan region (Lor, 2005; Rosenberg, 2005).

In the transition to digital information systems, information professionals must come to the front and provide the much needed leadership for successful implementation. However, information professionals in Sub-Saharan Africa lack the necessary ICT skills and competencies needed for successful implementation of digital information projects (Kavulya, 2007; Rosenberg, 2005).

Globalization of information services

Globally, information work has not only increased tremendously in terms of products and services, but also in terms of global players and distribution channels. Information products and services are now available in masses. In addition, the products and services are available from multiple sources. Production and service capabilities that were available from limited sources in advanced countries are frequently found in countries that were considered developing and incapable of sophisticated work. Developments of ICT systems have also increased the means of managing information. Technological tools connect institutions, nations, continents and integrate resources and services, and boundaries are blurred (Omekwu et al., 2006). In addition, Omekwu (2006) quoting Turker explains this clearly as follows: the internet is one key development in growth of globalization in the 20^{th} and 21^{st} centuries. Globalization has changed the nature of national governments, imposing national and international culture on local culture and promising to regulate economies. However, it has also widened the gap between many nations and alienated those that do not abide by the new order. Furthermore, high-tech multimedia and virtual reality arrived, compiling economists, politicians, lawyers, bankers, engineers, and scientists to rethink and re-engineer work methods, policies, laws, and standards.

All these developments have increased competition among the global information players where only the best will survive by being effective in operation, marketing and creation of products and services. Globalization provides expanded opportunities in information services. For information professionals, the biggest challenge is on how to exploit the potentials of ICT systems to manage global information services effectively.

The role of information professionals

Bridging the information gap

The role of the information professional is the establishment of connections between those who have information, and those who want it. Information professionals must be well prepared in meeting the challenges of the current and the future information environments. In today's information environment, information professionals have concerns, such as the need to get close to the user, to take a marketing approach to organizational information services, to properly integrate information services with the needs of business, and to provide information to customers rather than just data. The underlying role is to ensure quality provision of information services. They need to have knowledge and skills in various aspects of information services like: knowledge management and technological systems. A revised curriculum for information services needs to be established, to include additional information fields (Matersk, 2004; Singh, 2007; Omekwu, 2004).

Adapting to emerging professional trends

ICT is transforming the global information environment. ICT provides huge opportunities to: develop the information roles, market services, access new sources, and reach a much greater user base. In addition, ICT poses a threat to the role in the information industry. It must be recognized that the traditional markets for information skills and services keeps on changing as new skills and services are being developed. These new roles for the information professionals include: information strategist, facilitator and advisor and consultant. The information environment fabric is already open to new and challenging opportunities that need continuous training for information professionals.

Marketing information products and services

The interest in marketing has tremendously increased

over the past few decades in libraries like other service centers: education, health, transportation, insurance, banking, etc. (Das et al., 2008). Marketing is a concept that usually involves the marketer selling a product and service to a customer. The library and information center is the "retailer" of information products and services and the information audience the "customer". Dempsey (2004) describes this interest pointedly as follows: in the City of Atlanta the importance of marketing and branding is hitting home in many organizations outside traditional business. Libraries have paid some attention to marketing in order to compete. Borders bookstore wants to be the "third place" after home and office for consumers where they can comfortably read and explore while enjoying a latteÁ without any pressure to buy. Libraries have responded with major renovation projects that transform the library building into a more inviting place complete with a coffee bar and browsing area of popular books with new age furniture. According to Fox (2004), there were 36 such projects in academic libraries. Almost in direct contrast to libraries providing a comfortable place for students to stay awhile, libraries are also providing a learning/information common which provides quick and easy access to a wide array of library services and technology.

Singh (2004) defines branding as "a name, term, sign, symbol, design or a combination of these, which is used to identify the goods and services of one seller or group of sellers and to differentiate them from those of competitors". According to Konata (2006), the library brand is one that needs better brand management to improve the image and perceptions in a library user's mind. For this to be done, information professionals must first ask the question, "What business are they in?" Many would say that they are in the business of providing information services. This is erroneous and does not help information professionals to compete. Libraries are in the business of "finding solutions" by making relevant information easily and readily available. This shift in thinking is necessary to relate to the library user and to provide what they need, that is, answers to questions.

Helping users find solutions and answers to problems means they actually have to use the information product. So, it is not enough for us to just subscribe to databases and have them available. In the same vein Kapoor (2001) says that: the marketing cycle is complete only when consumption takes place. Without consumption, your sale is only a transfer of goods. No matter how hard you push the supply chain, unless the customer consumes your product, there will come a time when the supply conduit will get clogged and your product will not move anymore.

According to Konata (2006), libraries, knowingly or not, have used their websites as part of their marketing scheme. Many services provided by libraries are online and do not require a visit to the library or interaction with library personnel. Therefore, the online environment has to create or develop a relationship in the same way as a face-to-face interaction. That is, the screen has "to make friends and influence people". This is quite possible as exemplified by successful internet information services like Google Scholar and Yahoo! According to Das et al. (2008) the modern library is now generally called an information market and the library user is a consumer of information. Information is a vital resource for research and development of any nation. The ultimate aim of marketing here is to provide the right information to the right user at the right time. All these demonstrates innovative ways of re-inventing the wheel of information products and services, in a new environment and community that forces them to market, and advocate their own identity and relevancy in order to compete in a more diverse and abundant information environment.

Developing customer relations

Developing relationships with users is imperative if libraries are to meet the needs of the current generation of users namely: the millennial generation. Millennials are those born between 1977 and 1994 and are the second largest population group after the Baby Boomers (Zou et al., 2007). Millennials approach learning differently and are more goal - and results- oriented than previous generations (Walker, 2006). The current generation of library customers has varied information wants which needs various approaches when handling them. Konata (2006) observes that: the library must be goal and objective oriented in delivery of information services. For instance, most customers like using information services in team-oriented or group-oriented way. This calls for attention in design of the library building in order to provide more study space to accommodate this need and more tolerance for a slightly higher noise level. In addition, the current generation customers are happier with communicating using instant messaging than any other form of communication. Hence, appropriate software programmes need to be put in the library to satisfy their information need. Being the computer generation customers they also need information communication technologies in order to access and use information in the library. If the library is short of these resources naturally puts them off!

Information professionals must engage in strategies meant to market and advocate information products and services to the audience. Information audience or customers want information and not books when accessing library and information services. Konata (2006) noted that: "the customer is always right", has long been a mantra and philosophy in the business world for the obvious reason of needing customer loyalty to survive. Libraries have not always followed this principle to the same degree because it was not necessary to do so. Resources found in libraries were so unique that there was no other place to find them. The age of the internet changed that and libraries must now compete against

other online sources available on the internet and web. One way to compete is with customer satisfaction and loyalty and how we resolve customer complaints.

According to Konata (2006) in business, customer complaints are more valued and welcomed than they are in libraries. Businesses use these complaints to improve their services and customer relations. They are probably more valued in business because the bottom line is at stake. Businesses recognize that it is easier to retain a customer than it is to establish a new one. For a long time, libraries have had a built-in audience with no other option. But in today's environment, that no longer holds true. Libraries have to constantly prove their worth to, at the very minimum, retain current budget levels or even increase them. Handling customer complaints is critical when you consider those who do not complain. Commenting on the same Jackson (2002) says that: 96% of the customers who do have problems with a business do not complain. This means that for every complaint the average business receives, there are 24 silent unhappy customers (206). While these 24 silent unhappy customers may not complain to us, they are complaining to everyone they know. Unhappy customers share their experiences with others far more than do happy customers, and, what this could mean for libraries is disastrous.

Leadership and management competencies

The information environment is facing radical issues especially in the area of leadership and management aspects. These aspects must be grounded in a consideration of the information needs and demands of the customers or clients. Quality services are only possible through quality leadership and management practices. No one can dispute the importance of leadership qualities in human beings. From newspaper adverts to open discussion forums in all fronts (local, national, regional and international) the concept of leadership is ever emphasized. A literature review of "leadership on libraries" in Google search engine alone retrieved an overwhelming response. This shows the importance of leadership in information management today. In the process of achieving total quality management, leadership tops the list. Tang et al. (2006) while quoting Avolio noted that: "at least 9 of Deming's 14 principles" refers to leadership and its importance to achieving total quality management. In another related development, leadership is seen as the first of five important and current sustaining continuous improvements (Kaye et al., 1999).

The relationship between information leadership and total quality management is very essential in the management of information. Without the support from all the concerned constituencies then quality of services cannot be achieved. Executive and constituencies support are key elements to the success of any library and information center setting, and quality services is no exception. Library and information centers need to put in place quality management and best practices for better delivery of products and services. Tang et al. (2006) assert that in the context of a library all library staff can each display initiative and direction in the area of quality management and thereby influence – in various ways - the structure, success and future development of a library's quality management program.

SUGGESTIONS AND RECOMMENDATIONS

The changing nature of the current information environment calls for new skills and competencies on the part of information professionals. Information professionals must be well grounded in ICT related competencies such as core hardware and software skills, web design, internet searching and evaluation of electronic information. Library and Information Science (LIS) Schools in developing countries including Kenya must be proactive in their approach of training competent information professionals. Therefore, it is essential to provide continuous training for the information staff in order to improve their professional skills and competencies. This affords humble opportunity for training information professionals in new emerging areas of the information work more so in ICT.

In the knowledge age, the challenge is to manage not only information but also the technological tools that can facilitate knowledge creation and communication. Information professionals must be ready to move with the challenges of ICT environment namely: knowledge society, knowledge management, internet based technology, digital technology, globalized information access, networked resources, new learning and research systems and the high demands of the user communities. Here, the threshold is to be agents of change and progress in information accumulation, assessment, assortment and access.

Information professionals have a tendency to want to be all things to all people and therefore develop too many products and services instead of focusing on a core group of products and services which is essential to the organization. The information professional needs to get rid of peripheral activities, and become an expert in the tasks that are valued and expand those products and services that are critical to assisting the organization in becoming more competitive. This calls for the integration of new management skills in the information environment so as to improve quality of information services, provide goals for better services delivery and continuous growth. Information professionals need to direct all their energy to better and focused information services based on customer needs and satisfaction and continuous improvement.

The reinvention of information service providers will continue in the future and parallel the progress made with technological innovations. As to whether or not libraries

can keep up with competitors, such as Google, will depend on how quickly they respond to user needs and demands. To do so will require constant monitoring of trends in technological innovations and relationships with the information audience. Relationships with users can be maintained by welcoming customer complaints and providing timely answers to these complaints. Establishing firm policies will ensure that issues are handled in a non-discriminatory fashion giving personnel justification for their decision-making (Konata, 2006).

The paper has drawn together a number of issues currently facing information management namely: knowledge society, knowledge management, professional competencies, skills and attitudes, ICT and globalization of information services. These issues have a direct bearing on the performance of information professionals. Hence, they affect the crucial role of information professionals in provision of information services in library and information centers. The information service environment is changing very fast. Therefore, there is need to open the information profession and embrace new emerging ideas. As agents of change, information professionals must play a key role in the current knowledge society.

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