

**EFFECTIVENESS OF INFORMATION LITERACY PROGRAM IN PROMOTING
UTILIZATION OF ELECTRONIC INFORMATION RESOURCES BY
POSTGRADUATE STUDENTS IN KENYATTA UNIVERSITY
POST- MODERN LIBRARY**

BY

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DECLARATION

I declare that this research is my original work and has not been presented in any other university / institution for consideration of any certification. This research has been complemented by referenced sources duly acknowledged. Where text, data (including spoken words), graphics, pictures or tables have been borrowed from other sources, including the internet, these are specifically accredited and references cited using current APA system and in accordance with anti-plagiarism regulations.

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Supervisors' Declaration:

This research has been submitted for appraisal with my approval as a University Supervisor.

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DEDICATION

This research is dedicated to my granddaughter's Abigail Jane and Jane Abigail.

May this research be a source of inspiration to you in the days to come.

God bless you.

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It is by God's grace and love that I have been able to get this far. It is only him who gives me in - comparable hope even when things seem to be impossible and for providing my school fees. I thank you God.

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ACRONYMS AND ABBREVIATION

BLDS:	British Library for Development Studies
CD ROM:	Compact Disc, Read-Only-Memory
E- RESOURCES:	Electronic Resources
ICT:	Information and Communications Technology
IFAP:	Information for all Programmes
IL:	Information Literacy
ILP:	Information Literacy Program
ISP:	Information Search Process
JKUAT:	Jomo Kenyatta University of Agriculture and Technology
MDGs:	Millennium Development Goals
NFIL:	National Forum on Information Literacy
SCONU:	Society of College, National and University Libraries
SPSS:	Statistical Package for Social Sciences
TEEAL:	The Essential Electronic Agricultural Library
UNDP:	United Nations Development Program me
USA:	United States of America

ABSTRACT

Information literacy in the 21st century is considered as a tool to individual empowerment and community development it forms the basis for lifelong learning it's common to all disciplines, to all learning environments and to all levels of education; however underutilization of electronic information resources in Kenyatta university library indicate that the postgraduate students lacks the information literacy skills required despite going through the IL training program offered to them by librarians, therefore the study sought to establish the reason why e- resources are underutilized by assessing the effectiveness of the IL program in enhancing acquisition of information literacy skills to the postgraduate students. The study objectives were to establish the content covered in IL training program; finding out the post graduate students views about the relevancy and adequacy of the program; determine the IL skills acquired by the postgraduate students from IL programs and to find out students views on effectiveness of the program for instance timing, time allocated to the program among others. The target population was 1026 postgraduate from which a 10% formed the sample of 126; 81 masters and 45 PhDs students were chosen. Descriptive research design was used to report the situation with regard to IL program effectiveness. Research instruments included questionnaires and an interview schedule; pilot study was carried out in JKUAT library. Data analysis was done using descriptive statistics and the computer – based statistical package for social sciences (SPSS) for analysis purpose. Quantitative data was presented in form of frequency distribution tables, pie charts, percentages, and graphs. Data was discussed and inferences were made that resulted in a report. The Findings indicated that the program was not effective due to the reason that the program covered only orientation and was very short, the number of student was too big for induction during orientation, the orientation schedule is too overloaded to allow time for IL Program, time allocated for e-resource training is not enough and time allocated for IL Program training is not adequate. The study recommends that the program should emphasize and offer more training on user instructions, computer information literacy, online databases and information searching and that the program be offered to students after registration not during registration. The study also recommends that an effective information literacy program be integrated into education curriculum to enable postgraduate students acquire information literacy skills that will enhance their utilization of electronic information resources.

CHAPTER ONE:INTRODUCTION AND BACKGROUND TO THE STUDY

1.0 Introduction

This chapter provides the background information to the study, statement of the problem, purpose of the study, objectives and research questions, significance of the study, limitation and delimitation, study assumptions, conceptual and theoretical framework and definition of operational terms.

1.1 Background to the Study

Information literacy in the 21st century is considered as a tool to individual empowerment and community development. Hall (2010) describes information literacy as the people's ability to know when there is need for information so as to be able to identify, locate, retrieve, evaluate and effectively use information to solve the problem or carry out their research. Information literacy forms the basis for lifelong learning; it is common to all disciplines, to all learning environments, and to all levels of education. It enables learners to master content and extend their investigations, become more self-directed and assume greater control over their own learning explains Hall (2010). Muhinja (2013) carried out a study on internet usage by students and staff at Mbarara university of Science and Technology and the results of the study indicated low usage. Though the Internet has provided a wider access to global information resources such as online databases, e-journals e-prints and other sources of digital information, these resources are not effectively utilized due to varying factors.

Wasike (2007) notes that, provision of electronic information resources in academic libraries is not smooth sailing; it is faced by several challenges such as lack of user skills and computer literacy skills. He found out that the necessary skills to the use of these services are via trial and

error. In the light of the emerging emphasis upon electronic information services within higher institutions of learning, it is vital that the postgraduate students who are the majority users of electronic information services and sources go through vigorous information literacy program so that they may acquire relevant skills for them not to end up being left behind in the ever prevalent information society.

Amunga (2007) noted that for students to benefit from electronic information resources and services, the library staff is expected to have acquired the necessary skills in order for them to help the users during information literacy programs which are offered to students immediately they register to the University for their Postgraduate Studies. However whether the librarians have the skills or not the program effectiveness is an issue of investigation. Electronic information services both within and outside the library has gained a lot of popularity among both the library staff and the user's. However, retrieval and use of these resources is still a major problem in spite of library conducting information literacy program to the students Amunga (2007) also felt that librarians in universities were not collaborating in offering comprehensive information literacy training to their library users. According to his study findings, there was still no formal collaboration between librarians and lecturers in importing information literacy skills to students. This implies that the academic community in Kenya is still limited in relation to the amount of information it can access and use for learning and research purpose. This means that the academic community cannot access or utilize current electronic information resources and services successfully. This limited access to electronic information raises questions on the effectiveness of the IL programs offered with regard to content and accessibility of electronic information resources.

Okiy (1995) also noted that there are critical factors to the transition of electronic information service that are fundamental access to these services, the need for a computer literate facility and information literate user, if the electronic information services are to be effectively used there is need for training of users in basic computer literacy and information retrieval skills during user education program offered by the library. However Horo (2006) concluded that studies carried out by various information professionals in Kenya indicates that there are lots of electronic information resources and services, and despite of the availability of these resources and services they are not fully utilized due to staff and library users lack of IL skills, and these skills can be offered during user education program an indication that either the skills are little earned or not well imparted on to the users hence the study seeks to find out the usefulness of postgraduate student information literacy program in enhancing utilization of electronic information resources in Kenyatta University post-modern library.

Over the past three years, the British library for development studies (BLDS) at IDS has been developing information literacy programs in Africa, and has thus been closely involved with many of these efforts. As part of the DFID-funded mobilizing knowledge for development program me and working with African universities and research centers, it has developed toolkits, courses and approaches to information literacy that have been trailed, Likewise, ITOCA's focus since it was established in 1999 has been mostly on providing African institutions with training and other Programmes that support information packages like TEEAL, AGORA, HINARI and OARE, which are valuable resources for development knowledge in developing countries. This workshop thus brings together the experience of ITOCA, BLDS and their partners to consolidate their work on information literacy focusing on an African context.

The Kenyan government recognizes the role of information and information communication technology (ICT) in socio-economic, political and technological development if it has to make strides in achieving the millennium development goals (MDGs). Together with this is the recognition of the role of universities towards the country's development. Adoption and implementation of information literacy programs supported with commensurate investment in the necessary human and other resources vital for effective teaching, learning and research will go a long way in helping Kenyan universities to positively contribute to the country's development as expected of any university all over the world.

Horo (2006) noted that studies by various information professionals in Kenya, there are lots of electronic information resources and services and he feels that despite of the availability of these resources and services they are underutilized due to lack of user skills by staff and library users, these skills can be enhanced during user education program an indication that either the skills are little earned or not well imparted on to the users which the study seek to establish. Hall (2010) also noted that information literacy forms the basis for lifelong learning; it is common to all disciplines, to all learning environments, and to all levels of education. It enables learners to master content and extend their investigations, become more self-directed and assume greater control over their own learning. Despite these heavy investments, it has been observed that instead of accessing a wealth of electronic content through the library web portal, students tend to rely on internet search engines (e.g. Google), and public web portals (e.g., Yahoo) even though scholarly information is not always readily available there noted by Muhinja (2013).

Kavulya (2003) felt that today information services are operating in new environments that impact on the consumers of information. A number of forces of change have been seen to influence the management of information services at present and are likely to be felt even more

in the future. He feels that increasing electronic access through networks has increased hence the need for librarians to have appropriate skills to handle and make available information electronically. And these calls for new leadership skills and competencies so as to ensure that the information needs of the organization or community are met in the new information environment.

1.2 Statement of the Problem

With increase in use of digital resources, academic libraries in Kenya have heavily invested in electronic books, research databases, as well as electronic journals, and made them accessible via their library web portals. Some libraries also undertake information literacy and other usability initiatives to improve their web portals in order to provide users with better and easier access to their electronic collections and services. Kenyatta University offers such information literacy programs during the first week when students register at the university. This is intended to impart information literacy skills to the users so that they can easily locate, retrieve and utilize electronic information resources and sources in the library, yet it is evident from the library surveys on usage of e-resources that there are lots of electronic information resources in libraries which are underutilized. Underutilization results in wastage of resources and brings about the question on the effectiveness of IL programs conducted whenever students are admitted to the university. Hence the needs to examine the effectiveness of the IL program to brig edge the existing study gap.

1.2.1 Purpose of the Study

The study sought to find out the effectiveness of information literacy program conducted by librarians in Kenyatta university post- modern library to postgraduate students to provide some in depth knowledge on the state and usefulness of the IL program in enhancing acquisition of information literacy skills to the policy makers and guide the managers on the most appropriate timing and whether it adds value to the students.

1.2.2 Study Objectives

- i. To establish the content of information literacy program offered to postgraduate students in Kenyatta University.
- ii. To find out post graduate students views about the relevancy and adequacy of the (IL) program.
- iii. To determine the skills acquired by the postgraduate students from the information Literacy training programs.
- iv. To find out postgraduates students views on effectiveness of the program for instance timing, time allocated to the program among others.

1.2.3 Research Questions

- i. What does the Kenyatta university information literacy program cover?
- ii. What are the postgraduate students' views about the relevancy and adequacy of the IL Program?
- iii. What information literacy skills do postgraduate students acquire during the IL training?

- iv. What views do postgraduate students have on effectiveness of the program for instance on timing, and time allocated to the program among others?

1.3 Significance of the Study

- i. The study would provide some in depth knowledge on the state and usefulness of the IL program to postgraduate students in enhancing information literacy skills to the policy makers and guide the managers on the most appropriate timing and whether it adds value the students.
- ii. From the academic perspective, the results of the study would help universities to assess the effectiveness of their information literacy programs on post graduate students and consolidate what is retained, add new aspects that are lacking, and find a new direction where retention lacks.
- iii. The findings would help university librarians in improving the IL program and to realize their roles in teaching information literacy skills. The study also sought to introduce information literacy not as a discipline which is restricted to any one field of study, but as a generic concept that should be taught across all fields and contribute to an empirical basis for developing information literacy curriculum. The study's findings were intended to assist educators, librarians, student advisers and other professionals in their interactions with post graduate students. For educational software developers, the findings would provide an evidence base for learner centered design and online resource improvement, of particular relevance to the post graduate students.

- iv. The results of this study would contribute to the existing knowledge by highlighting the effectiveness' of IL training program to post graduate students from a Kenyan perspective.

1.4 Limitation and Delimitation

The study focused on the information literacy program conducted at Kenyatta University library and the main focus user groups were the postgraduate students.

The study limited itself to the postgraduate students and not to all students because postgraduate student benefit more using e - resources when doing their research.

The study focused on academic information literacy program, rather than the broader areas of information literacy because of the user needs in locating and utilizing electronic information resources when doing their research, therefore other literacy's are not reflected.

1.5 Assumptions of the Study

The researcher made assumptions that:

- i. All the postgraduate students have gone through information literacy program.
- ii. The postgraduate students chosen in the study would report accurately and would give honest views regarding effectiveness of the information literacy training program in Kenyatta University.

1.6 Conceptual and Theoretical Framework

1.6.1 Theoretical Framework

Kuhlthau's theory of Information Search Process (ISP)

The theory of Information Search Process by Kuhlthau (1999) was developed in a series of studies of the experience and behavior of library users involved in extensive research projects, and more recently, people in the work place using information for complex work-related tasks.

It suggests six search stages: initiation, selection, exploration, formulation, collection and presentation. This theory is relevant to this study in two ways:

- i. Information selection, searching and exploration are facilitated by information literacy skills acquired.
- ii. The search process theory will apply to this study in initiation, selection, exploration, formulation, collection and presentation of information. It is applicable in enhancing acquisition of information literacy skills to the postgraduate students through information literacy training programs.

To identify, select, explore, formulate, collect and present information one must have acquired the required information literacy skills earned during IL training program that facilitate access, retrieval and utilization of the e - resources. Therefore Kuhlthau's theory supports this study, for in information search process application of IL skills must be applied.

1.6.2 Conceptual Framework

The Conceptual Framework shows how the dependent variables, independent variables and intervening variables in this study are interrelated. The framework shows the concept content of information literacy program.

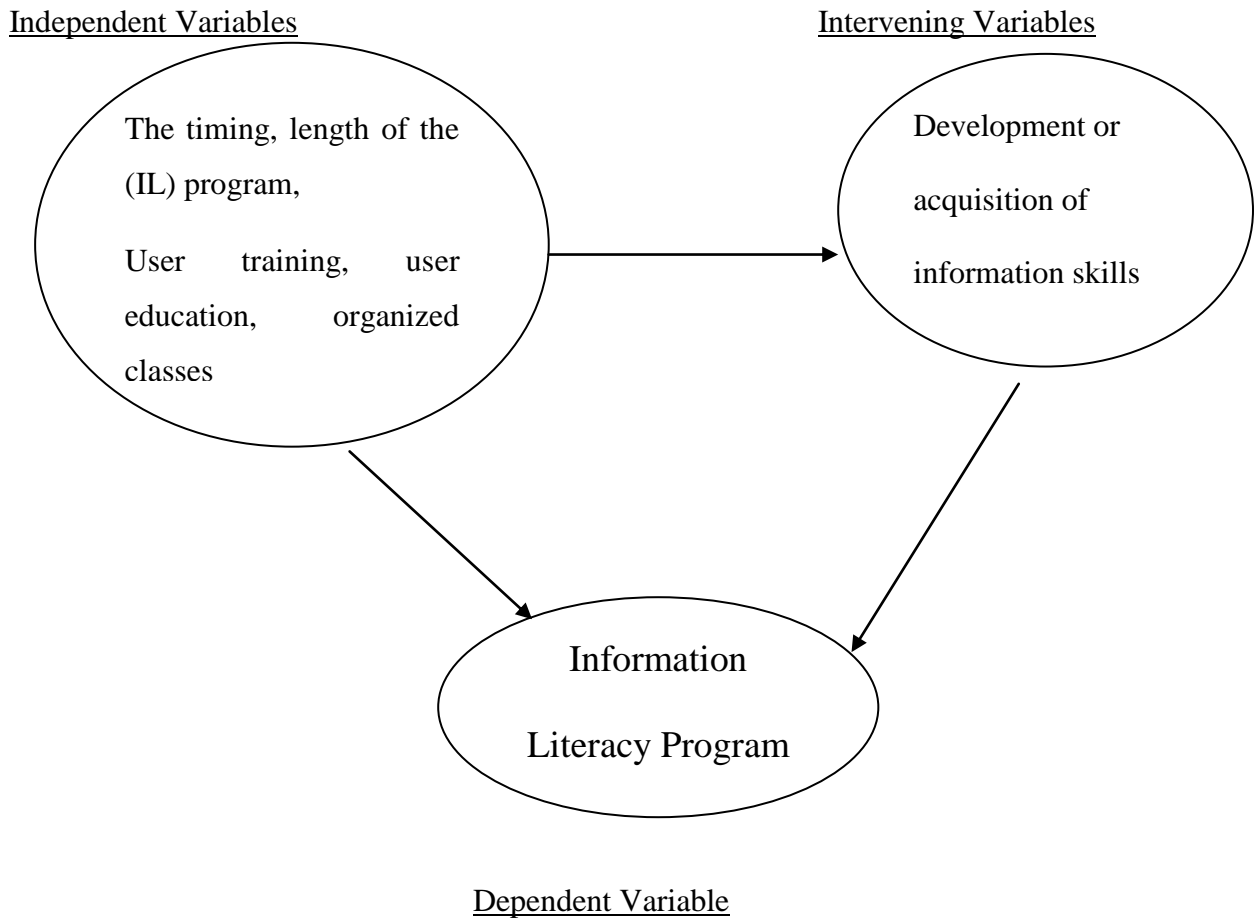


Fig.1.1 Conceptual Framework

Source: Researcher 2015

The figure 1.1 Conceptual framework shows how the variables under the study intervene and relates. The dependent variable the (Information Literacy program) would be guided by the independent variable i.e. the timing of the IL program, the length of the program, user training,

user education, and well organized IL instruction classes and the independent variables would determine the acquisition of information literacy skills as the intervening variables that would enhance utilization of electronic information resources.

1.7 Definition of Operational Terms

This section identifies the specific concepts and terms of the research topic which were used in the research study.

Electronic Information Resource

Any information source that the library provides access to in electronic format

Information

A collection of recorded facts, data or knowledge, and electronic data

Information Literacy

Information Literacy constitutes the abilities to recognize when information is needed and to locate, evaluate, effectively use, and communicate information in its various formats

Information Literacy Program

The training program undertaken by librarians to their users to enhance them acquire information literacy Skills

Literacy

The ability to Read and Write Locate, Access and Utilize Electronic Information Resources

Post graduate

A student who continues to study for an advanced degree after earning a bachelor's degree or other first degree: a Graduate Student

CHAPTER TWO: REVIEW OF RELATED LITERATURE

2.1 Introduction

This chapter reviews literature on IL Program, information literacy programs at the universities, Information literacy among post graduate students, information literacy and infrastructure and strategies for enhancing information literacy.

2.2 Information Literacy

Case (2002) conducted a study and found out that information is “a resource that takes different formats, packaging, transfer media, and various methods of delivery”. And these definitions refer to recorded knowledge or facts in documents which can be accessed, may be presented in a number of formats including printed words and figures, illustrations, photographs, charts, graphs, tables, multimedia, sound records, computer graphics, or animation according to Eisenberg, Lowe and Spitzer (2004), radio, television (TV) broadcasting, cable, CD ROMs, digital, and other forms of recording. In all these definitions the fact of recording or packaging is very important. It makes the information stable and unchanged so that whoever wants to access it any time will find it unaltered. It is different from the oral communication which is abstract and its facts can change from time to time.

According to (IFAP) Report (2005), the ability to find and apply the right information can help tackle some of the world’s most critical issues such as poverty, health, quality education, disaster prevention, governance and environmental care. Right from prehistoric times, when the people who lived then led a life of a hunter and gatherer of wild foodstuff, but relied on information concerning the natural environment. The information used concerned the behavior and seasonal migration of their prey. The people could tell the weather and seasons by observation. As a result

of interacting with the natural environment, and gaining experience, these people accumulated a body of knowledge from which they could observe and explain their observations. They could eat, detect, live and harmonize their lives with their environment but lack of information literacy skill will be a barrier to information access, retrieval and utilization so there is need for information literacy program and also need to seek the usefulness of the program which this study seeks to establish for no research has been done.

According to (IFAP) Report (2005), with the coming of the printing machines in the 15th century, the audio-visual cameras and recorders, and today's modern information and communication technological developments and the recording of information in various media over the years, especially after the world wars, people became aware that information was a crucial resource in the economic, political, social life of nations; and needed building up by developing national and research policies, and protection by copyright laws. Today, prosperity and economic growth have become increasingly dependent on the society's capacity to produce and communicate information and create a knowledge base among its people. That is why the Western world such as USA, Europe, Eastern Asia and South Africa are ahead of the rest of the world due to their production and dependence on information and embracing information literacy programs they apply class instructions programs these study defers from the above study, for the (IL) program in our universities the orientation or user education is practiced and no research has been done on establishing the usefulness of the program, which the study seek to find out.

The question that arises is, how much information do we produce and use in Kenya. Do we have adequate information literacy skills to help us access, retrieve and utilize electronic information resources and information infrastructure for the university graduates in Kenya to access, this therefore creates a gap that needs to be established by this study.

2.2.1 Literacy and Information Literacy in the World

Hornby (1998) noted that literacy is “the ability to read and write” or use language in its written (or recorded) form. The term is widely used to describe the state of being able to read and comprehend information recorded by Bawden (2001) in its varied media. Many advertisements on availability of commodities, jobs or services are made and available online and require literacy skills to access and utilize this information. Literacy today has the idea that people need to interpret what they read and place it in a specific cultural context particularly in economic terms as noted by Angeley and Purdine (2001).

UNESCO (2005) published that literacy is, the ability to identify, understand, interpret, create, communicate and compute, use printed and written materials associated with varying contexts. Information literacy is often seen as an entry level skill for participation in the economy in this era of information age. According to Rhodes island department of human services, (2009) Information literacy has recognized that literacy is a primary tool for anyone in today’s workforce”, Kenya’s literacy rate is 66.8 according to United Nations development program me UNDP Report(2009) and enhancement of information skills is encouraged.

Bawden (2001) states that, a literate person is able to read and understand their local language. This sometimes is not the case in many countries, for example today in Kenya, the teaching of the local language in schools is only getting emphasized in the new primary school syllabus Kenya Primary Schools Teachers’ Guide, volume two (2001) noted. If one was to follow Bawden’s definition, literacy in Kenya may come down to less than or about 30%. It is not surprising to find that even some university post graduate students in Kenya say that they do not know how to read and write in their local languages. It has been reported that even with highly

rated literate societies like Britain; more than 20% of adults are functionally illiterate noted by Bawden (2001).

Literacy includes listening, speaking, reading, writing, numeracy, and critical thinking. It means being able to make effective use of information according to Bawden (2006). This kind of comprehensive literacy, being able to read, write and understand information from various media is the operational definition of literacy for the study. With the ever-changing developments in the ICT, however post graduate students need to update their literacy skill levels in every phase of educational and technological development.

It has been stated that literacy and mastery of writing are basic prerequisites for ensuring that the world is not divided between producers and receivers of information according to Mary Snell-Hornby (2001). There is therefore a need to do further research on writing and publishing in Kenya to check whether there is literacy not only in reading but also in writing.

Information literacy is the ability to know when there is a need for information, to be able to identify, locate, evaluate and effectively use that information for solving issues or problems at hand, Library has long been involved in training their users in library use, its services and sources. Information literacy forms the basis for lifelong learning; it is common to all disciplines, to all learning environments, and to all levels of education. It enables learners to master content and extends their investigations, become more self-directed, and assumes greater control over their own learning noted, Hall (2010).

The study attempts to explain the need for information literacy program based mainly on the belief that information explosion has taken root in the world and we are in the information age era that calls for information literate society to know how to use information as an essential

commodity. The main object of information literacy revolved on the many sources of electronic information sources and services available and not only on the mechanism of using the systems. In addition to teaching how to use these resources, and access information, librarians now must recognize the importance of teaching IL skills to the users, so that they are able to select access, evaluate, and utilize the best information resources for studies. Data Smog is a term coined by David Shenk (2009) that refers to the idea that too much information can create a barrier in our lives. This data Smog is produced by the amount of information and the speed it gets to us from all directions, the need to make fast decisions without having all the information that is available. Information literacy is the solution of data smog; it allows us to cope by giving us the skills to identify when we need information and where to locate and utilize it effectively and therefore enhancing the need to find out whether the information literacy program is useful in enhancing acquisition of IL skills.

The growth in the interdisciplinary subjects is an important factor for the development user instruction. Academic libraries undergo rapid collection growth and acquire new techniques of organization and retrieval. The quantity of material to search because of the diverse discipline requires that effective instructions method be developed. It is not just the quantity of material that makes help essential but also the diversity of the sources, resources and formats as realized by Muhinja (2013).

In the digital age, fencing around library resources is a daunting task. Moreover, the instructional needs of users have changed dramatically as new methods of teaching and learning have emerged. While information sources and methods for accessing information are still a useful component of library instruction, a broader construct of information literacy has emerged as a framework for effective information inquiry. This is going to be an essential skill in new learning

contexts; there are many ways to understand these new dimensions of learning and associated skills. One of these is the need for a conceptual understanding of information and knowledge processes. Another is the need for skills to exploit technology to use information effectively which is facilitated by information literacy program.

According to Johnson (2001) Information literacy is referred to as information skills especially in the United Kingdom. 'The Big Project' led by the Manchester Metropolitan University and the University of Leeds Virkus (2003), found out that in many instances both terms are used to describe what is essentially the same concept, and therefore can be said to be synonymous. Several other terms have been used for information literacy, e.g. info literacy, infomacy, information empowerment, information fluency, information competency, information handling skills and documentary literacy by Brophy (2001), Khan (2008), Virkus (2003). The above studies differ from this study in the sense that no study is done on the IL program which this study seeks to research on.

Tise (2004) states that information literacy belongs to a family of literacy's, and lists fifteen of them the computer literacy, critical literacy, cultural literacy, digital literacy, electronic literacy, hyper literacy, Internet literacy, IT literacy, library literacy, lifelong literacy, media literacy, multimedia literacy, network literacy, skills-based literacy and visual literacy.

According to Bawden (2001) literacy means competency and attempts to relate information literacy to the full context of all the relevant literacy's, he has also observed that internet is a common information and communication tool, information literacy is often understood as a digital literacy. Information literacy involves teaching and giving instructions about the whole range of information sources and formats information according to all Program Report, (2005) and these therefore need for evaluation of the literacy program.

According to Lwehabura (2008) a number of factors hinder effective IL program in Tanzania universities, these factors are inadequate time, lack of clear IL policy hence the teaching of IL program stand-alone course on a voluntary basis and non-involvement of teaching staff. Lwehabura and Stilwell (2008) also realized that, IL instruction is weak in terms of its effectiveness in imparting IL knowledge and skills in Tanzania due to lack of dedicated IL policy guide, lack of awareness among students about the IL instruction session are affected by time constraints because IL is not allocated official time in university academic timetables, attendance by students is voluntary and as a result not all students take advantage of the sessions that are in place, lack of resources such as computers and CD-ROMS to support hands-on-practice and information skills sessions not integrated into the curriculum and these study concurs with the Lwehabura and Stilwell, and therefore the students lacks the IL skills to utilize the electronic information resources.

2.2.2 Information Literacy Programs at the Universities in Kenya

Virkus (2003) noted that information literacy programs in universities and other educational institutions form the background of information literacy among post graduate students. Where there is an effective information literacy program, integrated in the curriculum and involving the collaboration of librarians and faculty, the post graduate students are more likely to be information literate. He felt that information literacy programs in the universities need to be supported by a well-developed information infrastructure in the university library, and communications network. Its enforcement is also enhanced by an assessment policy or information literacy enforcement body in the university, or library and information professionals' body in the country. Information literacy programs in universities are also influenced by

employers' information literacy expectations from the post graduate students, and by information literacy programs in the faculties and the universities libraries according to Al-Enezi (2009).

According to Kavulya (2003) user education and information literacy are different forms of information literacy programmes practiced in Kenyan universities. These include library orientation, library instruction courses, individual instruction or reference service, and use of library manuals and guides. In his research he noted that universities examined library orientation as mandatory and takes place in the first and second weeks when new students report to the university. Library orientation is aimed at making students aware of the available library facilities, information resources and services. It includes activities such as the distribution of informational material that describe the library system and the resources and services, introductory lectures, staff contacted tours and demonstrations on how to find and retrieve information using different tools such as catalogues, and journal indexes. There are four primary research themes that pervade the literature and research in the field of information literacy as noted by Eisenberg and Lowe (2004) the two described the nature and scope of IL, value of IL, effective methods of IL skills instruction and the impact of IL skills instruction. They noted that research on the nature and scope of IL examines the information problem- solving process, the research process, and the specific skills within these processes.

Research on the effect of information skills on performance in both academic and professional situations demonstrates the value of IL skills instruction. Finally they added that impact of information literacy skills instruction focuses on the value of an integrated approach, with these in mind the researcher agree with the two and sought to find out the major areas the IL training program concentrates on to establish why the e- resources are underutilized despite students

going through IL training program. The study concurs with the study by Muhinja (2013) that training user on ICT skills is essential and therefore inevitably necessary for effective use of e-books, certainly end users of electronic resources often need assistance in database content, search protocols and use of computers. There is therefore a necessity for a good training program to enhance students develop information literacy skills. Muhinja research established that users were inadequately skilled for efficient utilization of e- books and there was dire need for information literacy training program to facilitate utilization of e- resources by academic staff and students in universities in Kenya.

2.2.3 Information Literacy among Post Graduate Students

Individuals are faced with diverse, abundant information choices in their studies, in the workplace, and in their lives as noted by Dadzie, (2005). Sheer abundance of information and technology will not in itself create more informed citizens without a complimentary understanding of and capacity to use information effectively. As Mbeki, (1996) pointed out, the ability to use information effectively is now the single most important factor in deciding the competitiveness of countries. The fourth information literacy standard of Council of Australian University Librarians considers, among the aspects of effective use of information, extracting information appropriately, giving bibliographic citations, and understanding fair use of information. There is therefore need to establish the extent to which the universities in Kenya have moved towards achieving these goals and more so to establish the usefulness of the IL program offered to postgraduate students.

As David Shenk (2009) noted information and literacy are terms that make up the concept of information Literacy from both the general and work place context in order to establish the position taken by the study. Various claims about the historical development of information

literacy are given, dating it from the Zurkowski in 1974, other from exponential growth of information and others from the development of computer and other ICT. It is also pointed out that although information literacy emanated from the library profession, it has been embraced by other professions throughout the world, giving the example of the National Forum of information literacy in the USA with over 65 organizations including business, government and education, and is open to any organization recognizing the relevance of information literacy to its work as noted by Eisenberg, Lowe and Spitzer, (2004) therefore much need to be done in identifying the methods that can be applied so that people can acquire information literacy skills through IL training programs and an evaluation of the program. They believe that all students should have the opportunity to master the skill needed to access information in print, non print and electronic sources. And this study concurs with them and therefore the researcher sought to explore the effectiveness of information literacy program in promoting utilization of electronic information resources in Kenyatta university postmodern library.

According to Kavulya (2003) the challenges facing information literacy efforts in Kenya is that information literacy in Kenyan universities libraries is associated with scattered efforts ; as a result majority of students pass through the system without ever mastering the art of retrieval and use .Communication skills (a communication unit) is taught by non-library staff to undergraduate students and only once in their university life, this course is also characterized by large groups hence the use of the lecturer method due lack of personnel. Lastly there is general lack of evaluation of its effectiveness. Therefore Kavulya (2003) study findings place information literacy efforts by Kenyan university libraries far from achieving what is called for in the literature therefore there exists gaps that need to be bridged which this study seeks to establish.

2.2.4 Information Literacy and Infrastructure

According to Virkus, (2003) infrastructure the availability of information resources in all media, print and electronic, with information and communication technology networks which enhance information literacy as noted by Shanhong,(2004) feels that developments in the information infrastructure increases the use of information, hence the rise in information literacy of citizens. David Shenk (2009) noted that the success of the information literacy programs at university and workplaces is backed by the strength of the information infrastructure. The existence of the information infrastructure also depends on the effectiveness of the information literacy programs in both universities and at workplaces. Information infrastructure also influences the information literacy competence of post graduate students and librarians in university libraries, these studies acknowledge the IL program in facilitating IL skills but differ in this study for the fact that this study wish to explore on effectiveness of the IL program offered to the postgraduate students in the universities .

According to Virkus, (2003) study the success of the information literacy program at university and other levels of education is also backed up by the strength of the information infrastructure. The use of the information infrastructure also depends on the effectiveness of the information literacy programs in both universities and at workplaces which the study seeks to establish.

2.2.5 Strategies for Enhancing Information Literacy

A strategy is a plan to achieve a particular purpose according to Mary Snell-Hornby (2001), Strategies for enhancing information literacy among university post graduate students in Kenya shall be drawn during the course of investigating the state of information literacy among university post graduate students at work places, employers information literacy expectations, Information literacy programs at universities and information literacy educators, Faculty Deans

and university librarians, and examining the existing infrastructure; and noting the suggestions from the respondents for information literacy enhancement.

According to Levey (2001) information access isn't necessarily the problem but careful utilization of the information; this is because users do not always understand which information resources are most appropriate for their needs. Users need skills to make comparisons between paper, CD-Rom and electronic resources. Levey (2001) points out that the poor library use background and lack of literacy skills by students have led to underutilization of electronic information resources in the universities and higher institutions.

Agaba (2003) carried out a study on e-resources usage at Makerere University; the results of his study indicated low usage. Electronic information resources have many functions and benefits which can be of immense use to students in schools and particularly more so in research institutions. Once a user is connected to the internet such user can link up with any part of the world for whatever purpose the user has in mind, Osunrinde, Adekiya and Adyemo (2002) felt that there is need to equip end-users with skills such as information literacy skills, information retrieval skills, computer skills among others as a strategy to promote e- resource usage especially among students in academic libraries such as Mbarara University library for effective utilization of e-resources. Ray and Day (1998) carried out a study on students' attitudes towards utilization of electronic resources. Their study revealed that a large number of students leave universities without necessary skills to cope within the information based society.

Electronic information resources offers today's student new opportunities that were not available to previous generations. They also argue that reading an e -journal is not the same as reading a printed issue, many students now acknowledge that electronic documents offer users advanced features and novel forms of functionality beyond those possible in printed form. As

argued by Swain and Panda (2009), the library users' attitude to information is gradually shifting from the printed document to e-resources. Singh (2009) argues that ICTs have brought a tremendous change in nature, boundaries and structure of information. It is generally agreed that many factors do influence attitudes. Okello-Obura (2010) noted that the advantages of electronic resources over printed ones include: speed, ease of use, ability to search multiple files at the same time and ability to access documents from outside the library among others.

Dadzie (2005) asserts that electronic resources are invaluable research tools that complement the printed ones that are based in the traditional library. These advantages include access to information restricted to the user due to geographical location or finances and provision of extensive links to additional resources or related content. However, knowledge of computers and retrieval techniques is needed to search these resources effectively and this has a bearing towards their attitude towards e-resources. Waldman (2003) asserts that students with high self-efficacy regarding computers would be more likely to explore new technologies, software or databases.

According to Tella and Tella (2003) self-efficacy has a significant relationship with academic achievement and in a related study of library instructions and self-efficacy by Ren (2005) also showed a positive correlation between students' self-efficacy and the frequency in the use of library electronic resources. Self-efficacy is a person's judgment about his/her capability to organize and execute a course of action that is required to attain a certain level of performance. Self-efficacy beliefs contribute to motivation by determining the goals that individuals set for themselves, how much effort they expend and how long they persevere in the face of difficulties, and their resilience to failures. Students who have self-confidence believe in their capabilities and skills earned during information literacy training session.

David Streatfield and Sharon Markless felt that at present, aspiring impact evaluators in the higher education arena are hampered by the relatively immature state of information literacy research; there is a pressing need for more rigorous and larger scale research on such themes as:

- enabling independent learning, especially on-line learning (distance learning approaches to information literacy), changes in levels of student competence and confidence in relation to information literacy , the effects of information literacy on attracting and retaining students
- The effects on students and library staff of changes in the curriculum to accommodate information literacy, including assessment strategies and criteria
- Student attitudes to virtual learning environments and information literacy
- The effects of library initiatives in addressing inadvertent plagiarism and the role of assessment strategies in this area
- The comparative efficacy of different levels and types of information literacy intervention to enhance information literacy
- The scope for using social networking on Web 2.0
- The overall value of library-based information literacy work to the academic communities and the consistency of this added value over time.

Therefore the above recommendations points out the need for the research study in addressing the usefulness of the IL program to postgraduate students' in enhancing acquisition of information literacy skills to facilitate utilization of electronic information resources and services.

Wooliscroft (2009) on information literacy teaching, adds that: every contact with a library user should be treated as an educational opportunity and with these in mind the study agree that there

is need to incorporate IL training during the user education program so that the students would acquire some of the IL skills during user education training program.

Ubaga (2014) felt that after IL training program, frequent follow-ups must be done to ensure that they don't forget. He also added that information literacy instruction is important tool that inform academic students about library collections, services and other activities, in order to stimulate them to use the library for supporting and developing their learning and scientific research processes. This would enhance postgraduate students acquire information literacy skills to help them utilize electronic information resources.

2.2.6 Summary and Research Gap

From the above reviewed literature, it is evident that study on Information Literacy Programs at the universities exists, information literacy among post graduate students, information literacy and infrastructure, enhancement of information literacy, utilization and underutilization of e-resources has been done and no study has been done on effectiveness of the information literacy program and therefore there exist a gap that need to be filled so that the postgraduates information literacy program position may be established and gaps identified in the IL program be filled so that the students would acquire information literacy skills to access, retrieve and utilize electronic information resources and sources to enhance their research in the universities and in education in the country.

CHAPTER THREE: RESEARCH DESIGN AND METHODOLOGY

3.1 Introduction

This chapter details the methodology that was employed in the study. Among the areas discussed in the research methodology are the research design, the target population, the sampling procedures to used, the sample size, and methods that were used to collect data, pre-testing the data collection instrument, data collection, data analysis, presentation techniques and the ethical considerations in research.

3.2 Research Design

Descriptive research design was used in the study, since the researcher was interested in fact finding, it was the most appropriate method of describing the variables as it reported situations and conditions as the way things were as noted by Mugenda and Mugenda (2003). And this in turn provided an in- depth understanding of the problem under study.

3.2.1 Variables

The independent and dependent variables

The independent variables used in the study were the timing, length of the program, development of information skills, user training and user education organized classes.

The independent variable was the information literacy program offered to the students.

3.2.2 Location of the Study

The study was conducted at Kenyatta University library in Nairobi County, Kenya; the study mainly focused on postgraduate students, who had undertaken the information literacy program in the library to enhance their IL skills in order to access and utilize e-resources, for research done reflects underutilization of electronic information resources in the library by the postgraduate students.

3.3 Target Population

Population is defined by Mugenda and Mugenda (2003) as a complete set of individuals, cases or objects with some common observable characteristics. A target population is that population to which the researcher wants to generalize the results of the study according to Mugenda and Mugenda, (2003).1260 post graduate students at Kenyatta University formed the study population, from which the sample population of 126 was drawn.

3.4.1 Sampling Techniques

The selection of elements from a population should be in such a way that the descriptions of those elements accurately portray the characteristics of the population from which they are drawn as pointed out by Datallo, (2008).The sample size was selected from the total population of post graduate students registered in the library using random sampling method. This method allows generalizability to a larger population with a margin of error that is statistically determinable and the use of inferential statistics; statistical indices calculated on the sample can be evaluated to determine the degree to which they accurately represent the population parameters according to Mugenda and Mugenda, (2003).

3.4.2 Sample Size

Kerlinger (1986) says that 10% to 30% of the total target population forms a representative sample. According to Kombo and Tromp (2006), 30% or more of the population yields adequate sample when carrying out a descriptive survey. Therefore the 10% sample was deemed sufficient for the research. Thus, the sample size chosen for the study was 10% of 1260 postgraduate students in the library. This gave a sample of 126 respondents, Where 81 were masters' and 45 PhDs students.

3.5. Research Instruments

The Research instruments that were employed in the study were the questionnaires and interview schedules. Questionnaires and interview schedules' were formulated guided by the study objectives and the research questions. Questionnaires were administered by the researcher, the researcher was able to distribute them and collect data within the stipulated period of time, interview schedules questions were formulated as well guided by the study objectives and the research questions helped the researcher to collect data that was not provided for through the questionnaires.

3.6 Pre-testing / Piloting Study

A pilot study was carried out on 10% of the registered postgraduate students in (JKUAT) library; the purpose for the pilot study was to ensure that the data collection instruments' were reliable. The questionnaires were then analyzed to establish the suitability of the questionnaires; this was aimed at establishing whether the questions asked were relevant to the study and whether the answers received were clear. Corrections were made to the questions that where found inappropriate before they were administered to the actual target population of the study.

3.6.1 Validity

In this study, focus was on content validity, to the extent that data collected represented the indicators of content of the concept in question during the pilot study, and when not achieved the researcher considered defining the content of the concept again.

3.6.2 Reliability

Mugenda and Mugenda (1999) define reliability as the measure of the degree to which a research instrument yields consistent results after repeated trial. Thus questionnaires were distributed during piloting, therefore reliability and validity was established during the pilot and pre- testing of the study and when not achieved more and outstanding questionnaires were drafted.

3.7 Data Collection Techniques

Questionnaires were distributed and collected by the research assistant and the researcher, interviews were done by the researcher guided by the interview schedules (sets of questions) see appendix.

3.8 Data Analysis

Data analysis was done using computer – based statistical package for social sciences (SPSS) where qualitative data from the open questions on both the questionnaires and the closed response interview schedule were analyzed qualitatively using themes.

The quantitative data was presented in form of frequency distribution tables, pie charts, percentages, and graphs. The interpreted data was discussed and from them inferences were made and a report was written.

3.9 Logistical and Ethical Considerations

Respondents in the study were protected and their ethical rights considered during the study, information given was treated as confidential; anonymity of the respondents is also an important ethical consideration as it helps maintain privacy and the researcher protected the identity and privacy of the individual by using numbers or pseudo names.

Permission was sought from relevant authorities in the institution, introductory letter from the researcher's university was availed and finally a confidentiality note on the questionnaires was attached and all respondents were informed of the reason for carrying out the study and how the findings of the research would improve or contribute to effective information literacy program in the library.

CHAPTER FOUR: PRESENTATION OF FINDINGS, INTERPRETATION AND DISCUSSION

4.1 Introduction

This chapter gives an analysis and findings of the study whose aim was to establish the effectiveness of information literacy program in promoting utilization of electronic information resources by postgraduate students in Kenyatta University postmodern library. The analysis was guided by the following objectives:

- i. Establishing the content covered by the information literacy program offered to postgraduate students in Kenyatta University.
- ii. Finding out post graduate students views about the relevancy and adequacy of the IL program.
- iii. Determining the skills acquired by the postgraduate students from the information literacy training programs.
- iv. Finding out postgraduates students perceptions on effectiveness of the program for instance timing, time allocated to the program among others.

Masters and PhD students formed the target population for the study, the research adopted descriptive research design, Questionnaires and an interview schedule were used to collect data. Data was analyzed using computer- based statistical package for social sciences (SPSS).The findings were presented using tables, charts, figures and graphs.

4.1.1 Response Rate

The target population was 1260 post graduate students at Kenyatta University; of the 1260 the sample size chosen for the study was 10% based on Kerlinger (1986) that 10% to 30% or more

of the population yields adequate sample when carrying out a descriptive survey and therefore 126 respondents were used for the study, 81 masters and 45 PhDs students. 126 questionnaires were distributed and out of the 126 questionnaires distributed 88 were returned fully filled up and were used for the study giving a response rate of 70%. 63 students were interviewed and information collected incorporated together with data collected from the questionnaires, data was coded, analysed, presented and discussed. This was considered adequate based on Mugenda and Mugenda (2008) who observed that a 50% percent response rate is adequate, 60% percent good and above, while 70% percent rated very well therefore this was considered a good representation of the population.

4.2 General and Demographic Information

This section detailed the response rate as well as the demographic information of the respondents. Information on education level of the respondents was indicated. This was considered important because the researcher wanted to establish the number of postgraduate students who had undertaken information literacy training program. This was necessary as it would help the researcher to determine the respondents' knowledge with regard to utilization of electronic information resources based on their level of academic qualifications.

4.2.1 Demographic Information

The researcher found it important to find out the education level of the respondents. The respondents were asked to indicate their education level, this was considered important because the researcher was interested with Postgraduate students who are the beneficially users' of electronic information resources as they would undertake their research by dissertations; and therefore would be expected to utilize information literacy skills in accessing and utilizing electronic information resources. The results were summarized in Figure 4.1

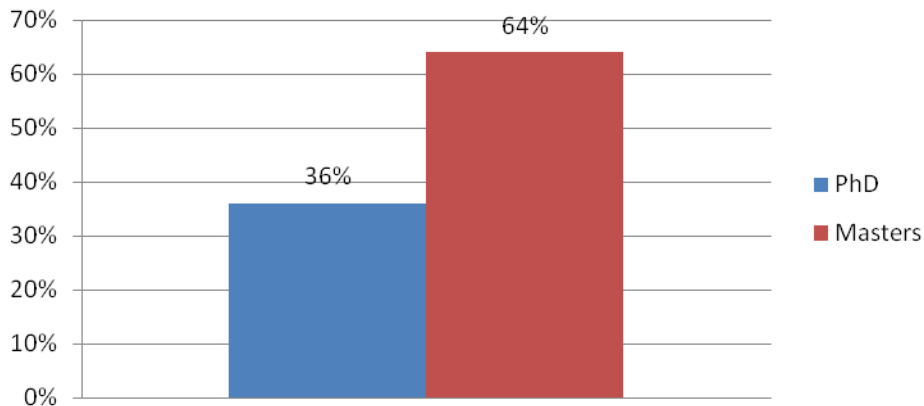


Figure 4.1 Postgraduate Level of Respondents

The findings in Figure 4.1 indicate that the respondents were of different levels, where nearly two third of the population (64%) were masters’ students, and over a quarter were PhD students (36%). The study finding therefore shows that majority of the respondents were master’s students. Since all the respondents were postgraduates the assumption was that they have gone through the IL training program, this would benefit the researcher to establish why the electronic information resources were underutilized and whether the students had acquired information literacy skills. Their responses would help establish whether the training was effective or not and come up with a conclusion.

Eisenberg, Lowe and Spitzer (2004) believe that all students should have the opportunity to master the skill needed to access information in print, non print and electronic sources. And based on their statement the researcher sought to explore the effectiveness of information literacy program in promoting utilization of electronic information resources in Kenyatta university post-modern library.

4.3 Areas Emphasized by IL Training Program

The study sought to establish the areas that the IL training program concentrated on. These would guide the researcher in identifying the content of the IL training program to establish the IL skills the students would have acquired to help them utilize electronic information resources. The purpose of this question was to establish whether the IL program was comprehensive and if it addressed key issues. It was meant to establish the specific skills the students had acquired which would enhance them utilize electronic information resources and the findings are presented in Figure 4.2

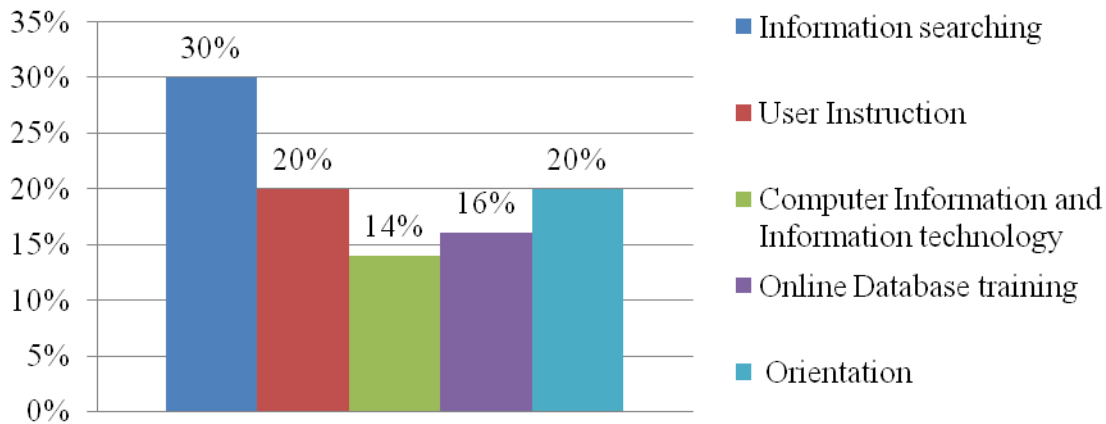


Figure 4.2 Areas Emphasized by IL Training Program

The findings in Figure 4.2 point out to the fact that most of the respondents (70%) had not received information searching skills for only a small population of (30%) had gone through the training and majority of (70%) had not been trained. Similarly, less than a quarter of the respondents had received user instruction and orientation represented by (20%) for each while, a small percentage of the respondents (16%) had been trained on computer and information

technology. It is also seen that only a small percentage of the respondents (14%) had undertaken training in online databases. From the above findings it is clear that majority of the students had not earned information searching skills, meaning that they would experience problems in retrieving and utilizing electronic information resources also less than a quarter had received user instruction and orientation therefore majority of the students had not been trained hence they could not identify, locate and access e-resources, the study also noted that majority of the student had not received any training on computer and information technology and on online databases, therefore they would not utilize e-resources and these led to underutilization of the electronic information resources.

There are four primary research themes that pervade the literature and research in the field of information literacy as noted by Eisenberg and Lowe (2004) the two described the nature and scope of IL, value of IL, effective methods of IL skills instruction and the impact of IL skills instruction. They noted that research on the nature and scope of IL examines the information problem-solving process, the research process, and the specific skills within these processes. Research on the effect of information skills on performance in both academic and professional situations demonstrates the value of IL skills instruction. Finally they added that impact of information literacy skills instruction focuses on the value of an integrated approach, with these in mind the researcher agree with the two and sought to find out the major areas the IL training program concentrates on to establish why the e-resources are underutilized despite students going through IL training program.

The researcher agrees with Eisenberg, Lowe and Spitzer (2004) that embracing information literacy is more than a responsibility of library, it is an institutional concern. The faculty should play a vital role in defining the content and place of information literacy within the curriculum; it

cannot avoid this issue if students are to be prepared effectively for the future. Any IL training program is designed to offer appropriate information skills needed by graduate users and these were not met by the library IL training program provided as can be seen from the responses in Figure 4.2 above.

Therefore the IL training program should have concentrated more on training user instructions, orientation, computer literacy information searching, and online databases as majority of the respondents indicated they needed more training in various areas.

The findings in figure 4.2 pointed out that majority of the respondents had not received information searching skills represented by (30%), while less than a quarter of the respondents had received user instruction and orientation represented by both (20%), a small percentage of the respondents (16%) had been trained on computer and information technology and also a small percentage of the respondents (14%) had gone through training on online databases. The study findings concur with (Eisenberg, Lowe and Spitzer, 2004) who established that embracing information literacy is more than a responsibility of library, it is an institutional concern. Therefore the researcher also agrees with them that the faculty should play a vital role in defining the content and place of information literacy within the curriculum; it cannot avoid this issue if students are to be prepared effectively for the future. Every IL training program should determine the appropriate information skills needed for graduates that were not met by the library IL training program. Therefore the IL program should emphasize and offer more training on user instructions, orientation, computer information literacy, and online databases for majority of the respondents felt they needed more training as reflected by the figure above.

4.3.1 User Education

The study aimed at finding out whether IL was offered to the students as part of user education; this was done in order to help establish the content covered in IL training program. Therefore user education should be considered as an education opportunity where users can learn IL skills, the study sought to find out the skills the students had acquired from user education program, that would enhance them earn IL skills to enable them access and utilize e- information resources. The Respondents were asked to indicate if they had gone through user education as reflected in Figure 4.3

Those who have undergone the User Education Training

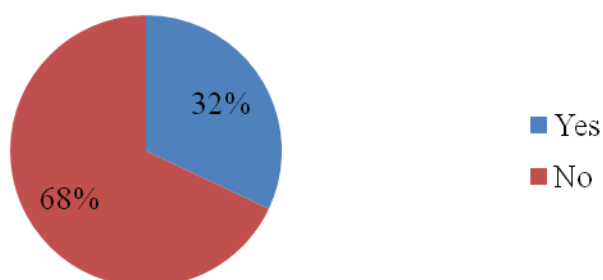


Figure 4.3 User Education

Figure 4.3 shows that majority of the respondents had not gone through user education training, as clearly indicated by (68%) and less than half (32%) of the respondents admitted that they had gone through user education training program and were introduced to the library organization, library collection; existence of the OPAC and how to retrieve library information materials, the findings indicates that user education was not effective as majority of the students needed to be taken through as noted above. The study agree with Wooliscroft (2009) that every contact with a

library user should be treated as an educational opportunity and with these in mind the study agree that there is need to incorporate IL training during the user education program so that the students would acquire some of the IL skills during user education training program.

The study also agrees with Khayesi (2005) that lack of information searching skills was the second major inhibitor to library use. Searching skills could be imparted through the teaching of user education. It is in the light of this that graduate students in Ibadan University in a research done by Aguolu (1977) realized that several students, after one year of graduate studies, were still unfamiliar with the use of abstracts and indexes, some graduate students felt that the library should organize special seminars designed to familiarize especially research students with major tools of literature search.

In the Kenyan scene, Khayesi (2005) found that postgraduate students had problems locating information sources. She therefore suggested that postgraduate students need user education to make them better users of information resources available on and off Kenyatta University library.

As can be seen, Khayesi's recommendation of user education is necessary for the exploitation of university library resources and services, she noted that Kenyatta University library started offering user education in 1976, And although this service was offered at different levels of academic programmes in the institution, reports indicate that the service is given to undergraduates during the orientation programme that lasts one week and as a unit in Communication Skills, However, she noted that user education being given to undergraduates during orientation week cannot really serve a useful purpose for the time is too short and the students are oriented in very large groups of about 40 students making teaching/ learning process almost impossible. Secondly, a freshman cannot learn enough in such a short time to help him

use the library effectively since this could be his first encounter with a library. These therefore could be the reason as to why e- resources were underutilized as the students had not learnt any skills on information searching even at undergraduate level, Therefore these would guide the research to determine the content of the program offered, and establish the component of the orientation program so that the research can identify areas that can be improved on to enhance the students acquire information searching skills to facilitate them utilize electronic resources.

According to Wooliscroft (2009) library's philosophy on information literacy teaching, includes the following principle: that every contact with a Library user should be treated as an educational opportunity, user education program would have been used as an education opportunity where students would have earned some IL skills for them to access and utilize e- resources hence the study establishes that user education was not effectively offered.

4.3.2 Students Views on the Quality of User Education

The study sought to find out the views of the respondents on relevancy and adequacy of the program, these would help establish whether the respondents benefited by going through the program. Therefore these would help the research to determine the content of the program offered, and establish the component of the orientation program so that the research can identify the major areas that can be improved on .The respondents were asked to give their views towards user education program as indicated in Figure 4.4.

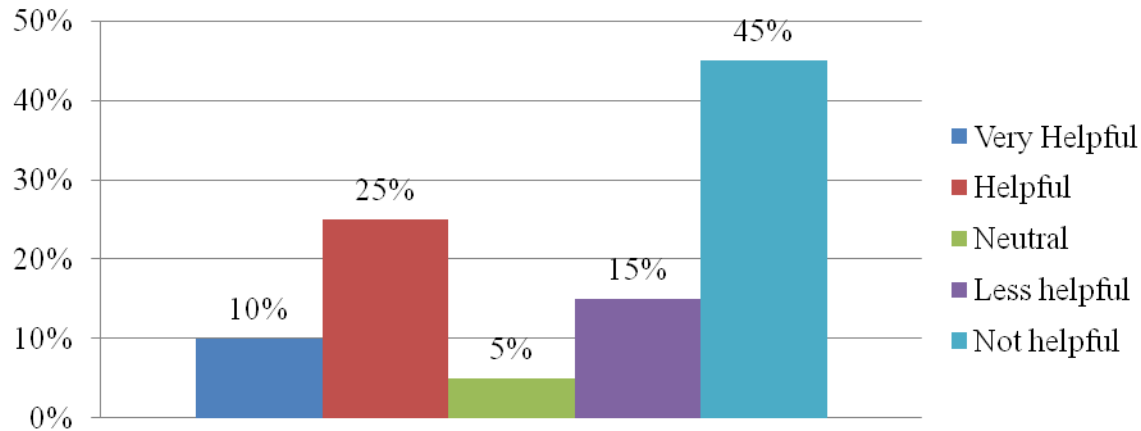


Figure 4.4 Students Views on the Quality of User Education

Figure 4.4 shows that majority (65%) of the population views towards relevancy and adequacy of the program felt that the quality of user education given to them was not helpful, while a small proportion of (35%) indicated that it was helpful, the average of the participants who felt that the program relevance and adequacy of user education program was over half (60%) of the population meaning that the user education was not beneficial to the student, some of the issues raised were short time provided for training, overcrowded classes, frequency of teaching was just once during orientation and lack of enough exposure. The study noted that there is need for staff to incorporate information literacy classes to user education, to enhance students to acquire IL skills. Dennis (2004) identified inadequate number of qualified staff to instruct students during orientation, and inadequate time allocated to the programme as some of the challenges facing the programme. The study concurs with him for majority of the respondents felt the program was inadequate and hence they were not able to acquire information literacy skills that would help them utilize electronic information resources.

The study findings that user education during orientation was inadequate concurs with the findings by Khayesi (2005) who established that user education being given to undergraduates

during orientation week" cannot really serve a useful purpose for the time is too short and the students are oriented in very large groups of about 40 students making teaching/ learning process almost impossible. Secondly, a freshman cannot learn enough in such a short time to help him use the library effectively since this could be his first encounter with a library.

4.4 Adequacy of IL Training Program on the Use of Electronic Information Resources

The study sought to find out how the students rated the adequacy of IL training program on the use of electronic information resources. These would establish whether the respondents benefited by going through the program. These would help measure the effectiveness of the IL training program. Therefore the respondents were asked to give their views towards the IL training program offered by the library staff on use of electronic information resources. As indicated in Figure 4.5

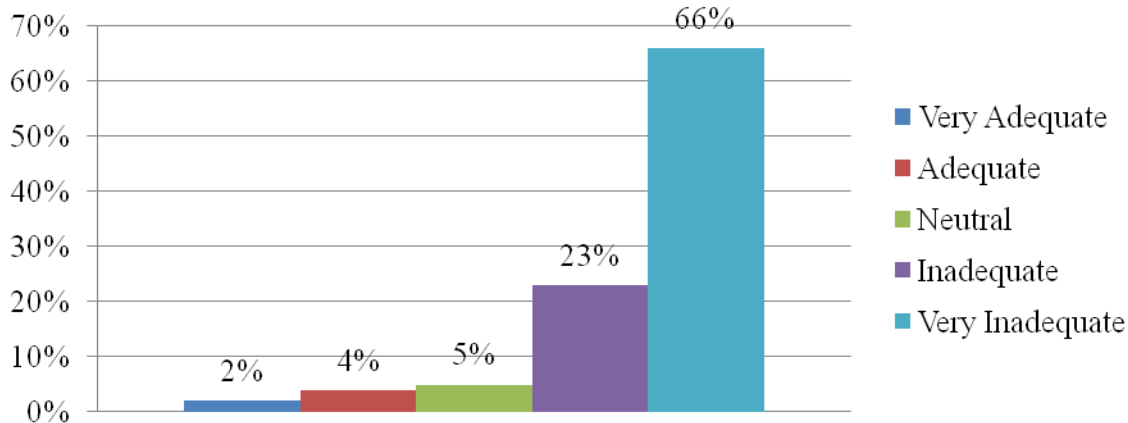


Figure 4.5 Adequacy of IL training Program on the Use of Electronic Information Resources

Figure 4.5 shows that majority of the respondents (66%) indicated that the training offered by library staff on the use of electronic information resources was very inadequate, while less than a quarter (23%) of the respondents felt that it was inadequate while a small population of (9%)

felt that it was adequate. Therefore the study guided by the majority of the respondents (89%) who felt that the program was inadequate concludes that the training offered by the library staff on the use of electronic information resources was inadequate and not effective and therefore the students were not able to acquire the required information literacy skills to help them utilize the electronic information resources.

Lwehabura (2008) identified a number of factors hindering the IL delivery in Tanzania universities, lack of clear IL policy, inadequate time, the teaching of IL as a stand-alone course on a voluntary basis and non-involvement of teaching staff. Similarly, Lwehabura and Stilwell (2008) pointed out that, to a large extent, IL instruction is weak in terms of its effectiveness in imparting IL knowledge and skills in Tanzania because there is no dedicated IL policy to guide IL practice, lack of awareness among students about the IL instruction session ,instruction sessions are affected by time constraints because IL is not allocated official time in university academic timetables, attendance by students is voluntary and as a result not all students take advantage of the sessions that are in place, lack of resources such as computers and CD-ROMs to support hands-on-practice and information skills sessions not integrated into the curriculum and these study concurs with the Lwehabura and Stilwell, and therefore the students lacks the IL skills to utilize the electronic information resources.

Kavulya (2003) also observed that there is failure on the part of librarians to push IL to the fore as a function of the university library. Somi and De Jager (2005) in their study revealed that while there is some evidence that the University of Fort Hare Library in Ghana is engaging in information literacy activities, students still have difficulty in finding, critically evaluating and using information and these then support the study to determine the effectiveness of the IL

training program in promoting utilization of electronic information resources by postgraduate students

4.4.1 Whether IL Training Program Adds Value

The study sought to establish whether the program was relevant or adequate, this was done by asking the respondents to indicate if the program added value by indicating yes or no, this would be important to know because if majority of the respondents had benefited from the program then, majority of the students would have acquired the information literacy skills required in order to utilize electronic information resources. IL training program to individual students enhances acquisition of information literacy skills so that one can easily locate access, utilize, evaluate and disseminate information. The respondents were therefore asked to indicated whether the IL training program added value to them as reflected in Figure 4.6

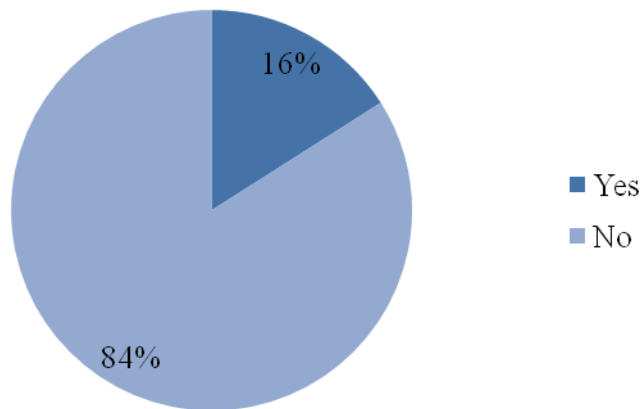


Figure 4.6 Whether IL Training Program Adds Value

Figure 4.6 shows that majority of the respondents did not benefit from the IL training program. The average of the affirmative responses on value addition of IL program was over three quarters (84%) of the population meaning that the program did not add any value to them, it can be

inferred that majority of the students did not acquire IL skills that would have facilitated them to utilize electronic information resources, while less than a quarter of the population represented by (16%) said it added some value to them, these respondents perhaps were the students that benefited from the computer training and through the orientation as noted earlier. The findings of the study concurs with Kavulya (2003) who established that the challenges facing information literacy efforts in Kenya is that information literacy in Kenyan universities libraries is associated with scattered efforts, as a result majority of students pass through the system without ever mastering the art of retrieval and use of information as indicated by the findings. Therefore the study conclude that the IL training program did not benefit the students an indication that they did not learn IL skills to prove that the program was not effective and there is need to have it improved in order promote utilization of electronic information resources. These would help the students acquire IL skills that would add value to them when searching for information for their research study.

4.4.2 Computer Training on Information Searching

The study sought to find out the skills the students had acquired from the program in order to measure the effectiveness of the program and to establish if they had acquired computer literacy skills. Therefore the respondents were asked to indicate if they had gone through the computer training on information searching this is illustrated in Figure 4.7

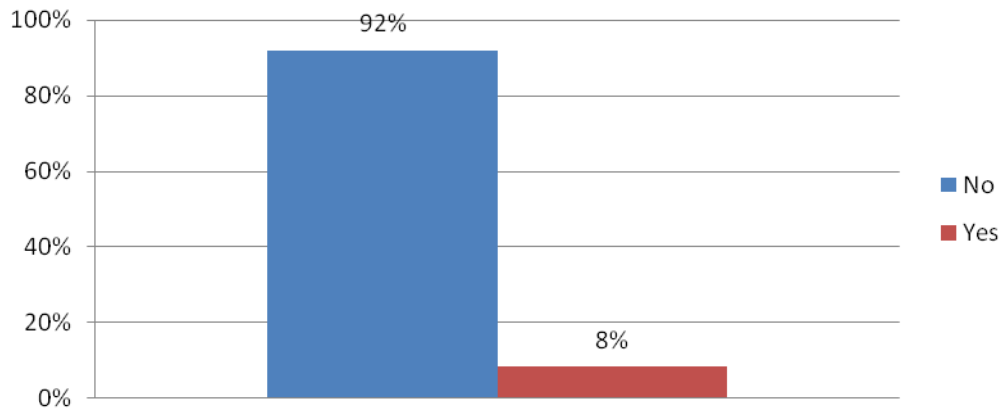


Figure 4.7 Computer Training on Information Searching

Figure 4.7 shows that more than three quarters of the respondents (92%) had not gone through computer training on information searching. While a small number of respondents (8%) indicated that they had gone through computer training on information searching but were information illiterate. Eisenberg, Lowe and Spitzer (2004) noted that computer is a tool that facilitates and extends our abilities to learn and process information. For example, students can use e-mail to contact their classmates or their teacher to clarify an assignment, or they can use presentation software to present information to the class. As such, computer literacy is seen as an integral part of education and not as a separate entity, this study agree with these authors because for students to utilize electronic information resources they must know how to use a computer, understand how to log in to access databases, apply web site addresses just to mention a few. According to presidential committee on information literacy, information literate people are those who have learned how to learn, they know how to learn because they know how knowledge is organized, how to find information and how to use information in such a way that others can learn from them. They are people prepared for lifelong learning, because they can always find the information needed for any task or decision at hand. Therefore the study found

out that the students needed to have more computer training on information searching with reference to electronic resources and the study hence realizes that the IL training program was not effective in enhancing acquisition of computer literacy skills to the students therefore the students needs more training on computer literacy skills to help them utilize electronic information resources in the library.

4.4.3 Skills Earned Through IL Training Programme

The study sought to establish the different types of skills that the students were able to acquire or did not acquire during the IL training program. This was done in order to find out why the students could not utilize the electronic information resources in the library. The study therefore aimed at determining the skills acquired from the IL training program and the skills they needed most in order to utilize e-resources. The respondents were therefore asked to highlight the skills they earned and not earned through the IL Training Program and the findings were summarized in Figure 4.8

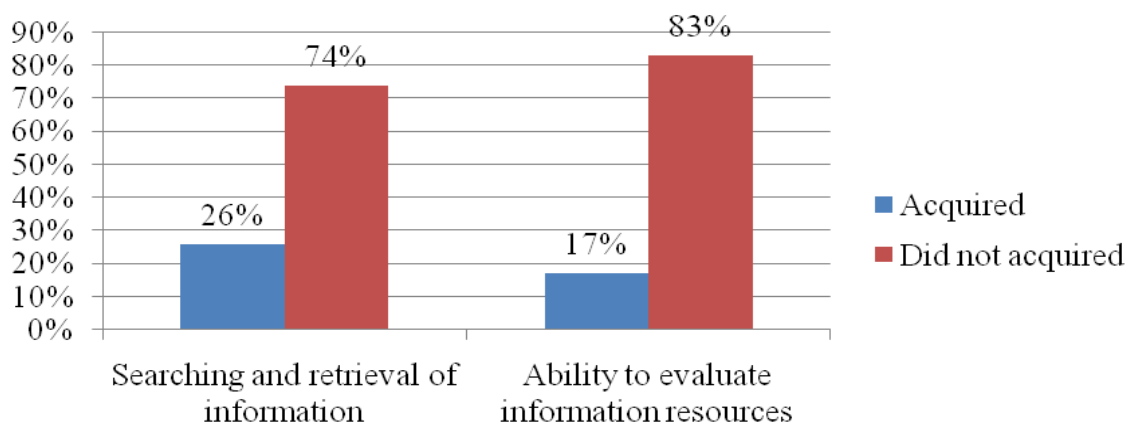


Figure 4.8 Skills Acquired by Going through IL Training Program

Figure 4.8 Show that almost three quarters of the participants represented by (74%) indicated that they had not acquired the skills on searching and retrieval of information while less than a quarter represented by 26% had acquired the skills on searching and retrieval of information.

Majority of the respondents of (83%) also indicated that they had not acquired the skills on how to evaluate information resources while a small proportion of (17%) of the respondents had acquired the skills on how to evaluate information resources. Therefore majority of the students were not able acquire information searching and retrieval skills, as well as skills to evaluate information resources. The study established that students have inadequate information literacy skills in using various materials in the library, hence this study concurs with Muhinja (2013) that training user on ICT skills is essential and therefore inevitably necessary for effective use of electronic books, certainly end users of electronic resources often need assistance in database content, search protocols and use of computers. There is therefore a necessity for a good training program to enhance students develop information literacy skills. Muhinja research established that users were inadequately skilled for efficient utilization of e- books and there was dire need for information literacy training program to facilitate utilization of e- resources and sources by academic staff and students in universities in Kenya.

The study findings were also in-line with National Forum on Information Literacy (2015) which noted that information literacy is a learner centric instructional template that, if applied strategically, can foster the development of independent, self-sufficient learners. In fact, information literacy skills instruction cuts across all disciplines, information literacy practice is not educator dependent. Parents and families members can apply this skill set in supporting student learning at school, at home, and in the workplace. Every learner should know how to demonstrate and utilize baseline information literacy skills. Having the abilities to define tasks

and information needs as well as access and ethically manage a variety of information resources within a digital universe is key to producing the independent, lifelong learners in the 21st century. College and career readiness success is built on a platform of information literacy and digital literacy preparation. Without its specific inclusion in future educational and workforce development reform policies, our pathway to an effective economic and social recovery remains dim. According Eisenberg, Lowe and Spitzer (2004) to be information literate one requires a new set of skills. These include how to locate and use information needed for problem- solving and decision- making effectively and efficiently. From the above findings, it can be inferred that students in Kenyatta university post-modern library did not earn any skills in searching and retrieval of information as well as the skills to evaluate information sources, and therefore they could not locate, access, evaluate and utilize the electronic information resources.

Therefore the students were not able acquire information searching and retrieval skills, as well as skills to evaluate information sources and therefore they could not utilize e- resources an indication that IL training program was not effective in enhancing the students to acquire IL skills and therefore this lead to underutilization of e-resources.

4.4.4 Application of the Knowledge Acquired from the IL Program in Searching for E-Information Resources

The study aimed at finding out whether the students would apply the knowledge they had acquired from the training program in accessing and utilizing electronic information resources. Therefore respondents were asked to indicate if they would apply the knowledge they had acquired from the IL program in searching for electronic information resources as reflected by Figure 4.9

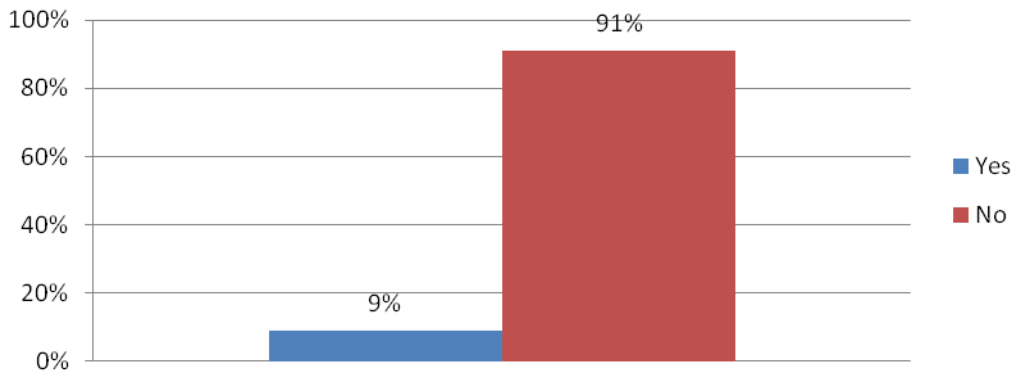


Figure 4.9 Application of the Knowledge Acquired from the IL Program in Searching for E- Information Resources

Figure 4.9 shows that more than three quarters of the respondents (91%) indicate that they could not apply the knowledge they had acquired from the training in searching for e- resources this was an indication that the training program had not earned them enough knowledge or skills to apply in searching for e- information resources, while less than a quarter represented by (9%) could apply the knowledge earned, from these findings the study realizes that the IL training program benefited only a few students to acquire the skill required to enhance them utilize e- information resources, therefore majority of the students need to be taken through the program again to equip them with appropriate skills to enable them master the skills. The study established that the majority of the respondents were ill-equipped, the findings concurs with Adekoya, A. A.; Quaye, Ago K.M. and Eyob, E. (2002) who found that there is need to equip end-users with skills such as information literacy skills, information retrieval skills, computer skills among others as a strategy to promote e- resource usage especially among students in Academic libraries in Universities for effective utilization of e-resources and sources.

The study findings concurs with Eisenberg, Lowe and Spitzer (2004) who argued that information literacy skills are lifelong learning skills which require a student to apply frequently

for mastery of the skills at higher level thinking. Information literacy skills are not to be taught in isolation but rather continuously integrated throughout the curriculum and are mostly meaningful when taught within an inter-disciplinary unit or within a unit addressing an authentic, real- life need or problem. Therefore study concludes that the IL training program was not effective and therefore the reason why electronic information resources were underutilized.

4.4.5 Was IL Training Program New To the Students

The study sought to establish if the students had gone through the IL training program before joining the university so that the study could establish or determine the skills recently earned by the students in IL training. The respondents were asked to indicate whether IL training program was new to them or it was their first time to undertake the IL training program, they were to indicate yes or no as reflected in Figure 4.10

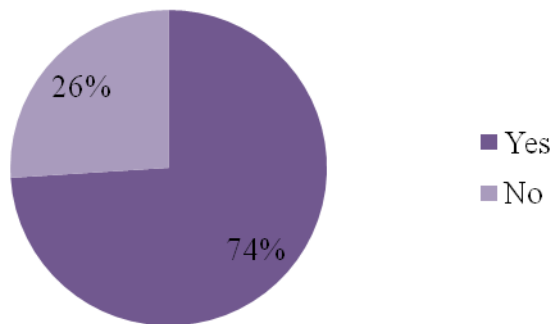


Figure 4.10 Was IL Training Program New to the Students

Figure 4.10 shows that three quarters (74%) of respondents were going through the IL training for the first time and a quarter of the respondents represented by (26%) had been trained earlier, these therefore confirms that the program is very important for majority of the students had never been trained as they confirmed it was their first time to undertake such training and therefore the training should be offered to the students when they register for their post graduate studies, hence

the program should be effective and efficient to enhance students to acquire IL skills required to enable them utilize e-information resource to help them administer their research.

4.4.6 Follow-up Efforts to Improve IL Skills

The study aimed at finding out whether librarians had made up follow-up efforts in improving the IL skills of the students in the course of their studies. This was considered important because it would help the study in determining whether the students had earned more IL skills after the IL program training. With this assumption the respondents were asked if librarians had made any follow-up efforts to improve their IL skills as indicated by Figure 4.11

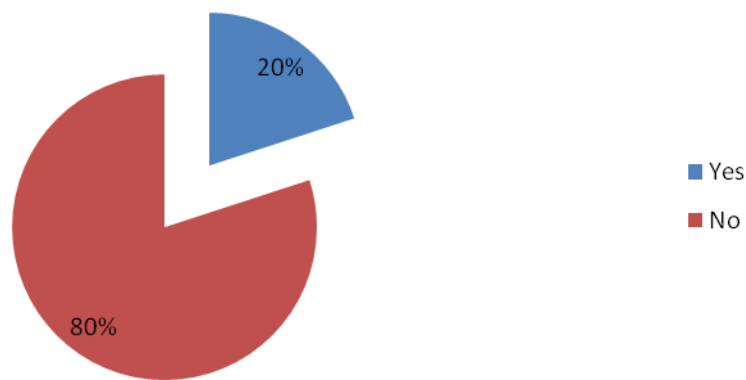


Figure 4.10 Follow-up Efforts to Improve IL Skills

Figure 4.11 shows that the library staff has not made any follow-up efforts to improve respondent's skills; this is indicated by the majority of the respondents at (80%).while less than a quarter of the population (20%) indicated that library staff had made follow-up efforts to improve their IL skills. The study establishes that after the IL program inadequate follow-up efforts were made to improve the students IL skills. With such inadequate follow-up, the students were not likely to improve their information literacy skills hence low underutilization of the e-resources. Ubaga (2014) stated that after students are trained on IL skills, frequent follow-ups

must be done to ensure that they don't forget. The researcher also added that information literacy instruction is an important tool that informs academic students about library collections, services and other activities, in order to stimulate them to use the library for supporting and developing their learning and scientific research processes. Lack of follow-up is one of the reasons as to why electronic information resources were underutilized in reference to effectiveness of the IL program offered by the library.

Earlier in the literature review, Erich and Popescu (2009) noted that the context of the new information and communication technological developments, educational reforms must establish the universities to integrate information and technological skills instruction into the curriculum to ensure that students are able to master the skills of information access to foster utilization. Therefore information literacy becomes a necessary requirement for academic students in the present information era and academic libraries are able to cultivate students in this area. In this context librarians must be part of the process to inform and empower learning with technology that enables users to access information in its many forms and formats – real and virtual – and use it responsibly.

They noted that changes affect not only library services but also the way how user's access information and the type of skills needed to do it effectively and efficiently. As the availability of online databases grew and users need special training, librarians become even more concerned about teaching students in using libraries and information. In this context many faculties also needed help and guidance in using electronic information formats but often don't admit it. Librarians have become increasingly more concerned about the need for people to gain information skills so that they can be successful in the information society. A report of the American Library Association provides an excellent rationale for academic librarians to integrate

information literacy programs into the curriculum. Without follow-up on IL training the students cannot acquire the IL skills required in order to utilize e-resources subscribed by the library and therefore the IL program cannot be considered effective in enhancing students to acquire the relevant IL skills.

4.5. Time and Timing of the IL Program

The study aimed at finding out the students' views on effectiveness of the program for instance timing, time allocated to the program among others. The study sought to explore the last objective on students' views on Time and Timing of the IL Program among others. This would guide the research in establishing whether time allocated for the program was adequate or not adequate, so that the study would identify the reason why students could not utilize electronic information resources even after going through the IL program, the study was to find out whether time allocated for the program was adequate or inadequate for students to acquire IL skills. The respondents were asked to give their views towards the time and timing of the program among others as indicated in Table 4.1

Table 4.1 Time and Timing of the IL Program

The rating scale for responses, means less than 1.5 implied that respondents strongly disagreed, Means greater than 1.5 and less than 2.5 implied that the respondents disagreed; Means greater than 2.5 and less than 3.5 implied that the respondents were neutral with the statements. Means greater than 3.5 and less than 4.5 implied that the respondents agreed with the statements while means greater than 4.5 implied that the respondents strongly agreed with the statements.

Table 4.1 Time and Timing of the IL Program

Aspects of IL program	Strongly Agree	Agree	Neutral	Disagree	Strongly Disagree	Mean
Program should be offered to students after registration not during registration	52%	48%	0%	0%	0%	4.531
The IL Program training require more Time	52%	38%	2%	8%	0%	4.241
The number of student is too big for induction during Orientation	23%	50%	3%	24%	0%	3.912
Many other activities in the library require time hence leaving no time for IL Program	54%	36%	0%	20%	0%	4.023
The Orientation schedule is overloaded to allow time for IL Program	50%	30%	3%	17%	0%	3.816
Time allocated for E-Resource Training is enough	10%	30%	6%	8%	47%	1.283
Time allocated for Orientation schedule for IL Program is enough	0%	32%	0%	50%	18%	1.815
Time allocated for IL Program training is adequate	0%	25%	0%	58%	17%	2.152

Table 4.1 shows that half of the population indicated by (52%) and (48%) respondents strongly agreed and agreed (mean 4.531), the program should be offered to students after registration not during registration; also half of the respondents (52%) and (40%) of the respondents also strongly agreed and agreed (mean 4.241), that the IL program training require more time; it is

also clear that half of the population indicated by (53%) agreed and (23%) strongly agreed (mean 3.912), that the number of the student is too big for induction during orientation.

Half of the population indicated by (54%) and more than a quarter of (36%) respondents strongly agreed and agreed (mean 4.023) that many other activities in the library require time hence leaving no time for IL program; While also half of the respondents (53%) of the respondents strongly agreed while 30% agreed (mean 3.816), that the orientation schedule is overloaded to allow time for IL program and therefore recommends IL training to be effected at a later date not when students are registering.

Almost half of the respondents (50%) disagreed while (32%) agreed (mean 1.283) that time allocated for e-resource training is enough, therefore the study concludes that the training time allocated for e-resources is not enough and more time be added in order to cover more on electronic information resources and sources.

Half of the respondents (50%) of the respondents disagreed while less than half (32%) agreed (mean 1.815), that time allocated for orientation schedule for IL program is enough and therefore study concludes that time allocated for orientation is not at all enough and more time should be added so that the students can earn some knowledge.

More than half of the respondents (58%) disagree while a quarter (25%) agreed (mean 2.152), that time allocated for IL program training is adequate. Therefore the study concludes that the IL training program should be allocated more time. Half of the respondents (50%) disagreed that time allocated for orientation schedule for IL program is enough and less than half (32%) agreed, therefore the study indicate that time allocated for orientation is not at all enough the study concurs with Khayesi (2005) that user education given to students during orientation week

cannot really serve a useful purpose for the time is too short and the students are oriented in very large groups of about 40 students making teaching / learning process almost impossible so the students are not able to acquire skills that can enhance them utilize electronic information resources therefore the research realizes the need for effective program that will facilitate the students to earn IL skills to enhance them utilize e- resources. More than half of the respondents (58%) disagree that time allocated for IL program training is adequate and a quarter (25%) agreed that time allocated to IL program is adequate. Majority of the respondents indicated that the time allocated for the program is not enough and therefore the program is not effectiveness and more time is needed so that the students can learn more and this study concurs with Lwehabura and Stilwell (2008) that instruction sessions are affected by time constraints because IL program is not allocated official time in university academic timetables, while attendance by students is voluntary and as a result not all students take advantage of the sessions that are in place and so the students do not learn the required IL skills to help them utilize e-resources.

Therefore the program should be offered to students after registration not during registration, the IL program training require more time, that the number of student is too big for induction during orientation, many other activities in the library affect time for IL program, the orientation schedule is overloaded to allow time for IL program, time allocated for e-resource training is not enough, time allocated for orientation schedule for IL program is not enough, and time allocated for IL Program training is not adequate.

4.5.1 Number of Times the IL Training was done

The study aimed at finding out the number of times the IL training was offered to the students, this would help determine whether the students were offered information literacy classes during their course of their studies these was to help establish the reason why they could not utilize the

electronic information resources. The respondents were asked to indicate the number of times the IL training was done as indicated by Figure 4.12

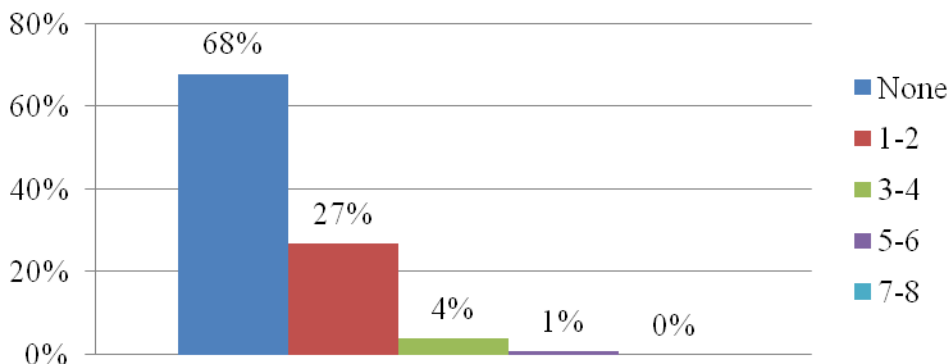


Figure 4.11 The Number of Times the IL Training was done

Figure 4.12 shows the frequency of the IL training, this shows that three quarters of the respondents had not attended any IL training at (68%), while a quarter of the participants have gone through the training only once or twice, only (4%) and (1%) of the participants who have gone through the training 3-4 times and 5-6 times respectively. The study established that majority of the students have not undergone through IL training while those who have gone through the IL training only 1-2 times. This therefore contradicts the findings by (Erich and Popescu, 2009) who established that for effective mastery of skills in information literacy the students must be subjected to frequency of practices for them to have effective skills.

4.6 Challenges Hampering Effective IL Program

The study sought to find out why electronic information resource were underutilized even with students going through information literacy program in the library. The researcher felt that there could be challenges that are not realized, either the students are information illiterate or they don't know of the existence of the electronic resources. Therefore the respondents were asked to highlight the challenges that hamper effective IL program as reflected in Figure 4.13

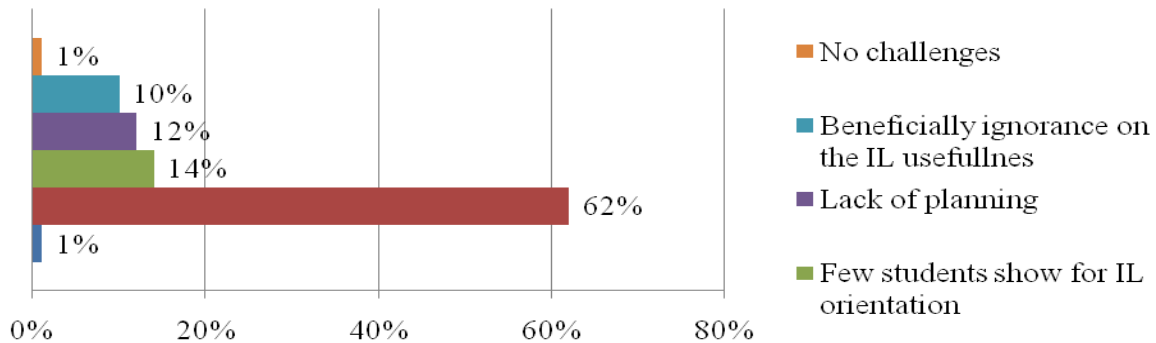


Figure 4.12 Challenges Hampering Effective IL Program

Figure 4.13 shows the greatest challenge that hampered effective IL program, was inadequate timing of the program as indicated by more than half of the population (62%); less than a quarter of the population (14%) indicated that only a few students turned up for orientation, while less than a quarter of the population (12%) indicated that lack of planning could have affected an effective IL program. It is also seen that (10%) of the population were ignorant on the usefulness of the IL program while only (1%) indicated that there were no challenges encountered.

The study established that inadequate timing of the program is the major challenge as indicated by more than half of the population in the above findings and these was the main reason why the students were not able to acquire information literacy skills to enhance their utilization of the e-resources and the researcher also agrees with Durisin (2002) who found that there are many challenges affecting information Literacy, one challenge involves staff attitudes about IL program. Some librarians’ resist the idea that IL is integral to what is done, having the traditional “Bibliographic instruction; background they focus on teaching students about specific sources and Boolean searching rather than information in general but she argues that one can teach the same concepts from an information literacy perspective. She also feels that there are also

differing perceptions about the actual role of librarians, who feels that IL is a faculty job not librarians.

With many respondents complaining about timing of the IL program it means that many did not attend hence low utilization of e-resource as a result of inadequate skills by the students, Erich and Popescu (2013) found that information literacy may be a factor in limiting the use of research information, exacerbating the perceived challenges of lack of time and lack of ready access to information resources. From an information perspective, teachers' use of research evidence is likely to be enhanced by greater development of information literacy; more attention to local information dissemination strategies; and the development of an information culture and ethos within schools.

Therefore the study realized that inadequate timing of the IL program poses as the major challenge as reflected by the highest percentage. Therefore the study notes that good timing is appropriate for students to earn some skills that would enhance their utilization of e-resources.

CHAPTER FIVE:SUMMARY,CONCLUSIONS AND RECOMMENDATIONS

5.1 Introduction

This chapter entails the summary of the study, conclusion and recommendations based on the objective of the study. The study sought to establish the effectiveness of information literacy program in promoting utilization of electronic information resources by postgraduate students in Kenyatta University post-modern library. In addition this chapter provides a direction for further studies.

5.2 Summary of the Findings

The study was done among the post-graduate students at Kenyatta University, where the majority were Masters Students while the minorities were PhD students. The IL program was introduced in Kenyatta University to train students on the information library to enhance access and utilization of library information materials for research. The study established that the program is inadequate in some key components as indicated by the students who suggested that the IL program should emphasize and offer more training on user instructions, orientation, computer information literacy, and online databases for majority of the respondents felt they needed more training on the skills.

The study revealed that the content of the current implementation of IL training program has not benefited the students an indication that they did not learn IL skills for their use, this proves that the program was not effective and there is need to have it improved in order promote utilization of electronic information resources. These would help the students acquire skills that would add value to them when searching for information for their research study.

The study established that students were introduced to the way library is organized, the library collection; existence of the OPAC and how to retrieve library information materials, however the study observed that there was need to incorporate IL training during the user education program so that the students would acquire some of the IL skills during user education training program which would go a long way in enhancing access and utilization of library skills.

The study revealed that the training time was only orientation which is very short and therefore the students needed to have more training time on e-resources hence ineffectiveness of the IL training program in enhancing acquisition of information literacy skills to the students therefore the reason as to why electronic information resources in the library were underutilized.

The study found out that the IL training was very important to the students in helping them to acquire research skills and therefore inevitably necessary for effective use of e- books and journals, and other e-materials, certainly end users of electronic information resources often need assistance in database content, search protocols and use of computers. There is therefore a necessity for a good training program to enhance students develop information literacy skills. It was also established that users were inadequately skilled for efficient utilization of e- books and there was dire need for information literacy training program to facilitate utilization of e-resources.

The study established that information literacy skills are not to be taught in isolation but rather continuously integrated throughout the curriculum and are mostly meaningful when taught within an inter-disciplinary unit or within a unit addressing an authentic, real- life need or problem in order to enhance the skills by the students.

The study also revealed that time and period of training was also of concern to students who stated that the program should be offered to students after registration not during registration, the IL program training require more time, that the number of student is too big for induction during orientation, many other activities in the library affect time for IL program, the orientation schedule is too overloaded to allow time for IL program, time allocated for e-resource training is not enough, time allocated for orientation schedule for IL program is not enough, and time allocated for IL program training is not adequate.

5.3 Conclusion

The study concludes that the content covered in the current IL program was not sufficient, as it lacks some basic skills in information searching, retrieval and evaluating information resources, therefore enhancement of the program was very necessary in order to equip the students effectively. The study finally concludes that information literacy skills have not taken the desired firm root among the post graduate students as desired by the University. The little that is presently being taught involves mainly the librarians without the partnership of the faculty members and the librarians.

The students views on the program was negative since most of the students showed that their participation was minimal which lead to inadequate acquisition of skills, the study concludes that a student's participation in designing the program and the delivery of the content was important to enhance understanding through practice.

The IL program is not effective since the training time is clashing with other activities and class timetables which therefore call for better planning to improve inclusiveness in student participation. This problem, coupled with inadequate training time, follows-ups, practice, affects

the students' acquisitions of the skills. However, the students have acquired a certain level of information literacy but which is very minimal, including technological skills as well as the investigative and critical thinking. Therefore the study concludes that inadequate timing and time of the IL program poses as the major challenge as reflected by the highest percentage.

5.4 Recommendation for Policy and Practice

The following were the study recommendations:

- i. The content used for the IL training was insufficient and therefore the study recommends that post graduate students should be trained about searching and retrieval of information followed by evaluating information sources training, making IL training of value to them. IL training should be introduced at the entry level of the undergraduate students since the training is relevant and enhances students to acquire IL skills and these helps reduce information illiteracy in the society as we embrace information society in the twenty first century.
- ii. The students had negative perception on the IL training since most of the students indicated that they have not benefited in any way from the program, therefore the study recommends that various methods should be developed for teaching and assessing the information literacy skills of the students, which may include: one-on-one instruction, interactive classes, online tutorials, as well as building assignments around research situations. Lecturers must also include the use of the e- information resources and computers as well as the internet and online searching skills. Students should be encouraged to learn more about electronic information resources and sources, and information literacy.

- iii. The study established that most of the students lack some basic skills in information search, retrieval and evaluating the information resources, therefore the study recommends that the IL program may include a course about how the library is organized and how to use the library, the purpose being to allow students to become familiar with the library's collections, enquiry systems, layout and functions, also how documents are organized, disseminated and retrieved. Then finally a course on information searching, and evaluating information resources and sources these will help students develop capacities in undertaking scientific research and practical work to lay strong foundations that will help them learn IL skills for future study and scientific research.
- iv. The study established that IL program was not effective since most of the students could not attend the program to completion due to clashing timetables and activities in the university, therefore the study recommends that good timing mostly when the students have fully registered with the university and have started their classes and are about to do their research, so that big number of students would see the need to attend and concentrate on the IL program training offered to them by the librarians for them to acquire the information literacy skills to enhance utilize electronic information resources and access the online databases subscribed by the library, or the IL training program be integrated to the curriculum.

5.5 Recommendations for Further Research

The research study was done to finding out the effectiveness of information literacy program conducted by librarians in Kenyatta University post- modern library to postgraduate students to provide some in depth knowledge on the state and usefulness of the IL program in enhancing

information literacy skills to the policy makers and guide the managers on the most appropriate timing and whether it adds value to the students.

The researcher recommends that the following areas of research can be investigated:

To establish the departmental levels of information literacy needs, since this study highlighted only the postgraduate students in the university. The information from specific departments and schools will help the librarians to identify the areas of concerns.

To identify the strategies those have been put in place by library in order to sensitize students on the information literacy and establish whether the strategies are effective or not in order to pinpoint the areas of need and concern.

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APPENDIX I: INTRODUCTION LETTER

Jane Kabura Muhia

Kenyatta University, School of Education

P.O Box 43844-00100

NAIROBI

Tel: 0728855863

Dear Sir /Madam,

RE: REQUEST TO COLECT DATA IN THE LIBRARY

I am a Postgraduate Student at Kenyatta University, Library and information science department;
I am doing a research on: Effectiveness of information literacy program in enhancing Utilization of electronic information resources by postgraduate students in Kenyatta University library for my postgraduate degree.

I therefore kindly request you to allow me collect data from the post graduate students in the library within the next two weeks.

Thank you in advance,

Yours Faithfully,

Jane Muhia

APPENDIX II: QUESTIONNAIRE FOR LIBRARY USERS

Introduction

I am a postgraduate student at Kenyatta University, library and information science department; I am doing a research on: Effectiveness of information literacy program in enhancing utilization of electronic information resources by postgraduate students in Kenyatta University library for my postgraduate degree.

I kindly request you to fill out this questionnaire. All the information provided will be used for the purpose of study only and will be treated with absolute confidentiality

INSTRUCTIONS

1. Tick appropriately in the brackets or fill in the space provided.
2. Feel free to give further relevant information to the research which is not in the questionnaire.

Background Information

1. Education background

(a) Masters

(b) PhD

Content Coverage of Information Literacy Program

1. Identify areas IL Program concentrates on?

(a) Information searching

(b) User Instruction

(c) Computer Information and Information technology

(d) Online Database training

(e) Orientation

(f) Others Specify-----

2. What areas of the IL Program would you recommend to be improved to enhance your information literacy skills.-----

Views about the relevancy of the (IL) Program

1. What information literacy skills did you learn by going through the IL training program?

List them down-----

2. Do you think the IL training program was of any value to you?

Yes

No

3. Are you able to apply the knowledge you acquired from the IL Program in searching for E-Information Resources?

Yes

No

4. Was it your first time to undertake IL training program?

Yes

No

5. Do you think the IL training program is relevant and should be offered to the students?

6. What is your view towards the IL program?

Please explain-----

Skills Acquired by the Postgraduate Students

1. Since you became a member of the library have you received any instructions in form of user education in use of the library?

Yes

No

2. If your answer in question 1 above is yes, what are your views on the quality of the instructions?

Very helpful Helpful Not Helpful Others specify

3. Since receiving Library user Instructions, has the Library staff made any follow-up efforts to improve your skills?

Yes

No

4. Were you given any training in the library on the use of computers in searching for information?

Yes

No

5. What are your views on the quality of user Education offered in the Library?

Very useful

Useful

Not useful

6. Please give reasons for your answer in question no.5 above

7. How would you rate the training offered by the library staff on the use of electronic information resources?

Very adequate Adequate Inadequate Very inadequate

Timing of the program

Answer the following questions using: √	Agree	Strongly Agree	Disagree	Strongly Disagree
Many other activities in the library require time hence leaving no time for IL Program				
Time allocated for Orientation schedule for IL Program is enough				
Time allocated for E-Resource Training is enough				
The Orientation schedule is overloaded to allow time for IL Program				
The IL Program training require more Time				
Time allocated for IL Program training is adequate				
The number of student is too big for induction during Orientation				
Program should be offered to students after registration not during registration				

APPENDIX III: INTERVIEW SCHEDULE QUESTIONNAIRES

Content Coverage of Information Literacy Program

1. Give the areas that IL training Program should concentrate on-----

2. What are the major challenges that hamper effective IL Program-----

3. What is the most serious obstacle towards IL Program -----

4. What areas of the IL Program would you recommend to be improved to enhance information literacy skills-----

5. What was the content coverage of the IL Program -----

Views about the relevancy of the (IL) Program

1. What information literacy skills did you acquire through the IL training program?

2. How was IL training program beneficial to you? Please explain-----

3. Is it possible for you to apply the knowledge you acquired from the IL Program in searching for E- Information Resources in the Library? -----

4. How many times have you received IL training?-----

5. Do you think the IL training program is relevant and should be offered to the students?

Explain-----

6. What are your views towards the IL training program?

Views on effectiveness of the program for instance timing, time allocated to the program among others.

1. Do you think the timing of the program is appropriate? i.e. when it is done-----

2. Do you think the time period allocated to IL training program is appropriate? -----

3. How relevant is IL training program towards your studies-----

Thank you.

APPENDIX IV: ACTION PLAN

Activity	Month
Literature Review	April _____July
Proposal Writing	August _____October
Preparation of research Instruments	November ____January
Proposal Presentation	February
Data Collection	March _____April
Data Analysis	May _____June
Model development & Analysis	July _____August
Project Writing & Submission	September ____October

APPENDIX V: BUDGET

<u>Activity</u>	<u>Quantity</u>	<u>Unit Cost (ksh.)</u>	<u>Total Cost (ksh.)</u>
Stationery			5,000
Proposal Preparation			1,000
Typing & Printing	70 pages	(70 x 5) x3	1,050
Photocopy	70 copies of 70 pgs.	(2x70) x7	980
Binding	7 copies	70	490
<u>Travel& subsistence</u>			
Subsistence	12 months	1000per month	12,000
Transport	12 months	2000 per month	24,000
<u>Equipments</u>			
Flash Disks	2	700	1,400
Computer disks	5	25x10	250
Laptop	1	35,000	35,000
<u>Data collection</u>			
Typing & Printing of	8 pgs	(5x8)	40
<u>Questionnaires</u>			
Photocopy of questionnaires	150 copies x4	2x1200	2,400
<u>Project Production</u>			
Printing	110 pgs.x10 copies	5x770	3,850
Photocopy	10 copies x2 110pgs	2x 1100	22,000
Binding	10 copies	10x250	2,500
Contingencies			2,000
Grand Total			113,860