

**DISTANCE EDUCATION AND THE ROLE OF THE LIBRARY:
A CASE STUDY AT THE UNIVERSITY OF BOTSWANA**

by

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ABSTRACT

For reasons of its tested capabilities distance education has been widely accepted and adopted in many institutions across the world. The University of Botswana (UB) is an institution that operates a dual-mode educational delivery system – combining the traditional system with the non-conventional delivery mode. In pursuing the distance education programme, an outreach arm of the University - Centre for Continuing Education (CCE), was established. The Centre's distance education unit (DEU) presently runs two courses by distance delivery mode.

The University of Botswana Library (UBL) has a commitment to give necessary support service to all academic programmes of the university, irrespective of the mode of delivery. Indeed, the mission of the UBL among others aims at responding speedily and appropriately to academic support needs and expectation of students and faculty. The main aim of this study was to carry out an investigation of the role and involvement of the library in the provision of distance education at the University of Botswana.

Knowing that the practice of library and information service to the ubiquitous distance learners promises to be a clear departure from the known traditional library system, the dissertation starts with a detailed description of the research problem and specific aims and objectives of the study.

In carrying out the study the research methods adopted comprise mainly the review of the literature, structured interview and use of the questionnaire. In reviewing literature we consulted current journals, appropriate books, relevant proceedings of conferences, the Internet, etc. Structured interview was arranged with some staff of DEU and librarians who were directly involved. Questionnaires were directly administered to one of the two

groups of distance learners during a residential session and mailed/faxed to all the 18 students of the second group.

The findings and discussions from the research supported the hypotheses formulated and provided a concrete base from which conclusions are drawn and recommendations made to all the stakeholders. These are the library/librarians, the DEU - the providers of distance education at the university, and distance learners themselves.

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Above all, I give all glory to God for making it possible for me to accomplish this task.



DEDICATION

This work is dedicated to my wife, 'Sumbo and children, 'Seun, 'Seyi and 'Sayo who missed so much of me while this study lasted.

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CHAPTER ONE

1 INTRODUCTION: LIBRARIES AND DISTANCE EDUCATION

1.1 RESEARCH PROBLEM

The tested capabilities of distance education, some of which are hard for the conventional system to accomplish, have demonstrated that it is a viable educational mode. As there is an increasingly growing desire for further education, many countries the world over require competent educational systems that can handle the flood of students wanting to further their education. Unfortunately, the increasing aspiration of people for educational opportunities is not one that can be met by just increasing the number of places in the existing traditional full-time programmes. The infrastructures (which are capital intensive), including buildings that would be required, cannot be put in place overnight.

Coupled with the above Herculean task is the fact that many of the target groups would find it tedious if not impracticable to leave their occupational and domestic responsibilities to attend school. In order to satisfy the yearning of the people, a marriage of convenience, different from the traditional educational mode, has to be worked out between the members of the target group and the attainment of their educational aspirations. One viable option available is distance education. It is, then, no wonder that most countries of the world today are adopting distance learning as a complement to the traditional system at many of the levels of education. It is, therefore, not uncommon for distance education institutions at tertiary levels to operate using a single-, dual- or mixed-mode of delivery in most countries of the world.

From its small beginnings, distance education has produced tens of thousands of graduates, and continues to provide tuition to millions of students all over the world. For instance, according to a source cited by Keegan (1996), some institutional statistics compiled in 1995 on ten universities running distance education programme around the

world including the University of South Africa (UNISA)] revealed a total enrolment of 3, 417, 000 students. Prior to this, Keegan (1994) undertook a study of distance training in the then 12 member states of the European Union. He noted that “almost 2.25 million were enrolled in distance learning institutions” within the 12 member states that formed the then European Union.

Usually distance education has no known geographical barriers as its adherents/students can be found anywhere and everywhere – be it in urban or rural or non-metropolitan areas. There is one question that springs to mind as education is provided to students in the various parts of the world, particularly in developing countries. This is: how will these students be able to access needed library and information service to support their educational goals? This question arises when account is taken of the library and information practice associated with the known typical traditional system.

In the traditional face-to-face educational mode, the students physically go to the library to satisfy their information needs using a variety of formats to do so. It is obvious that the traditional method of dispensing library and information services may not be very relevant to distance education students. For the library and information services of today to function effectively in a distance learning environment, changes need to be made to past practices.

By the nature of distance education programmes, students are separated in time and space from their tutors, the educational institution and its components including the library. A library in any institution of learning is known to complement and enhance the quality of educational programmes. This accounts for library and information services being a necessary factor that has to be taken into consideration when an institution begins distance education programmes. It should be stated as a premise that the era when docile and immobile library and information services waiting for their inquisitive and aggressive student users to make their demands does not hold for the distance education milieu. If library services are to be effectively provided for distance learners, the nature of distance

education must be known, and ways and means of taking the services to this special clientele must be devised.

It can be justifiably claimed that computer networking, otherwise known as the WWW or the Internet, has contributed to an explosion of interest in distance education. It should be noted with great interest by those concerned that in many advanced countries of the world a great deal of emphasis is placed on the application of information and communication technology (ICT) to dispense library and information services. In these circumstances students do not have to physically get into the library or resource centre to make use of library services. Students can log in requests not only by mail, phone or fax but can also use free text email, direct dial-in and order from the library catalogue, or from forms mounted on a Library Home Page for 24 hours each day. Do these fascinating trends in the developed world have any bearing on distance learners in developing countries in general, or at the University of Botswana (UB) in particular?

The University of Botswana is an institution that operates a dual-mode educational delivery system - combining the traditional system with the non-conventional delivery mode. An outreach arm of the University - The Centre for Continuing Education (CCE) has been established and given the responsibility of taking the university to the people. How far has the CCE gone with the task assigned to it? Does the library play any role? Are the libraries/librarians involved as major partners/role players in the distance education provision of the university? Are the libraries/librarians very relevant for the tasks faced?

A survey conducted by the University of Sheffield on nearly 1000 distance postgraduate students in 19 universities in the United Kingdom reveals a depressing picture of the lack of recognition of the need to provide library services to these students (Bolton, Unwin and Stevens, 1997). If this was the situation of distance learners in an advanced country of the world, what hope do distance learners in this part of the world have? Is attention given to providing library support services for them? Is there any institutional policy or philosophy that guides the operation of distance library services? This work undertakes

an analysis of the model adopted by the outreach arm of the University of Botswana, and assesses the involvement of the University Library in the provision of distance education at the University of Botswana. In addition, an attempt is made to provide answers to some of the issues raised above.

1.2 DEFINITION OF TERMS

It is considered appropriate to establish and clarify the meaning of some important and applied terms in this study as even open and distance education has been given a range of terms. The following are some of the related terms used:

1.2.1 CORRESPONDENCE EDUCATION

Correspondence education is a distance education method that is usually organised and communicated through the post, using print and related material. This system of education, according to the Commonwealth of Learning (COL) (2000) is “based on stand-alone, self-study materials”. Making further clarification, the COL states that in correspondence education “learners do not have to leave their homes to study”. The COL further points out that the system also allows the use of “a variety of means for tutor-learner contact, including the postal system, telephone, video and audio cassettes, electronic mail and television and radio broadcasts”. Today this term is no longer used, and the COL states, “many university programmes in North America have, in the last 15 years, renamed their correspondence programmes to more current titles such as open and distance learning”.

1.2.2 HOME STUDIES

Home study makes it possible for a learner to pursue his studies at home rather than in a formal school setting. Though a distance learner may study at home, s/he does not have

to be confined to home while undertaking such study. Keegan (1996) points out that “one of the difficulties in using ‘home study’ as a generic term is that the distance student may not, in fact, study at home or may study in part at home and in part at other centres”.

1.2.3 EXTERNAL STUDIES

According to Keegan (1996) the term external studies is applied to “a form of education that is ‘external to’ but not ‘separated from’ the faculty of the institution”. The COL (2000) gives support to Keegan when it affirms that the term “applies to instruction that takes place somewhere other than on a central campus, such as a classroom remote from campus”. In Southern Africa the University of Namibia is an example of an institution that has a Centre for External Studies. It runs open and distance education courses for the University.

1.2.4 OPEN LEARNING

Lewis and Spencer (1986) describe open learning as “courses flexibly designed to meet individual requirements”. According to them “it is often applied to provision which tries to remove barriers that prevent attendance at more traditional courses, but it also suggests a learner-centred philosophy”. Open learning is based on an educational philosophy that gives consideration to learners’ choices of, among others, place and pace of study and the media to use. Among the notable institutions that use the term “open” in their institutional names are: The Open University in the United Kingdom; and Indira Gandhi National Open University in India.

1.2.5 CONTINUING EDUCATION

The term continuing education is defined as “the education that continues some form of education which a person has had before.... It is an education that adds to the initial education that one has had, either to complete it, remedy it, improve it, adapt it to a new

level of requirement, or to supplement it” (Akinpelu, 1988). The University of Botswana’s outreach arm is the Centre for Continuing Education. The Distance Education Unit (DEU) is subsumed under this centre.

1.2.6 OTHER FEATURED TERMS

1.2.6.1 CCE

This is the acronym that stands for the Centre for Continuing Education. The Centre for Continuing Education is the outreach arm of the University of Botswana.

1.2.6.2 DEU

By DEU is meant Distance Education Unit. This unit is one of the three academic units that make up the Centre for Continuing Education. The DEU is given the task and responsibility to organise courses by distance learning mode at the University of Botswana.

1.2.6.3 UB

By UB is meant the University of Botswana.

1.2.6.4 UBL

This abbreviation also commonly features in this study. It is used in place of the University of Botswana Library.

1.2.6.5 COL

This acronym stands for the Commonwealth of Learning. This organisation established by Commonwealth Heads of Government for purposes of encouraging the development and sharing of open learning/distance education knowledge, resources and technologies. One of COL’s responsibilities is to assist developing nations, particularly in the Commonwealth, to improve access to quality education and training.

1.2.6.6 ICDE

This abbreviation stands for the International Council for Open and Distance Education. ICDE (2001) describes itself as “the global membership organisation of educational institutions, national and regional associations, corporations, educational authorities and agencies in the fields of open learning, distance education, and flexible, lifelong learning”. It is known that this organisation universally propitiates international cooperation in distance education and open learning.

1.3 THE OBJECTIVES OF THE STUDY

1.3.1 SPECIFIC AIMS AND RESEARCH OBJECTIVES

The aims of this study are:

- To identify different teaching models available in distance education and their characteristics vis-à-vis the role of the library in them.
- To examine the distance education model of the University of Botswana and the involvement of the University library in the effort to take the University to the people.
- To identify the role of the World Wide Web in providing library services to distance learners.
- To examine if there was room for improvement in the way the University library presently assists the distance learners enrolled with the university.

1.4 HYPOTHESES

To give focus to the research the following hypotheses formulated are to be tested.

- First, the involvement of the library plays a significant role in distance learning. A corollary to this was that if distance learners were unable to gain good access to library facilities, then this would have a negative impact on the performance of students.

- A second hypothesis was that distance learners of the university are further disadvantaged because of the absence of branch libraries and supporting computer-mediated infrastructures (including Internet facilities) across the country. It was assumed, for example, that when Internet facilities were not readily available distance learners were hampered because they did not have access to the university library web-page.
- Furthermore, the advent of the World Wide Web has had a tremendous impact on library and information dispensation, particularly for distance learners. This ICT has not been fully exploited to assist distance learners of the University of Botswana.

1.5 DISTANCE EDUCATION AND TEACHING

In a study of this nature it is important to bear in mind that the definition of a subject that has been given assorted names can give rise to controversy. The terminology used in Distance Education is multifarious. Indeed this diversity related to distance education is shown in the section dealing with the definition of terms in 1.2 above. It should be noted that the terms mentioned are by no means exhaustive. At this stage definitions of open and distance learning are necessary to provide a platform to determine what should be role of the library in this non-conventional system of education.

The definitions of distance education given earlier were those made by people regarded as the “grandfathers” of distance education. They include Moore (1973, 1977), Holmberg (1977) and Keegan (1980), among other authors. These are frequently quoted in the literature. There are numerous other authors who recently made their attempts on the definition. It is important to give further attention to some of these writers.

According to Moore (1973, 1977), distance education is “the family of instructional methods in which the teaching behaviours are executed apart from the learning

behaviours”. These, he states, include “those that in a contiguous situation would be performed in the learner’s presence, so that communication between the teacher and the learner must be facilitated by print, electronic, mechanical or other devices”. In the same vein, Holmberg (1977) noted that distance education comprises “the various forms of study at all levels which are not under the continuous immediate supervision of tutors present with their students in lecture rooms. But which nevertheless, benefit from the planning, guidance and tuition of a tutorial organisation”.

A recent definition of distance learning is one given by Rowntree (2000). He defines it as “learning while at a distance from one’s teacher – usually with the help of pre-recorded, packaged learning materials. The learners are separated from their teachers in time and space but are still being guided by them”. Portway and Lane (1994) made another attempt at a definition. They see distance education as the “teaching and learning situations in which the instructor and the learner or learners are geographically separated, and therefore, rely on electronic devices and print materials for instructional delivery”.

It is pertinent to note that from the above definitions some salient issues have emerged. All the definitions seem to give support to the central notion of separation between the learner and the tutor in distance learning. Also embedded in the definition is the reliance of this form of education on assorted technologies to bring about the education. It should, therefore, be noted that the interpersonal relationship and face-to-face communication that exists between the learner and teacher in a conventional education delivery system is absent, and in distance education this is taken over by some form of mechanical or electronic communication. These consist of devices that could be applied either on their own or combined. They include print, broadcasts, the telephone, audio and video cassettes, teleconferencing and the use of the computer and its Web-based facilities. It is also now acknowledged that computer networking has contributed to an explosion of interest in distance education.

Adekanmbi and Selepeng-Tau (1996) appear to have summed up and identified certain features that are typical of most available definitions of distance education. These include:

- Distance education is a non-traditional approach to teaching and learning;
- It presupposes the existence of some distance, mostly physical but sometimes social, between the tutor and the learner;
- In bridging this distance between the tutor and the learner, a medium of instruction, possibly print, electronic or other mechanical device is used;
- As a result of the variety of media used, different forms of distance education emerged;
- A wide range of experts or professionals are involved in the preparation of the text or electronic materials;
- An organisation exists to consciously plan and implement the educational programme;
- The use of face-to-face lectures to support the main teaching/learning mode may occur as an exception to the rule but not the rule itself.

In order to empower distance learners with life long learning skills librarians need to teach. Part of the philosophy of the Association of College and Research Libraries (ACRL) (2000) in its guidelines for distance learning library services has established the principle that the “instilling of lifelong learning skills through general bibliographic and information literacy instruction in academic libraries is a primary outcome of higher education”. The ACRL believes that such preparation and the associated measurement of its outcomes are as necessary for the distance learning community as they are for those on the traditional campus. The implication of this principle, among others, is that for purposes of equity, librarians should teach information literacy skills (ILS) to distance learners as they do to traditional students so that distance learners can benefit from ILS in the same way. ILS inculcates life long learning skills into students. How will the librarians teach these skills at a distance? This is a challenging role for librarians in a distance education system.

Many libraries, particularly in advanced countries of the world, collaborate with the faculty to teach ILS to distance-learning students. The general belief is that a student who is information literate will feel confident in any library and information centre, and will be able to access information efficiently and effectively. In designing information literacy standards, Oklahoma State (2000) believes that “information literacy, the ability to find and use information, is basic to student learning” and therefore declares that “these skills are to be taught as an integral part of curriculum”. As if to adduce reasons for the teaching of ILS, these standards include the following:

- An information literate student should be able to critically and competently evaluate information.
- An information literate student should be able to accurately and creatively use information.
- An information literate student is an independent learner who pursues information related to personal interest.
- An independent learner is one that is information literate and understands the value of literature and other creative expressions of information.
- An independent learner is one that is information literate and makes every effort to attain excellence in his hunt for information and knowledge generation.

Adapted from Oklahoma State 2000:
Oklahoma Priority Academic Student Skills
information literacy

Apart from general bibliographic instruction, Marie-Therese (1997) also submits that: “electronic training programmes are also necessary as some students may not have the appropriate know-how to use the information retrieval technology”. She believes that some students may also “not have the analytical skills to create search strategies or the ability to comprehend, decode and use the data retrieved”.

Holmberg (1986) notes that basic arguments in favour of distance education “voiced from the very beginning are thus the opportunities opened to adults to learn anywhere and at

any time suitable to them beside their other commitments, to upgrade their competence and generally to educate themselves without having to adapt themselves to the convenience of others". The question now is if the adults are to learn anywhere and at any time suitable to them, and given their independence, should they not be adequately equipped for this purpose?

By virtue of the nature of their study mode, it is unnecessary to state that distance students should be assisted on how best to access new worlds of information. No doubt, the faculty of a university has a role in this. But then the librarians should not depend entirely on the faculty, as they (the librarians) appear to have a more critical role to play in the new and expanding world of information that has developed.

A group of theorists have defined teaching as the deliberate and intentional initiation of a pupil into the world of human achievement or into some part of it (Oakshot, 1967). Adekanmbi and Somers-Vine (1996) carries this interpretation further suggesting that: "a pupil is in fact a learner known to the teacher". Skinner, cited by Baath (1979), sees teaching as "the arrangement of contingencies or conditions of reinforcements under which students learn". The definition suggests that teaching can only take place when there is someone to teach and another to be taught. A teacher's duty is to arrange the conditions whereby learning can be expected to take place.

Teaching in distance learning, according to Moore (1973), comprises "all those teaching methods, in which because of the physical separation of learners and teachers, the interactive (stimulation, explanation, questioning, guidance) as well as the preactive phase of teaching (selecting objectives, planning curriculum and instructional strategies) is conducted through print, mechanical or electronic devices".

Adekanmbi and Somers-Vine (1996) note that there are a number of issues that are common to all teaching situations, be it face-to-face teaching or teaching at a distance as in distance education. They identify the following submissions as areas of commonality on this subject.

- Aims and objectives: All teaching must have identifiable aims and objectives. There must be a purpose.
- Content: There must be content for teaching, and knowledge skills and attitudes to be taught and developed.
- Procedure/Methodology: There must be a process of carrying out the teaching and this includes basically a method and the appropriate techniques provided with it.
- Media: There must be resources or media, which serve as channels of communication in the teaching process whereby pedagogical information is shared.
- Evaluation: There must be an evaluative procedure to find out what has been achieved.
- Feedback: There must be room for feedback, whether it is immediate or delayed.
- Products: There must be products of teaching, especially in terms of those who have been taught and who have competencies in terms of acquired knowledge, skills and developed attitudes.
- Subject structures: Different subject areas have structures, which in turn affect the general approach to be adopted when their teaching is being carried out.
- Result: Learning should result from teaching.

Different theorists have suggested a number of models of teaching in distance education. Holmberg (1981) in his model of didactic conversation says good distance education resembles a guided didactic conversation to achieve its goal of promoting learning. Holmberg's view was based on the following postulations:

- There is promotion of study pleasure and intrinsic motivation in students when there is the feeling of a personal relationship between the teacher and learner.
- Such feelings of a personal relationship can be promoted even at a distance by the style of communication between the teacher and the learner.
- The realisation of study goals and the application of proper study processes and methods are the consequence of intellectual pleasure and study motivation.

- The feeling of a personal relationship between the teaching and learning parties could result from the prevailing atmosphere, language and conventions of friendly conversation between both parties.
- Most easily understood and remembered messages are those given and received in conversational forms.
- The communication media used in distance education can also be used successfully to translate conversational concepts between the two parties.
- For organised study that is characterised by explicit or implicit goal conceptions to take place, it is important to adequately plan and guide the work carried out either by the teaching establishment or the student.

The characteristics of Holmberg's guided didactic conversation as noted by the author include the following:

- Presentation of study matter is easily accessible, the language of the text is clear, colloquial and simply expressed; and the density of information is moderate.
- Explicit advice and suggestions are given to the student about what to do and what to avoid, and what to pay particular attention to and consider, and the reasons provided.
- An exchange of views is invited to encourage the student to questions, to make judgments of what is to be accepted and what is to be rejected.
- An attempt is made to involve the student emotionally so that he or she takes a personal interest in the subject and its problems.
- Personal styles are used, including the personal and possessive pronouns.
- There is a demarcation of changes of themes through explicit statements, by typographical means or, in recorded spoken communication, through a change of speakers, for example, a male may be followed by female, or through pauses.

Other models of distance teaching include Ausubel's (1968) advance organiser model, Skinner's behaviour control model, quoted extensively by Baath (1979), and Carl Roger's (1969) facilitation model. Though they vary, all the models lend credence to the

fact that teaching in distance education should follow a conversational style in texts prepared. This, they believe, has the capacity to bring about feelings of a personal relationship between the teacher and the student. More importantly, as library and information services enter a new phase in the educational system, collaboration with the faculty, tutors, other course writers and distance educators is a *sine qua non* for effective performance of the library and the librarians in this new dispensation of learning and knowledge.

1.6 MODELS USED IN DISTANCE EDUCATION

In developing distance education programmes, there has been an emergence of a great variety of models propounded by different authors, whilst others continue to make their submissions based on these models. This ranges from two major groupings drawn up by Peters (1971), El Bushra (1973), Neil (1981), to seven basic organisational models structured by Keegan and Rumble (1982) among others. An attempt has been made to explain the reason for the different organisational models put in place in various places. According to Rumble (1986), “in implementing any distance education project there can be no question of transferring a particular system from one country to the other, no matter how successful it appears to be in its original setting. Each project must be considered within its own context of the environment in which it will operate”. In simple language, it could be explained that the variations that occur when a system is imported into another context often generates a multiplicity of models.

Since the main focus of this study is on the role of the library in this type of learning, we shall be complacent with the summary of the available models proposed by Dodds (2000). Basically, he perceives open and distance education as being in two main categories, the delivery and institutional models. There are five delivery models, and three institutional models. The five delivery models are immediately discussed hereunder:

1.6.1 DELIVERY MODELS

The five delivery models include the following:

1.6.1.1 The Challenge model

The basic characteristics of this model include:

- Learning materials, a syllabus, a reading list and so on are provided. Students are expected to work on their own, study the way they choose and then take the examination. Sometimes the model is mediated at a distance with tutorial support.
- It is the opposite of the student-centred model.
- It is not expensive to provide.

The challenge model is targetted towards:

- Highly motivated adults
- Postgraduate students

Examples of where the challenge model is practised are:

- London University for the external degrees
- UNISA (until very recently)
- University of London/IEC for the MA in Distance Education.

1.6.1.2 The Resource-based learning/Three-way teaching/Flexi-study model

This model has:

- Good interactive learning materials
- A strong element of occasional face-to-face contact support
- A strong institutionalised student support service

For this mode, the target audience includes:

- Adult secondary school students
- Adult tertiary students
- Professional upgrading students (for example, teacher education, accounting and nursing programmes)

Some of the places where this model is adopted are

- University of Namibia
- University of Botswana
- United Kingdom Open University (UKOU)
- UK National Extension College (NEC)
- Most Open Universities.

1.6.1.3 The Supervised-study group model

The main characteristics of this model are:

- Students study in groups.
- Supervisors structure and support the learning session but do not teach.
- Open and distance learning materials are used.
- It is usually offered as an out-of-school alternative.
- Face-to-face support is provided.
- It is more expensive than the previous models but cheaper than formal schools.

The targets of this model are normally:

- Out-of-school young adults and adolescents
- Children who cannot get a place in school, or who are unable to go to school

Some examples of this model are:

- Supervised study groups in Zambia and Malawi
- The Australian School of the Air

- The Indian/Indonesian Open Schools

1.6.1.4 The In-school media enrichment model

Characteristics of this model include:

- Teacher-led media used in class to improve the quality of teaching
- Additional tuition to that of formal school
- Extra costs over and above the normal costs of formal schooling

The targets of this model are:

- Children attending school
- Students enrolled at university

Some examples of the model are:

- Interactive radio instruction experiments (such as OLSET – South Africa)
- Tele/radio programmes
- African Virtual University, as used in Namibia and Kenya.

1.6.1.5 Media-enabled adult (Education/non-formal education) study groups

The principal characteristics of this model are:

- It is media led (usually radio).
- Group study is used.
- Community and popular education uses it extensively.
- It does not lead to a qualification.
- It is cheap if large scale, but it is usually not carried out to achieve benefits of scale.

The targets of this model are:

- Un- and under-educated adults (including illiterates)
- Adults learning for specific personal or society purposes

Examples of places where the model is adopted include:

- The tribal grazing lands campaign in Botswana
- Tanzanian health education campaigns
- Namibian farmers education projects

1.6.2 THE INSTITUTIONAL MODELS

There are three identified institutional models:

1.6.2.1 Single mode institution

- This institution is set up to offer programmes of study at a distance.
- It is largely self-contained and self-reliant.
- It is independent of conventional educational institutions.
- Potentially large scale benefits are possible.
- Some face-to-face interaction is involved, but this is often optional.
- The Teaching and learning process is 'mediated' in some way, such as: by print, including correspondence; by audio, including radio (one-way, two-way), cassettes, telephone and audio conferences; by video, including television (one-way, two-way), cassettes or video conferences; and by computer, including computer-based training, e-mail, computer conferencing and the World Wide Web.

Many of the world's 'mega-universities' including the Indira Gandhi National Open University (IGNOU), Sukhothai Thammathart Open University (STOU), the University of South Africa (UNISA) and the United Kingdom Open University (UKOU), are single mode institutions.

1.6.2.2 Dual mode institution

Dual-mode institutions are also called bimodal.

- Such an institution offers learning opportunities in two modes - one using traditional classroom-based methods, and the other using distance methods.
- It may also offer the same course in both modes, with common examinations.
- It usually has a dedicated open and distance learning unit within it.
- The two types of learner (on-campus and external) are regarded as distinct.
- It may or may not allow 'cross-over' registrations.

Examples of dual mode institutions include the Open Learning Institute of Charles Stuart University, the University of Nairobi, the University of Botswana and the University of Zambia.

1.6.2.3 Mixed mode institution

This model which offers learners a wide choice of modes of study is:

- Independent, group-based or a combination of these; and face-to-face, mediated or a combination of both.
- It maximises flexibility of place and pace of study.
- It results in a 'convergence' of face-to-face and distance modes.
- It increasingly characterises organisations that were once 'single mode' or 'dual mode'.

Deakin University and Murdoch Universities, both in Australia, provide examples of institutions that are now 'mixed mode'.

1.7 THE CCE, UNIVERSITY OF BOTSWANA AND ITS MODEL

The Revised National Policy on Education (1994) identified the CCE as "the lead agency for the provision of part-time and distance education programmes for adults at the tertiary

level in Botswana”. As the focal point for the development of continuing education programmes in Botswana, the CCE (1996) indicated that its main challenge is to achieve two goals: These are:

- To increase access to higher education by employing various modalities for delivering education, especially those that do not require persons to leave their jobs in order to attend the university full-time. This would assist in meeting the increased demand for education throughout the country.
- To mount more tailor-made short courses suited to the needs of various consumers after consultation with them. These are to be run increasingly on a cost recovery basis – thus helping the University to achieve a degree of financial self-reliance.

In order to meet the mandate or challenge facing the CCE, the DEU, one of the three academic units under CCE, established the following objectives:

- To assess national learning and instructional needs, and develop and implement appropriate educational programmes to redress any deficiencies;
- To extend educational opportunities to all aspiring Botswana without the need for them to live away from their families, or to withdraw from their duties in nation building;
- To develop distance education study packages that are relevant to the needs of Botswana;
- To produce qualified and skilled human power in order to hasten the localisation process;
- To develop technological and technical capacity in order to meet the needs of a modern distance education unit;
- To develop an adequate student support system which will meet the diverse learning needs of distance learners;

- To promote networking between the DEU and other institutions and organisations at the national, regional and international levels in order to share available resources and facilities;
- To work closely with University departments and units in identifying, developing and delivering programmes that are needed.

To achieve the set objectives, the DEU has started two programmes and plans are afoot to mount other courses by distance delivery mode. The courses currently available by distance delivery mode are

- Diploma in Primary Education (DPE), and
- Certificate in Adult Education (CAE).

In terms of the institutional model to be adopted, there is little doubt as to where it is to be located. The Centre for Continuing Education, into which the DEU is incorporated, was set up alongside other departments but specialises in delivering distance education within a conventional institution. This conforms to the practice followed in a dual-mode or bimodal institution. Kamau (1998) reasoned that considering the low and sparse geographical distribution of the population in a country where there is only one university, the only practicable option to adopt was the dual mode system. It will be recalled that in the dual or bimodal system an institution offers learning opportunities in two modes - one using traditional classroom-based methods and the other using distance methods. This is the situation within which distance education operates at the University of Botswana.

In so far as the delivery mode is concerned, it will be necessary to explain a few of the issues that have arisen in the operation of the distance learning programmes of the DEU prior to identifying one of the delivery modes discussed above as a preferred mode.

First and foremost it has been noted that the DEU operates under the umbrella of the CCE. The Centre for Continuing Education is not recognised as a department that can

award certificates, diplomas or degrees. Thus it runs programmes leading to awards offered by departments of the University.

With regard to the Certificate in Adult Education programme, the Department of Adult Education of the University is responsible for the award of academic credits. Tutors are drawn from the Departments of Adult Education and Communication and Study Skills to work with DEU staff for course planning, design and development.

In the case of the in-service Diploma in Primary Education programme, the Colleges of Education in Botswana award diplomas validated by the University. The DEU liaises with the Primary Colleges of Education for a number of reasons. Firstly, these colleges are running a similar programme. The only difference is in the mode of delivery. It will be recalled that the same course could be offered in both modes even with common examinations. However, provision should be made to treat the two types of learner differently. Lecturers teaching in the Colleges have been appointed as tutors on the DPE distance programme.

The second reason is that all the Colleges of Education are affiliated to the University of Botswana, and at the same time they are under the direct supervision of the Ministry of Education. Furthermore, the CCE started the DPE programme by distance mode for the teachers in primary schools at the request of the Ministry of Education.

Despite evidence of some disparities in the handling of the two programmes (DPE and CAE) in practice by the distance learning mode, there are certain common traits or characteristics that can be perceived in the running of the two programmes. These include the following:

- Highly interactive modules have been developed as learning materials for students.

- Regular residential/face-to-face contact sessions are organised for students, and in some cases, occasional study weekends are arranged where students meet and interact not only among themselves but also with their tutors.
- Apart from the available counselling service and direct contacts that the students have with the DEU, students are also able to get in touch with their tutors by telephone and obtain library and information service on-line.

The identified common characteristics in the two programmes currently being run by distance mode provide good grounds to state that the delivery mode of the CCE falls in line with the model described as the Resource Based Learning/Three-Way Teaching/Flexi-Study Model.

1.8 OUTLINE OF THE STUDY

The study is divided into five chapters. These are:

Chapter 1: Introduction

This chapter provides information on statement of the problem, the objectives and hypotheses of the study. It gives background information on different types of models that have evolved in distance learning. It focuses on the model adopted or being adopted by the Centre for Continuing Education, the outreach arm of the University of Botswana.

Chapter 2: Review of the literature.

Library and information service is an arrangement that should be put in place when an institution introduces an education system by a distance delivery mode. The focal point in the review of the literature is to assess the role of the library in the distance-learning environment. The literature review also brings into clear focus some case studies around the world of the library operations as they relate to distance learners. It also addresses the advent and importance of modern information and communication technology (ICT) in a library environment.

Chapter 3: Research methodology

Though a literature review is part of the research methodology, the third chapter is devoted to explaining how other methods were applied in conducting the survey on which this study is based. It discusses the population studied, questionnaire design, and the administration and collection of data.

Chapter 4: Research Findings and Discussion

This chapter discusses the findings from the questionnaires administered in chapter three above. It analyses the result of the questionnaires from the three groups of respondents – the students, the DEU staff and the librarians involved.

Chapter 5: Conclusion and Recommendations

This is the concluding chapter. It is to bring out recommendations that are hopefully going to assist the university library and other stakeholders in carrying out their respective responsibilities to distance learners in Botswana.

1.9 CONCLUSION

In this chapter a brief background has been provided to this study. The research objectives as well as the aims of the research have been explained. We made some attempts to establish the fact that in distance education, librarianship has entered a new phase that poses a great challenge, a challenge that is very different from the practice in a face-to-face learning environment. Some models in open and distance learning were discussed, and the focus then moved to the model of distance education at the university of Botswana.

In the next chapter a review of literature is undertaken. This review of literature examines the role of the library in a distance-learning environment. It takes into account case studies of some institutions where distance librarianship is practised around the world. It also examines the role of information and communication technology and its usefulness in providing library and information support to distance learners.

CHAPTER TWO

2 LITERATURE REVIEW

2.1 INTRODUCTION

In this chapter we are going to examine the ideas, views and findings of various authors and researchers on distance education and library provision for this group of learners. It is our belief that an understanding of the experience of what has happened in libraries and institutions in different parts of the world where distance education has been adopted as a mode of learning will at this stage give an enriched background to this study. This is what is offered in this chapter. The review of the literature is therefore arranged by topic for the purpose of addressing what is known about various aspects of the study. The aspects that will be covered under this review of literature include: distance learning and library provision; case studies of library and information services from different parts of the world; and the usefulness and application of ICT in Library Systems for distance learners.

2.2 DISTANCE LEARNING AND LIBRARY PROVISION

It is more than obvious in the world today that the conventional mode of educational delivery no longer has the capacity to cope with the modern demand for education by the populace. An increasing number of people, particularly working adults, are desirous of further education, and to satisfy this distance education is increasingly becoming more popular. As distance education beckons to people, more and more academic institutions are turning to this mode of learning. This falls in line with the observation of Cross (1987) in her speech at Central Michigan University's 1987 Conference on Adult Learning in Higher Education. She declared that, "the trend is as clear as it is steady. The college campus has burst explosively from its boundaries, and decentralization of learning is a major trend of our times".

Various institutions of higher learning are putting in place distance learning programme. One particular issue that should be borne in mind is that a necessary ingredient of distance learning is the library and information services, which should provide the facilities required by their distinctive students. While this mode of delivery is endorsed as a viable alternative to the conventional system, one snag that has been of concern to many authors is the provision of library and information services. It was this fear that prompted Kaye (1981) to state that, "a student needs to have access to a well-stocked library". Because of his conviction of the need for library provision for such a student he declared that "its absence is perhaps the single most serious limitation of distance education at university level". Watson (1992, 1998), Appleton (1997), Cavanagh and Tucker (1997) and many other authors have established the fact that access to quality library resources and services is a critical factor in any academic programme of merit. They have, therefore, sounded a clarion call to the academic institutions running distance education programmes that they have a responsibility to provide their distance learners with library and information resources and facilities equivalent to those available to their on-campus counterparts.

The general apprehension about such services related to distance education appeared to be further reinforced when the British Open University (OU) was established in 1969. The university tacitly avoided the responsibility of making available proper library services to its students. The OU simply directed that its students should rely on services provided by the public and other university libraries for their library and information needs.

This perhaps brings us to the issue of credibility and the equivalence of distance education to the traditional mode. Credibility, Bobb-Semple (1997) stated, "depends not only on the quality of instruction, fundamental though that may be, but also on the adequacy of learning support services which must include easy access to sources of information". He further declared that, "access to adequate and relevant information resources contributes greatly to ensuring equity and achieving parity". He drew the

conclusion that the existence of an effective and efficient library service is a key requirement of any distance education programme of quality. In order to further support this belief, Watson (1999) has a suggestion for what she describes as a facilitatory institutional philosophy for library services. Her submission is that, in order to provide quality library and information service for distance learning and distance education, “it is necessary for any institution offering distance education programmes and courses to institute a philosophy that recognises the provision of library service to their students”.

As if lending credence to the assertion of Bobb-Semple, Johnson (1986), a special Commissioner to the Commonwealth Tertiary Education Commission in Australia, in an opening address on the theme of library services in distance education, had this to say about the role of libraries in distance education. “In the development of distance education libraries have a central place. They supply crucial learning resources”. He added that “those providing distance services have particular problems beyond those of libraries in conventional institutions: special problems of costs in book purchase, in postage”. In relation to administration, he asserted that there are “special problems of administration involved in the whole business of despatch and retrieval; special problems of counselling bemused students who are not simply on the other side of a desk but may be hundreds of kilometres away”. He further declared that “without [quality] library services, the success of distance education in [Australia] will not continue”.

The academic library has traditionally remained central to the educational process. It has always been perceived as one of the measures of quality of an educational institution. In a study that examined provision of education below university level in English-speaking West Africa, evidence was adduced to advance the view that the existence of, and adequate provision in, libraries significantly enhanced the success of and quality of national education programmes. In those countries where expansion of formal education was not supported by a similar growth in library provision, the quality of education suffered (John, 1977).

Magnus (1990) cited a more recent World Bank study that confirms the view expressed above. Reference is made to the widening gap in educational provision between sub-Saharan Africa and the rest of the world caused by the absence of books. According to this analysis, a cost comparison exercise indicated that educational materials account for just 1.1 percent of the recurrent primary education budget in the median-level African countries, which is \$0.60 per pupil per year. When compared with the same educational level in developed countries, it is much larger as the budget for instructional materials accounts for about 4 percent, which amounts to approximately \$100 per pupil per year. It is, therefore, a foregone conclusion that any difference in quality, when set in context alongside other related factors, such as language, trained staff, and purpose-built accommodation, can only widen the gap in quality of support structures in each education system.

The point at issue now is: if there is a problem of library and information provision in a formal setting, what hope can there be in a non-formal setting as in distance education? This has increased uneasiness amongst distance learning providers. It must be added that much concentration has been placed on the provision of library and information services in the formal learning environment. But the issue is that, in the event of library and information services being provided for distance learners, will the service for them be equal to that available for students in a conventional system?

One of the first notable organisations/associations to take up the challenge of ensuring that library and information services are adequately provided for distance learners is the American Library Association (ALA). The requirements of extended, distance-learning or off-campus students started gaining attention in 1931 when the American Library Association observed that students studying away from the main campus of their institutions were suffering from educational disadvantage because of non-availability of library resources. In 1967 the Association of College and Research Libraries (ACRL) developed guidelines on library services provision for this category of students. The guidelines were revised and approved in 1990, while 'the final version' was approved in

July 1998 as the ACRL guidelines for distance-learning library services. An addendum was incorporated in the guidelines in 2000.

The guidelines defined distance-learning library services as “those library services in support of college, university, or other post-secondary courses and programs offered away from a main campus, or in the absence of a traditional campus, and regardless of where credit is given”. According to the guidelines the courses referred to are “inclusive of courses in all post-secondary programs designated as: extension, extended, off-campus, extended campus, distance, distributed, open, flexible, franchising, virtual, synchronous, or asynchronous”.

The ACRL directive was detailed and unambiguous in the guidelines handed down on library provision in distance education. For instance, the prelude in the 2000 addendum to the guidelines stated that, “Library resources and services in institutions of higher education must meet the needs of all their faculty, students, and academic support staff, wherever these individuals are located, whether on a main campus, off campus, in distance education, or extended campus programmes, or in the absence of a campus at all”. It further states that library resources should also meet the requirements “in courses taken for credit or non-credit; in continuing education programmes; in courses attended in person or by means of electronic transmission; or any other means of distance education”.

To avoid ambiguity, the guidelines were very emphatic as they spelt out further details in terms of philosophy. The philosophy of the guidelines for distance-learning library services assumes, among other things, that:

- Irrespective of where the students, tutors and programmes may be located accessibility to adequate library facilities is important for any higher academic skills to be accomplished.
- All the stakeholders in distance learning should also receive the same library services and resources as students in a conventional system.

- Acquisition of lifelong learning skills by distance learners through the teaching of information literacy skills programme is a necessity and by-product of higher education.
- Equity and justice demand that specialised and/or personalised library services should be administered to students and faculty members of distance learning in order that they may also have access to a full range of library services and materials.
- While effective and appropriate library services to the distance-learning community vary, they should be of the same value as the services provided in a conventional system.

Adapted from ACRL, 2000.

The guidelines also provided information on management, financial support, personnel, facilities and resources that should be considered when an institution introduces a distance education programme. On the library services that should be offered to the distance-learning community to meet effectively a wide range of informational, bibliographic, and user needs, some of the services suggested in the guidelines by ACRL include:

- Assistance with reference inquiries
- Computer-mediated/assisted bibliographic and informational services
- Provision of reliable, rapid and secure accessibility to the Internet and other institutional network resources
- Ensuring prompt delivery of documents by employing the services of an efficient courier system and, or using electronic transmission
- Instituting library use education and information literacy skills programmes to ensure independent and life long learning
- Generous opening hours to encourage maximum use of the library resources
- Collaborative agreement with other institutions that ensures mutual borrowing and effective interlibrary loan services

Adapted from ACRL, 2000.

Regarding facilities, the guidelines stipulate that the originating institution should provide facilities, equipment and communication links sufficient in size, number, scope, accessibility, and timeliness to reach all students, and to attain the objectives of distance-learning programmes. The guidelines offered the following as some examples of possible arrangements that could be made:

- Partnership with other libraries to ensure easy accessibility to facilities;
- Creating a specially designated place for purposes of consultations, ready reference collections, reserve collections, electronic transmission of information, computerised database searching and inter library loan services and providing offices for the library distance-learning personnel;
- Establishment of branch or satellite libraries;
- Provision of virtual services, like Web pages, Internet searching, and electronic connectivity.

Adapted from ACRL, 2000.

Other experienced authors in distance librarianship have also made their contributions to some of the issues raised above. For instance, in discussing factors that a library should consider in establishing a library delivery service to its distance students, Cavanagh and Tucker (1997) advised that a number of questions must be raised and addressed. The following are some of them:

- What staffing will be required and how many professional staff will be employed?
- Will the library try to supply sets of “core” recommended material to study centres or extended campus sites or will it provide all library services from a central library?
- How can the library ensure that it has adequate stocks of multiple copies of recommended books for its distance as well as its on-campus students? (In the event that the institution runs a dual-mode system).
- How can the library obtain reading lists for new and remade external courses?

- Who will have the responsibility for ordering material – library staff or academic staff?
- Will the library accept requests from distance students by telephone? If so, will it provide a toll-free service and answer phone?
- Will it lend prescribed (set) textbooks or only recommended and other readings?
- Should there be a limit on the number of items that distance learner can have on loan at one time and/or should there be a limit on the number of items they can borrow for a given unit or subject?
- What is a reasonable loan period and will students be allowed to renew items? Will students be able to renew by phone?
- Will it provide photocopies of articles? If so, will they be supplied free or will a charge be made? If it is decided to charge students, what is an equitable rate and how will the library administer the service?
- Will the library accept subject requests (general requests for information) and if so, will it carry out computer and CD-ROM searches on students' behalf? Will it charge the students for these computer searches?
- Will it try to obtain inter-library loans for undergraduates or will these be available to postgraduates only? Will students be charged for inter library loans?

In lending her weight to what should constitute the component of an adequate library support system for off-campus programmes, MacTaggard (1991) itemised six salient issues. These are:

- Where practicable, an agreement should be made with local municipal, military, college or university libraries for students and faculty use. She added that, “these co-operating libraries need to have collections that are relevant to the curriculum being offered”. The off-campus program needs to have meaningful input into acquisition decisions of the co-operating library.
- In most instances some collections of library and learning materials should be maintained in study centres. At the very least, these would include basic

references suitable to the curriculum. The site should also provide the capacity for database searches.

- There would be an efficient, timely and free retrieval service, which allows learning resources to be sent from the main campus to the off-campus location. This implies, of course, that the main campus has developed multiple copies of sufficient resources so they can meet demand from different sites at the same time.
- There must be availability of trained staff on site. If the site is large enough, then it should be able to support a full-time librarian. Otherwise, a circuit rider approach may be necessary in which that librarian is available on a scheduled basis.
- The fifth feature of strong off-campus programs is evidence of active involvement by the library with faculty, staff and students to ensure that all groups are knowledgeable of the resources available through the learning resource centre.
- There should be evidence of a close link with the curriculum being offered. This is a manageable task, particularly because so many off-campus programs have a specialised curriculum.

Believing that the consumers of a service usually provide authoritative views on the quality of a service, Steele (1997) of the University of West Indies undertook an empirical search of the distance students' view on the provision of library services in her university. According to her, it was an almost unanimous view (91.4%) of the students that library support was an important factor in the success of their studies.

Writing on their experience in North-western University, Chicago USA, Pickett and Nielson (1991) gave accounts of some issues relevant for other institutions planning library services for non-traditional students. They maintained that firstly, an effective programme requires library-wide cooperation. They subscribe to the idea that planning involved consultation with personnel in many departments including reference, collection management, interlibrary loan, circulation, cataloguing, and acquisitions.

Secondly, the support of appropriate academic administrators is crucial. It is noted that this group can provide valuable information about curriculum, faculty and students for library planners. According to Pickett and Nielson (1991) the academic administrators also served as “valuable political allies who can assist to get things through”.

Thirdly, it is argued that patience and flexibility are important in planning library services to non-traditional students. Quoting Kanter, they noted that change is often difficult to effect in large organisations. It is, therefore, submitted that it must be clear when it is time to move slowly, when to contact other staff, when to bring in additional minds for decision making and so on.

Finally, they argued that effective promotion is essential in creating a successful programme. Outreach and communication would need to be given top priority in the implementation of services, and there is little purpose in creating new and expanded services if they are not publicised.

2.3 DISTANCE INFORMATION AND LIBRARY SERVICES: SOME CASE STUDIES

The nature of distance education has made distance learners the most difficult library customers to satisfy. This probably prompted Watson (1998) to declare that the delivery of library and information services to those who learn at a distance is undisputedly the most pressing challenge that distance librarians encounter. She maintained that, “distance librarianship demands that librarians recognise that their role has transformed from being custodial in orientation to become cutting edge in nature particularly with respect to the delivery of information services”.

Seemingly difficult as this may be, there have been significant and outstanding efforts made in some institutions around the world to provide service for these learners. There is, therefore, a preponderance of literature on practice that could offer a guide to other institutions initiating distance education programmes, particularly in developing countries. For instance, the state of Connecticut in the United States decided to reinforce

the service for distance learners with its own 'code of conduct' for any institutions in the state running distance programme. This is in addition to the guidelines laid down by ACRL and other regional associations.

Aguilar and Kascus (1991) suggested that because of dissatisfaction with the efforts of the regional and national accrediting associations in the area of off-campus programmes, the Board of Governors for higher education of Connecticut decided to establish new regulations pertinent to libraries. Thus section 10a-34-18 of library and learning support states that Library support for off-campus programs is subject to the following requirements:

1. There shall be provision for a core collection, including both circulating and reference materials, sufficient to meet the needs of both the students and faculty to be provided either at the site or via written agreement with a nearby library.
2. There shall be provision for a reserve reading collection at or near the site.
3. There shall be provision of professional library staff support for library services at or near the off-campus site.
4. There shall be provision for additional materials to supplement the core collection, e.g. through computerised bibliographic access and a document delivery system.
5. There shall be provision for adequate annual budget support for library resources at or near the site.

There is no doubting the fact that establishing these new regulations was a major step forward as they have great potential for improving library services to off-campus students.

The University of Queensland was a pioneer in the development of distance teaching in Australia and remained the sole provider of external studies within the state of

Queensland until the 1970s when colleges entered the field. Stressing the role of the External Studies Librarian in Queensland, Crocker (1991) outlined the following functions:

- To act as identifiable person to whom students can confidently write or phone concerning bibliographical and resource materials problems;
- To liaise with external studies lecturers on all matters of resource provisions for external students;
- To meet with students to discuss problems, provide reader education programs etc;
- To prepare guides for external students;
- To develop and review policies of resource provision.

In providing services to its distance learners at the Thatcher Library of the University of Queensland, Crocker (1991) recorded that “its main function is to operate a postal service to the remote off-campus students, though this service is not restricted by geographic location and is available to any students enrolled in the off-campus mode”. With respect to loaned items getting to students, Crocker stated that “material is sent to students through a courier service operated by Australian Post; students must return the material at their own cost. Around 28,000 postal loans are sent from the library. Photocopies are provided for students retention on a voucher system: \$1.50 guarantees supply of any journal article, and postage to the student’s home”. She added that “the library operates an answering phone service for after-hour queries, and it shares a toll-free line with the School of External Studies”. Talking of operating hours, she notes that the Thatcher Library “opens for extended hours during any of the voluntary residential schools held on campus, and its collection is no longer exclusively for use by external students as on-campus students are permitted overnight loan privileges”.

Deakin is another university in Australia that developed in order to provide specialised off-campus courses for undergraduate and higher degrees. An experienced librarian, Crocker (1991), who had worked at the University of Queensland left to join Deakin. She recounted her experience of the *modus operandi* in rendering library services to distance

learners in Deakin: Crocker recalls that “Deakin responds to telephone, postal, personal, telex, facsimile and electronic mail requests for materials, and sends that material to off-campus students around the world”. With regard to those living within Australia, she states that they “receive the material by overnight courier delivery, and are able to return it in the same fashion at no cost”. Deakin, Crocker discloses, pays delivery costs both ways. As for overseas students, she maintains that “airway is used by students resident overseas, and the library reimburses students for return airmail costs”. She added that “photocopies of journal articles are sent out free of charge; and students may borrow videotapes and audio cassettes as well as books”. According to Crocker, “Deakin has an on-line catalogue system, which provides circulation information. When the student makes a telephone inquiry, the librarian can access the catalogue, confirm that the requested titles are available or on loan; and place reservations as necessary”.

New Zealand, a neighbour of Australia, is another country noted for high-level work on distance learning. Bockett, Marsden and Pitchforth (1997) supply information on the library provision in distance education (usually referred to as extramural courses) at Massey University. They declared that from the outset it was recognised that extramural students would need additional reading material to supplement that provided in the study guides. A postal library operation was therefore established and this has continually grown in both “the range of services offered and the scale of the operation”. The philosophy underlying this was to give extramural students access to library services as near as possible to those enjoyed by internal students.

They maintain that apart from holding copies of all books recommended in the students’ study guides and made available to distance learners, distance learners of the university could also utilise the inter-library loan service. The library also ensures that these students benefit from a well-established programme of library instruction, which enables them to acquire library research skills and make good use of the library. Bockett, Marsden and Pitchforth listed the following services, which the students could also request.

- The loan of a specific book, usually one referred to (recommended for further reading) in their study guide. Books are delivered by courier, and issued for a period of three weeks.
- A photocopy of a specific journal article or single chapter of a book. (The student is allowed to keep the article, but copyright regulations are observed.)
- A photocopy of past examination papers for their course.
- Information/material on a particular subject. Library staff supply either a selection of books and/or articles, or a bibliography from which the students can select.

Charles Sturt University (CSU) is another major provider of distance education in Australasia. CSU is a medium-sized Australia university with a dual mode system of operation. Writing on what they called “overcoming the tyranny of distance”, Meacham and Macpherson (1997) reported that the “library has an integrated, computerised system, which supports acquisitions, catalogues and loans”. According to them the following services are provided for distance education students by their library:

- Loans: Most materials can be borrowed for two weeks with only one renewal;
- Returns: While the University pays forward mailing costs, students pay for return of items;
- Photocopies: Efforts are made to ensure that requests for photocopies comply with Australian copyright legislation. While no charge is made for photocopies supplied by mail, charges may be made for large amounts or for facsimile transmission;
- Information and reference services: Literature searches providing lists of citations are provided to enable students to access materials in the university or other libraries;
- Contact: Students can request library services by phone, facsimile, post or E-mail. Toll-free phones and after-hours answering facilities are provided;
- Use of other libraries: All tertiary institutions in Australia allow use of the collections within their library and a high proportion enrolls distance

education students as reciprocal borrowers. It is said that students may also register at a variety of public and even private libraries.

- Reciprocal arrangements: Three university libraries which offer distance support (CSU, South Australia and Deakin) are on agreed terms to extend reciprocal access to remote students and not just to those able to make personal library visits. Periodical articles, if not available at the home library, are supplied directly to the student from another participating library.

Solomon (1997) also shared the experience of the library services to distance learners of the University of Otago - the oldest university in New Zealand. Quoting from the work of Tate (1993), Solomon praised the system of distance learning in New Zealand when he declared that distance education institutions in New Zealand form “one of the most comprehensive, experienced and efficient systems in the world”. In order to support this assertion in relation to library and information services, Solomon stated that the university takes the stance that “students at a distance have full and equal right to access the more than 1.35 million volumes held in the various libraries located on the campus”. He maintains that this philosophy of maximising library facilities to off-campus students does not stop at books, but also includes access to journals – both abstracts and articles as well as “recourse to a powerful national interlending network”. In spite of the steps taken to provide service to distance learners, Solomon does acknowledge that inequities do exist.

Lee (1999) gave an insight on the Social Work Library of the University of Washington (UW) that was to provide library services to the distance learners of the School of Social Work at the university. This school was one of the few departments selected to develop a distance-learning programme for its university in 1995. Lee indicated that “the library had few local models to guide its planning of library services”. She maintained that “within the UW system, services to distance learners were limited, irregular, or one-time only”. Declaring her belief in what the role of the library should be, Lee stated that the

“library not only had to identify the needs of faculty and students but also had to promote and inform its users of the kinds of materials and services that were available”.

In her detailed account of the role of the library she suggested that the Social Work Library was involved in all stages of the distance-learning project – even from the beginning. According to her, “the library planned research assignments with instructors, obtained and delivered course materials, set up policies and procedures for various services (e.g. document delivery), made site visits to the distance learning facility, trained and instructed staff and students, provided reference and consultation, and assessed service outcomes”. She disclosed that there was also “the behind-the-scenes work of processing and handling library materials, which required that new policies and procedures be established for library acquisition, cataloguing, circulation, displaying materials online and handling materials off-site”.

Four main library and information services were identified as critical in supporting a distance-learning programme: According to Lee these include:

- Establishing a collection of materials
- Providing document services
- Teaching about library resources and technology
- Answering reference and information questions.

She observed the concerted effort put into setting up services for distance learners and made the notable remark that “rarely do classes on-campus receive that kind of special attention”. She added that, “at times, the cost to the library seemed to outweigh the benefits to distance students, particularly when it cut into a library budget that could be earmarked to services on-campus”.

Heller-Ross (1999) supports other authors in advocating that distance-learning students require access to the full range of library services; from reference assistance and bibliographic instruction to inter-library loan, course reserves, circulation, and

information network connections. She recounted her experience as a distance librarian in the Plattsburgh University of New York State, USA where she is employed to provide library support for the Telenursing Education Program. She believes that the library must make provision for a librarian instructor to work together with the teaching faculty and offer course-related instruction, whether in the teleconferencing class session or as a video or World Wide Web pages. According to her, “librarians and computing professionals must collaborate to allow remote access to the catalog and research databases”.

In providing library services to distance learners in her university, Heller-Ross posits that access is provided via an expansive array of electronic and print resources. These, among others, include “OCLC's FirstSearch databases, CARL Uncover, SilverPlatter's CINAHL and ERIC databases, subject specific Internet resource pages, and all of the Feinberg Library's books, journals, and government documents”. In order to train the students in basic information skills, she maintained that, “information literacy instruction and assistance is provided through librarian site visits, a one-credit library research course, a printed student guide to library services, in-class demonstrations and research tips, and telephone and e-mail reference services”.

A well-known distance education institution in the continent of Africa is the University of South Africa (UNISA). This institution, running a single mode system, has become one of the few mega-universities in the world, providing tuition to more than 120,000 students. In describing the operation of the library in UNISA, Behrens and Grobler (1997) pointed out that the use of the latest information technology is the order of the day at the UNISA library. They declared that the “entire collection can be accessed through an on-line public access catalogue (OPAC) system from any computer connected to the Internet in the world”. Terminals are said to be located in the main library and the branch libraries. These terminals “are supported by a Local Area Network of over 40 databases on CD-ROM and online access to various bibliographic services such as the local SABINET (South African Bibliographic and Information Network) and Dialog”.

Apart from the colossal collection at the main campus, smaller collections are maintained in branch libraries at the regional offices. Behrens and Grobler indicate that students access these collections either by personal visits to one of the UNISA libraries or have the library materials posted to them. They state that students can forward requests by post, fax, telex, by leaving a message on the voice mail or by means of videotext – a service that facilitates communication between staff and students of UNISA.

Realising that only a small percentage of the contents of some books are relevant for some courses, Behrens and Grobler stated that, “books of readings, consisting of periodical articles (or sections from books) are prepared by the library”. Before embarking on this preparation, they noted that “copyright permission for reproduction (with royalty agreements) is obtained from publishers and the relevant items for a particular course are bound together in one volume”. They then disclosed that, “this volume is used in the normal fashion as recommended books for that course”.

Brophy (1997) has provided an account of the implementation of a model in the United Kingdom. The model’s requirements “are the human skills: enthusiasm, commitment, the ability to communicate clearly and vision to create the library of the future”. Among such things that those with skills would perform are writing web pages in HTML and network trouble shooting. According to him, the implementation of the model started with the launch early in 1997 of what was described as the “Virtual Academic Library of the North West (VALNOW)”. He stated that VALNOW was “located at the University of Central Lancashire, but serving users across the whole of northwest England”. With over 20,000 students, library and learning resources services “are delivered through a total of nineteen service points in northwest England” combining traditional delivery with electronic library services. In a report based on a European Commission funded study called “Libraries without walls” Brophy wrote, “VALNOW delivers materials, offers videoconference sessions with subject experts, provides access to remote and local datasets--all through a cooperative network involving librarians from a dozen different institutions”.

A Christian College in Kissimmee, Florida runs a distance education programme to train people for Christian service. Jones (1999) discussed the steps taken by Florida Christian College (FCC) to ensure that appropriate library services were available to meet the needs of the distance learners of the Christian College. The steps, according to Jones, include the following:

- Efforts were made to ensure that some relevant stocks were maintained in satellite libraries. Besides, requests for additional materials were sent to these libraries from the main library.
- Mutual arrangements were made with local libraries to ensure that borrowing privileges were offered to students.
- It was possible to link up to the databases of other useful websites like OCLC and ILL from the Webpage of FCC Library and carry out on-line searching. It was also possible for students to do on-line searching of some other full-text databases from the link provided in the FCC Library website.
- Provision of E-mail, fax, and telephone reference services was also made.
- Students who had to travel 20 miles and above to attend classes were given individual service, which included special instruction on how to effectively use the library website.
- Handouts providing useful information on contact telephone numbers, website addresses of FCC and the Library, as well as instructions on the effective use of library services were given to off-campus students.

With the benefit of hindsight, Jones observed that distance education presents many challenges to the library, and she had advice to offer librarians, stating that “with flexibility and creativity, however, librarians can help move their institutions to a new level of service to the students and communities they serve”.

Whilst discussing the planning process used in implementing library services at East Tennessee State University (ETSU) in the United States, Canepi (1999) explained that the process involved was slow and gradual. Hence she described it as “evolution not

revolution”. As someone charged with the responsibility for creating a plan for library services to off-campus students of the university, she noted three factors that were considered in creating the plan.

First, she needed to know something about the students in Bristol – one of the cities to be served. She found out that more than 40% of the students were over 25 (that is “adult students”), most of whom worked full-time. Second, she considered the array of programmes being offered. She believed that “focussing on specific parts of the curriculum would help identify needed resources”. The third factor was the identification of the greatest needs, which she noted would help in setting priorities. Based on the information she collected from the students, “their primary needs were access to information, convenience (i.e. “Can I get it here?”), and individual assistance, both with using the technology and identifying resources”.

The strategy Canepi adopted was cooperation: “cooperation with the main library, cooperation with other off-campus services, cooperation with other libraries and cooperation with innovators”. In seeking cooperation with the main library, she noted that “anyone working alone to establish library services off-campus needs the cooperation and support of the main library staff. She reminded readers that, “one person assigned to off-campus library services cannot be everything to everyone”. In seeking cooperation with other institution’s non-library service providers, she observed that many departments were also struggling with the same kind of issues as the Library. She, therefore, advocated that various departments could “come to agreements on ways to meet our common needs, such as regular courier service between the sites and more visibility for off-campus services”.

On the issue of cooperation with other local libraries, she believed this was also important. She argued that cooperation among libraries would be beneficial, and that the cooperating libraries stand to benefit from one another. In establishing the cooperation she hastens to add that there should be a memorandum of agreement between two institutions. In the case of ETSU and the Bristol Public Library, the agreement “included

a nominal monetary compensation of fifty dollars paid by ETSU to the Bristol Public Library (a sum that has been negotiated many years prior)". With regard to seeking cooperation with the innovators, she suggested that, "sometimes the innovators, working independently, do things that impact on you, of which you need to be aware". She gave an instance in her own case when "a group of technologically-sophisticated individuals on campus, working with the Distance Education Department, started meeting to plan Internet courses". She was alerted to this and her participation in the meetings "allowed the group to include planning for library support right from the beginning".

2.4 APPLICATION OF ICT IN LIBRARY SYSTEMS

It has been established that the nature of distance education in general prevents the students from visiting their university library, speaking with their lecturers or tutors, enjoying direct consultation with the library staff or holding regular and sustained discussions with fellow students. Appleton (1997) in her account of how to reach the remote student regretted that "remote students cannot browse the academic collections of their university and they are unable to make personal selections from the library materials held by their university". Her concern was that the remote students "are forced to rely on others to make decisions on several aspects of their use of the library and information materials". She came to the conclusion that one of the effective strategies to counteract the difficulties is the development and use of electronic library services. These services have been made possible by means of modern information and communication technology.

The advent and application of information and communication technology (ICT) within the past decade has irrevocably heralded some radical changes in educational patterns all over the world. It has created a new dimension in the orientation of all distance education providers, be it the tutors or teachers of distance learners as well as the librarians and libraries of distance teaching institutions. It is, therefore, no wonder that the converging technologies, the rapid development and widespread acceptance of the Internet, and the application of the World Wide Web in education have created an indelible impression in

the development of distance education programmes in the last decade. They have also revolutionised the dispensation of library and information services within the same period.

In presenting a paper during the celebration of ten years of the Commonwealth of Learning (COL), the Vice chancellor of the Open University, John Daniel (1999) declared that, “the hot technologies have changed”. Recounting his experience, he recalled with nostalgia that, “when COL was born the satellite star was in the ascendant”. He went on to remark that “today, if you are not living and breathing the Web you are a technological cave dweller”. Going further down his memory lane, Daniel noted that, “three years ago, in the United States at least, distance learning meant videoconferencing. Today in the United States at least, distance learning means the Web”. He then regretted that there was a problem since the vast majority of the population of the Commonwealth had never engaged personally with either videoconferencing or the Web.

As Daniel observed in 1999, perhaps there has not been any significant change today in the Commonwealth, particularly in Africa. Thus, as if in sympathy with the regrets expressed by John Daniel, Anikulapo (2001) citing a group called Technological Forum at a recently concluded fifth Pan African Historical Theatre Festival (PANAFEST) in Cape Coast, Ghana, deplored the “lack of enthusiasm for technological development of the continent among the leaders”. The group, he said, noted that the absence of concern about information technology (IT), “particularly among the leadership has been identified as portending danger to the development of the continent”. They therefore counselled that “if Africa is to remain relevant in a world that is increasingly dismantling all barriers, its leaders must rethink and place a premium on how to address the dearth of knowledge of information technology”.

In focussing on the application of IT to, and its usefulness in, the library environment, Kanjilil (1997) perceived each new technological development that takes place as having an impact on libraries and information services. IT, he asserted, has affected most of the routine operations of the library and information services such as circulation and

cataloguing. He noted the advantages of IT in a library, and these according to him include “a reduction in time required to carry out routine tasks; the opportunity to improve record keeping procedures and ability to link intra- and inter-library activities in an unprecedented way”. He also reiterated the fact that “IT enables the integrative nature of library services to be actualised, thus eliminating the need for traditional departments such as acquisitions and cataloguing as it allows these activities to be executed from the same workstation”.

Watson (1998) in her account of the expanded use of technology to provide distance library services maintained that the convergence of technology and communications offers distance education institutions an array of options to deliver library and information services. She stated that the expanded use and role of technology in the delivery of library and information services has served to reduce the barriers to library and information services that are occasioned by distance for these students. She argued that in order to take library services to distance learners many libraries in these institutions have placed most of their services on-line. According to her, “the digitization of information makes it possible to take library and information services to distance students regardless of their location”. She contended that in addition to on-line catalogues (OPACs), students are able to search databases, examine abstracts and in some instances read full text documents. She concluded that, “some of these networked services also include non-print resources in their information databases”.

In her own submission, Heller-Ross (1999) observed that, “the new electronic information environment is pushing many libraries to re-think their services and re-engineer their organizations”. She gave details of how libraries are collaborating with computing and technology centres to facilitate the use of information and technology at their institutions. She argued that, “distance-learning programs may provide opportunities for institutions to grow and for librarians to broaden their role in the teaching/learning process... and that “electronic resources seem to have enticed more students and faculty into the library's virtual spaces, where they are demanding virtual service and instruction”. She was emphatic in disclosing that on-line courses are offered to both on-

campus and distance learning students, with on-campus faculty creating World Wide Web pages with course materials, and that e-mail is ubiquitous. With the advantages of technology in library she posited that, “the lines between on- and off-campus students and courses are indeed getting blurred as technology is incorporated into all aspects of education”. She, therefore, argued that, “in this environment it makes sense to take advantage of this blurring and melding to improve library services for all students and faculty”.

It should be noted that prior to the evolution of ICT, the option normally available for the distance learners was to go to a public or an academic library in order to obtain the information they needed. Today it is no longer problematic for students from distant places to gain access to information, as long as there is a computer, a telephone line and a modem available. It is, therefore, possible for students to obtain most of the information they need through on-line access to catalogues and other electronic databases via the Internet. These tremendous possibilities have prompted Barnard (1999) to suggest that, “because of the technological advancements, academic libraries have seen a distinct shift in the way that much of their information has been made available over the past few years”. On the fate of reference sources, he maintained that, “journal indexes, encyclopaedias, and many other databases have become virtually extinct in print form with the proliferation of digital resources”. Barnard argued that “even these digital media have quickly moved from stand-alone CD-ROMs to local area networks within libraries, then to campus-wide area networks, and finally to World Wide Web sites on the Internet”. He concluded by declaring that, “with the advent of these information media has come the ability to provide more library services to distant students, while minimising the need for travel to a campus library”.

It is generally recognised that the application of ICT cuts across both the developing and the developed worlds. It is, however, obvious that the rate of deployment of the new technologies is much slower in developing countries. This was confirmed in the observation of Cavanagh and Tucker (1997) when they noted that in advanced countries emphasis on the provision of services to distance students is turning increasingly towards

electronic access to libraries and their resources. This, they maintained, starts with “the use of electronic mail and dial-in access to university and college catalogues to place orders for materials”. They stated that this is complemented by access to on-line subject specific databases, CD-ROM networks, and the vast array of resources available through the Internet, as well as by access to full text databases and journals. The use of IT in the library environment, particularly in the developed world, will be dealt with below.

In general, it is obvious that the last decade has witnessed dramatic transformation in education, culminating in the evolution of virtual universities made possible with the advent and application of these technological devices. Stallings (1997) gave an account of the virtual University of Phoenix, which is said to have an enrolment of approximately 55,000 students most of whom are working adults. They have no physical library collection, so all their library services are offered on-line, or through document delivery. The University is said to have claimed that its on-line library collection provides access to millions of articles from nearly 4,000 journals. In addition, a free bibliographical search service is available, although there is a charge for delivery.

At the University of Washington, where the School of Social Work was chosen as a ‘guinea pig’ department to run distance education, computer terminals were installed in places called public access areas for students to access e-mail accounts and library resources. Also, library rooms and facilities were used for telephone conferencing, group meetings, and videotape viewing (Lee, 1999). In order to facilitate giving a human face to the seemingly faceless learning mode, and perhaps to allay the possibility of technophobia, Lee reported that two days of orientation were arranged for students. During this period, instruction focused on using the computer and locating library resources. Topics covered, according to Lee, included “logging-in to the computer, using email, searching computer databases, requesting documents, and accessing reserve materials including accessing to library resources from home (connecting and installing software)”. A library information packet was produced and handed out to students and library staff for reference and referral.

One of the lessons learnt from the experience of Lee is that the libraries of distance learning institutions need to move toward the direction of electronic formats for many of its resources. This movement includes “increase online databases and full-text resources, develop electronic reserves, and design web pages for academic courses (e.g., course syllabi, readings, etc.). She counselled that the library should work with the computing offices to appraise student computer needs and site accessibility. She advised that “ideally, computer labs with sufficient numbers of computers should be made available to distance learners at the outset of any program”.

With the help of modern technology, Heller-Ross (1999) also suggested that distance-learning faculty and students search the same library catalogues and journal indexes from their home computers or distance site libraries, as do on-campus students. Drawing a comparison, she wrote, “but where on-campus students must come to the library to retrieve and check out books, and make their own photocopies from journals and reference books, distance-learning students are provided with photocopies and book loans that are mailed to their homes”. Heller-Ross stated that distance-learning students should identify themselves when calling or e-mailing for assistance, so that Feinberg Library staff, when dealing with their requests, will ensure rapid delivery of needed resources. She had some advice for library staff: “Staff need to take extra steps to fulfil the promise of equivalent library services for student academic research”. Drawing examples from what obtained in her library, she noted that “since delivery time will add a few days to Interlibrary Loan (ILL) requests, the ILL staff instituted a policy of requesting that DOCLINE lending libraries or document suppliers mail photocopies directly to students whenever possible”. This policy, according to Heller-Ross, reduced turnaround time by an average of four days and was easily implemented.

Meacham and Macpherson (1997) also reported that a number of Australian university libraries provide on-line access to catalogues of their own and other universities for distance students who have access to a compatible personal computer and a modem. Also writing about information technology and library access to off-campus students in Australia, Marie-Therese (1997) noted that, “there is an array of technology-based

information services that can overcome the perception of tyranny of distance and lack of immediate access to library resources and services”.

Electronic mail or the e-mail system is seen as a considerably cheaper IT instrument capable of breaking the tyranny of distance between distance learners and their universities, and indeed between the learner and the library/librarian. Cuskelly and Gregor (1993) did an evaluation of e-mail and found that it gave increased opportunities for quicker and more frequent feedback to students’ queries. It was also observed that, “E-mail reduced the feeling of isolation experienced by many distance education students”. E-mail was also found to provide additional social dimensions to the learning context.

In their search to bridge the gap between distance students and their university libraries, some Australian universities adopt the use of e-mail. Marie-Therese (1997) reports that Deakin, Edith Cowan and Monash, to differing degrees, have introduced something akin to a simplified, student focussed Internet. This, she wrote, “enables off-campus students to interrogate not only on-line databases, but also allows them to use electronic mail and bulletin boards to quickly and effectively communicate with, and obtain services from lecturers and library staff”. She further maintained that through electronic mail, students can ask for a range of information and services, and that for library staff electronic facilities both “speed up response time in reacting to student demands and provide an efficient electronic conduit to answer queries”.

Appleton (1997) gave details of the test on the provision of electronic access and delivery of information to remote postgraduate distance education students at the University of Central Queensland over an 11-week period. She disclosed that students were instructed on how to use the library’s e-mail system and were given access to it. She also reported that dial-up access to CD-ROMs, the library’s catalogue and external networks was also made possible. She suggested that, “articles requested during the trial period were scanned and sent to students’ E-mail boxes”. The results indicated that students were

prepared to use electronic communication, but that they are easily frustrated if they cannot connect quickly.

At this juncture, it is important to sound a note of warning pertaining to the apparent advantages of technology in curtailing the distance between distance learners and their institutions. It must be remembered that accessibility to technology is not universal, nor is the use of the systems on the same level globally. Earlier we mentioned the observation of John Daniel, a veteran in distance education. He observed that distance learning of three years ago in the United States was far different from distance education of today. He said that distance education of the time past in the U.S.A. was videoconferencing, but recently, it is the Web. John Daniel's lamentation was that majority of people had no experience of either videoconferencing or the Web.

Anikulapo (2001) cited Danqua, the head of a computer literacy and distance-learning programme in Ghana, recounting the technological disparity between the US (a developed country) and African countries (the developing world). He declared, "while Africa accounts for 12 percent of world population, it has less than one percent of Internet users, America which accounts for less than 10 percent of the world population, has 50 percent of Internet users". He then asked, "How can we expect our people to compete with the American people; or our children to compete with an average American child?"

The contrast in the technological application and diffusion between the developing and developed world has prompted authors like Watson (1997), and Cavanagh (1997) to sound a cautionary note that total reliance on technology, particularly in the developing world will cause some distance students to experience "information disenfranchisement". While also noting that the emerging developments in information technology that relate to library provision have the potential for greatly increased access, Meacham and Macpherson (1997) concurred that there is a danger that less wealthy students of the universities will be denied access to information. On a wider scale, they fear, that members of whole societies and even countries will be denied access to information if a

prerequisite is the financial capacity to purchase a computer. It was this fear that caused Adams (1998) to state that “one concern that I have personally for the future of off-campus library services involves the drift towards [the] increasing disparity between the technology-rich and poor”. Meacham and Macpherson noted that the use of such systems requires students to make an individual investment in a personal computer, and pay the telephone charge for access to the university.

In the light of the above, it is suggested that while technology can be used to bridge distances and reduce the entire world into a global village, it can also be seen as an instrument that can increase the yawning gap between the “haves” and “have nots”. Watson has therefore urged librarians and others to integrate other modalities of communication and service delivery to ensure that all distance students have access to information services for their studies. She noted that this is particularly important in developing countries where distance education is a potential channel for expanding educational opportunities, but where access to technology is extremely limited and confined largely to large urban areas and to those who have the financial means to purchase technological and communication services.

2.5 THE ROLE OF THE LIBRARY IN DISTANCE EDUCATION

In Chapter 1 we summarised the most commonly used models in distance education citing their traits and, or characteristics. The literature giving the views of authors, and some case studies of how library services were provided in some notable institutions where distance learning or off-campus programmes take place, has been examined. At this juncture attention will be given to how the library should perform its role and service to the distance learners from a holistic perspective. In the discussion the ways in which the library and information services could provide for distance learners, and the suitability of the methods to the models will also be considered.

The philosophy of education of any institution usually constitutes the framework under which its library operates. Once such institutional philosophy is clearly expressed, all the

stakeholders - including the library - work towards meeting the goal. A student-centred philosophy will ensure that adequate attention and support is given to the student irrespective of whether s/he is on-campus or off-campus. Brown (1985) gave credence to this when he asserted that, “the role of the library within a College or University can be understood only in the context of the institution’s philosophy of education”.

Generally, library support is an obligation that an institution takes on when it begins extension courses as in distance education. In performing the expected role, the library must take cognisance of some of the distinctive features of a distance education programme. The most distinctive characteristic of such a programme is the geographic dispersion of the students. As against practice in the traditional classroom setting, the students rarely come together as a group in the same location. Often, many kilometres separate students taking the same course. Relevant to the above is the fact that distance education programmes have appeal to learners not only in urban centres, but also in rural and non-metropolitan areas where library services would also be needed. Furthermore, the learners are usually adults and busy people, often with many occupational, domestic and social responsibilities. They prefer to pace their study in the light of their normal activities and restrictions.

Even with the above in view, the demands of equity and fair play, particularly in a dual mode system, requires that timely access to reading materials should be given to all students pursuing the same course at the same time. It remains to say that if distance education or off-campus students are unable to access library facilities they are disadvantaged.

There is no gainsaying the fact that the quality of any academic programme can only be enhanced when adequate library facilities are accessible. The features of an institution’s distance education programme are such that its library should develop specialised strategies to enable the scattered and busy students enrolled to have access to library facilities. Taking the above into consideration, the question now is how can library services be effectively provided and implemented for distance education programmes?

2.5.1 GOOD WORKING RELATIONSHIP WITH DELIVERING AGENCY

Perhaps, we should begin by saying that the library would be greatly assisted if the delivering agency (the DEU in the case of the University of Botswana) would see the library (UBL) as a close partner in pursuing the goal of taking the university to the community. This means adopting Canepi's (1999) strategy of cooperation with other off-campus services discussed above. The library must not be seen as an isolated entity but as part of a complete whole. In any case, the provision of a distance education should exemplify team-work. If it is team-work the library must be seen as an active team member. This collaboration involves the establishment of a good working relationship, even at the planning stage, between the library and the project team, the course specialists and the delivering agency.

Davidson (1999) demonstrated the need for close collaboration between the library and the faculty when she stated: "You need to know the faculty teaching those classes. These folks are your (librarian's) key to successfully serving your off-campus students". Irrespective of the model in place, it is necessary to determine such things as the library needs of the user; the library facilities available; the likely number of students in each course of study; where the students are located, working or living; and materials to be included in the course package for further reading. The librarian needs to have foreknowledge of the assignments to be done and the deadlines for submitting them. For instance, the advantage of foreknowledge would enable librarians to adequately prepare themselves to deal with students' enquiries. They could then collect the relevant materials/information on the topics prior to the time they are needed, and produce enough copies of the materials so that they could be sent out to students as soon as requests are made. The implication of this is that the librarians need to be involved with the curriculum developers during the preparation of the modules or course materials so that there is full knowledge of what is expected. An illustration given by an author would probably be required here to illustrate specific reasons for the need for advance knowledge and, or expected demand. He claimed that a librarian would be uncomfortable

if there was insufficient information to deal with requests from possibly 150 distance education students who are faced with a deadline of two weeks. The library's outreach services can only operate effectively when expected demands are known.

When proper interaction is established the librarian could, during the course or module preparation, give bibliographic assistance to subject specialists and course writers. Help could be given in conducting literature searches in subject areas and in selecting articles for required and supplementary reading that may be included in the course package. Obviously the establishment of a good working relationship with the library, and involving it in assembling course packages for distance education students could save the delivering agency both time and money.

2.5.2 RANGE OF LIBRARY SERVICES TO OPEN AND DISTANCE LEARNERS

The peculiar nature of a distance education programme requires that specialised library services be provided for the students. It has been established through the literature reviewed above that the range of services which the library can offer to distance learners, irrespective of the model put in place, include such services as the production and distribution of leaflets describing library services, and dealing with telephone catalogue enquiries and telephone reservations. Others are renewals by telephone, a 24-hour answer phone and a freephone as practised in some institutions in advanced countries of the world. Services may also include responding to fax queries, granting longer loan periods or renewals (where affordable), undertaking literature searches requested from a distance, and photocopying and sending articles by post.

For the convenience of distance education students, it is imperative that a telephone with an answering machine be installed in the library for the use of these students. This service should operate twenty-four hours a day. Indeed, an answering machine is necessary to take calls and record information and requests. Johnson (1984) is one of a number of authors who has highlighted the importance of the telephone to off-campus students. He

maintained that the telephone serves as a connecting bridge between the distance learners and the library. It could also serve as an alternative for the students who may not be able to come into the library and select their material. There are many examples of institutions where a toll free telephone line is installed for the use of distance education students. It is the belief of the author that all delivery models require a telephone service in the library.

2.5.2.1 Contractual arrangement/Collaboration with other libraries

In view of the geographic spread of distance education students, the use of regional centres is a common feature of external programmes. Branch libraries could be established in these centres. But, for obvious reasons, it is not always possible to provide extensive library facilities in all of them. In order to cater for such disadvantaged areas, there is a critical need for the library of the institution delivering a distance programme to maintain formal relationships and collaborate with other libraries. Davidson (1999) advises that librarians need to know which libraries are available to students, where they are located and what resources they have. Such libraries could be public libraries, education centre libraries, college libraries or other academic libraries in regional centres or elsewhere in the country. Forging formal relationships with other libraries would enable them to assist distance learners in whatever way they could. Davidson suggested that the most important thing that could be done is “get in touch with your victim libraries, especially those in areas where your off campus students are concentrated; talk with the local librarians and explain your programs in their area and your desire to support those programs without becoming a burden on them”. She stressed that a formal operating agreement should be drawn. Jones (1999) also indicated that one of the six pillars on which his library provision for distance learners is based is that “a local library is contacted to make arrangements for reciprocal borrowing privileges for extension site students”. Thus, among other things, students can channel requests to their institution libraries through these other libraries. Furthermore inter-library loans could also be put in place for the sake of the learners.

It can be seen from the above examples that collaboration empowers groups of individuals or organisations to pool their resources, to share them and thereby assist one another. This approach would particularly assist scattered distance learners as they would be able to obtain needed information and assistance, not only from their institution's library, but from other libraries as well. Collaboration among libraries is aimed at sharing resources and enhancing the quality of learner support services in distance education.

2.5.2.2 Mobile/Travelling library

Another way of bringing library and information services brought to the doorstep of distance education students is through a system of travelling or mobile libraries or bookmobiles. Meadows (2001) gave an account of such operations and commented that, "rural bookmobile staff park at a wide variety of sites while on the road". According to Meadows, "the most common sites in a town or village are churches, grocery or general stores, schools and post offices". She added that "outside the towns or villages, main cross roads, rural schools, country churches and individual homes are the most used sites for setting up a bookmobile stop". Travelling libraries can thus be seen as a resource for readers in remote villages, hamlets and other rural areas (Gunter, 1985). It has been observed that distance education programmes appeal to people in rural and non-metropolitan areas. Students can be informed well ahead of time of the schedule when books are taken in vans to various places in the remote areas where distance education students are based. Grunenwald (1987) provides five critical variables that a bookmobile operator needs to consider. Four of these variables, which are pertinent, are as follows: product selection; selection of the stops and the time of the day the bookmobile will be there; facility management that ensures that vehicles are dependable; and promotion of the service. It is important for a library operating a mobile service for distance learners to pay special attention to these factors if an effective performance is to be achieved.

2.5.2.3 Book box system

Another library service that can be applied to the advantage of distance education students is the provision of a collection of books for each course, otherwise known as the "book-box". If the establishment of a permanent library is not feasible at all the regional centres, arrangements can be made for a collection of books to be left there for the use of students in the vicinity. Sending books in boxes has been described by Wilgus (1987) as "an adaptation of the English tradition of travelling libraries, a resource to readers in remote villages and hamlets". Students may borrow from this collection, which is retained at these centres for the duration of the course. Usually, not only relevant books are provided, but a wide range of learning materials like records, tapes, video-cassettes and maps are also supplied. Care has to be taken to ensure that the required books are made available at the time they are needed.

It is important to note that deposit collections or the book-box system has generated some controversy. The arguments against the system are that "the provision of a relatively narrow range of texts is capable of inhibiting students from exploring their subjects fully through the breadth of materials available in a library. Secondly, that the amount of use of such collections is relatively low" (Drodge, 1984). On the other hand, the arguments in favour of the system are that "most of the materials in these collections are usually not readily available in either bookshops or in public libraries, and that the system meets the resource requirements which would otherwise go unmet". It is a premise of this study that the system would go a long way in meeting the minimum information needs of distance education students.

2.5.2.4 User education and information study skills

In order to equip students to be able to make effective use of the library resources, Library Use Education is necessary. ACRL (2000) has recommended the teaching of ILS to distance learners. As demonstrated in the characteristics of the models discussed earlier, it should be borne in mind that distance learners come from different educational backgrounds. Some may have had only a primary or secondary school education in which

there was no serious training on how to use library facilities. As a result, except for the challenge model where the targets are mainly postgraduate students, library use education or an information literacy skills programme would be required in other models.

The resource based learning/flexi-study model targets adult secondary students or adult tertiary students. The supervised study-group model has out-of-school young adults and adolescents as its targets. The in-school media enrichment model focuses on the in-university students. The educational background of each of these categories of students is generally insufficient for them to know how library and information centres operate. They would need the incorporation of an information study skill programme in their studies whereby they would learn to make the most of ICT and other facilities. It must also be appreciated that modern day libraries are assisted by computerisation, unlike the manual practices previously used.

Even in cases where distance learners are still working in school environments, training or retraining in library use and information literacy skills is still required. There are many reasons why this is necessary. First is the fact that new information and communication technology is now used in many libraries and most students, particularly those in the developing world, are not familiar with current developments in the modern library. Even when they have good educational backgrounds prior to enrolling for further education by distance mode, this does not guarantee that they had exposure to computers in their school days.

Second, experience has shown that not many students, after leaving school, continue to read books or use libraries. A study conducted by the CCE of the University of Botswana of its potential students for the distance education programme revealed that a clear majority of deputy headmasters had, over the previous four years, not bought a single book for the past four years, or read a book, or even visited a library. They were not even members of the Botswana National Library Service from which they could obtain reading materials at no cost. Yet these are some of the people expected to be students of distance education. This study should convince the stakeholders involved in this programme that a

library use education and information literacy skills course is essential for the success of quality distance education programmes.

A number of authors including Watson (1997), Cavanagh (1994), Caballero (1998), Slade (1997) and Lee (1999) have made submissions on library use education or bibliographic instruction in distance learning. Slade (1997), for instance, placed emphasis on “the provision of instruction on how to conduct effective searches of electronic products”. Lee (1999) stated that her library “provided useful library instructions to students and gave hands-on demonstrations” She added that, “instruction focussed on using the computer and locating library resources”. According to Lee, “topics covered logging-in to the computer, using email, searching computer databases, requesting documents and accessing reserve materials”. In her suggestions on bibliographic instruction to distance learners, Watson (1997) wrote that “visits to remote sites by professional librarians are sometimes used to provide bibliographic instruction”. The library, with the cooperation of the delivering agency, should therefore develop necessary strategies, not only to get distance education students acquainted with the operations of the library, but also to ensure that they acquire life long information skills.

2.5.2.5 WWW and the Internet

The World Wide Web (WWW) is an extensive technology with a vast network of connected computers. WWW-based learning activities can be considered as activities where information is sought and accessed across the network. As an interactive and communication technology, WWW offers facilities for information storage and easy delivery. Perhaps this last function makes it an invaluable tool in the effective operation of open and distance education. Lehnert (1999) confirmed this when he wrote that, “until the early 1990s, the Internet was used by scientists and academics pursuing long-distance collaborations and scholarly research”. After suggesting that the real force that shapes the Internet are the people who use it, Lehnert observed that, “today’s Internet is a global assemblage of over 40 million computers in rapid intercommunication”. He explained

that an estimated 150 million people are active Internet users worldwide operating “as either information consumers or information providers”.

The role of the technological medium in open learning and distance education cannot therefore be overemphasised. The interpersonal communication existing between teacher and student in the traditional system has to be replaced by some form of mechanical or electronic means of communication in distance education. Hitherto the dominant means of communication highlighted by authors like Keegan (1996) and Holmberg (1989) were print, audio, video, telephone and broadcasting. The recent advent of WWW, with its diverse features, has universally added a new and profound dimension to the provision of open and distance education. Among the features of the WWW that makes its application indispensable to the providers of open and distance education are:

2.5.2.5.1 Information access

The key feature of the WWW documents that are primarily designed to carry information is that the materials and documents are usually electronic versions of existing paper-based information and courses. According to Oliver and Omari (1997) the reasons for delivering such materials via the WWW appear to derive mainly from:

- Information accessibility, whereby teachers could post information that could be accessed by students across many locations;
- Reducing printing, because teachers could provide electronic rather than printed documents for students;
- Information could be delivered in time, and teachers could post materials before lecture and workshop sessions for immediate access by students.

2.5.2.5.2 Interactive learning

In an interactive learning environment it is possible to provide a series of documents rather than a page for students to read. This is done through the use of hyperlinks

available on the WWW. Oliver and Omari (1997) have identified some of the various forms whereby interactive learning takes place. These include:

- Activities that require students to search and review documents and links in a structured and organised fashion in order to discover particular information;
- Presenting questions and activities that cause students to reflect and to select from among various outcomes. Feedback particular to the students' choices is provided and this influences subsequent directions and activities;
- Using forms, whereby students can select options to effect particular processing outcomes, such as database searching;
- Use of programme modules supported by the WWW that enable learner input to be processed and acted upon.

2.5.2.5.3 Networked communication

The WWW features and uses different forms of communication, which can be used in numerous ways in a student-centred learning environment. Some of these forms of communication are categorised below:

- E-mail enabling people to communicate directly with each other, and to send private or public messages to each other either in a one-to-one or one-to-many mode;
- Bulletin boards where information can be placed for the consumption of the public, and their reactions or remarks invited;
- Chat sessions involving real-time text-based discussions between parties either privately and. or in public.

It is, perhaps, unnecessary to state again that the WWW or the Internet is applicable in the library environment in virtually all the areas identified above, and can be used by distance learners. Just as education is taken to the doorstep of the students in distance education, so the library is taken to the homes of students. Thus, in order to make

information accessible to students and in a timely fashion, the feature of WWW information access would be very useful for a library.

Searching through the on-line public access catalogue of a library and the networked on-line catalogues to gain access to the catalogues of other institutions is a process that involves interactive learning. Typical examples of the latter include America's on-line computer library center (OCLC) as explained by Jones (1999) and the Southern Africa bibliographic network (SABINET) as in Southern Africa. The Internet/WWW-based computer mediated communication feature would be required by any library using electronic mail, and bulletin boards to communicate directly, either on a one-to-one and, or a one-to-many basis. Though the degree of use may differ, the library will require the application of the invaluable features of the WWW/Internet in the provision of adequate library and information services in all the models discussed above.

2.6 SUMMARY AND CONCLUSION

It has been established through the review of literature that the library plays a significant role in distance learning. It is a great deficiency if library and information services are not readily available for distance learners. These services provide many advantages and enhance the quality of distance education. The disadvantaged position of distance learners and the imperative need to make available library facilities to them have compelled some organisations to establish guidelines on library services for distance learners.

A number of institutions across the globe have attempted to cope with the difficulties faced in providing library and information services to the scattered students of distance education. The expanded use and role of technology in the delivery of library and information services, and how technology has served to reduce the barriers to making library and information services available to students and distance education programmes has been noted. Using these technologies could be of great use to any library, particularly

in developing countries, that may be planning the provision of library and information services to its students on distance education programmes.

In chapter 1, we dealt mainly with statement of the problem, objectives and hypotheses of the study. In this chapter (chapter 2) we conducted the review of the literature. Before discussing the results of this study, the research methodology shall be explained in some detail. Hence in the next chapter (chapter 3), the research methodology is discussed.

CHAPTER THREE

3 RESEARCH METHODOLOGY

3.1 BACKGROUND INFORMATION

It will be recalled that in Chapter 1, the statement of the problem, objectives and hypotheses of this dissertation, among others, were discussed. In this Chapter, the research methodology is explained.

In explaining the research methodology, it must be stressed that the University of Botswana Library (UBL) has a commitment to give support service to all academic programmes of the university, irrespective of the mode of delivery. In fact the mission of the UBL is to contribute to the University's endeavours in the advancement of learning and academic enquiry. It aims, among others, to:

- foster a caring and supportive environment in which service to customers is paramount,
- to efficiently process, preserve, provide access to and/or disseminate information available in-house or through international databases,
- to equip customers with the necessary skills which allow them to exploit the various information sources in support of present and future needs, and
- to respond speedily and appropriately to academic support needs and expectation of students and faculty.

Adapted from UB Calendar, 2000.

Since the distance learners are among paramount customers of the UBL, and knowing the nature of the distance education programme, what caring and supportive environment has been put in place for this group of library users? How have they been equipped to exploit

various information sources in support of their present and future needs? What has been the level of involvement of the UBL in the distance education delivery mode of the UB? How far have the goals set been met by the UBL in respect of the distance learners of the university? What degree of cooperation exists between the DEU and the library in the discharge of their various services to the distance learners of the university? The research methodology adopted is meant to throw a searchlight on these issues indicated above. Three groups of people were considered the major stakeholders affected by these questions and these three groups were approached during the course of this study. Their responses would, it was hoped, provide answers to these questions.

A two-pronged research method was adopted in order to do justice to this study.

3.2 STAGE 1: INFORMAL APPROACHES

The first stage of the investigation fell within the domain of **exploratory research**, and three approaches were involved. These comprised:

- a) Current journals, appropriate books, relevant proceedings of conferences, commissioned work and the Internet were consulted for relevant articles and information on:
- distance learning and library provision,
 - distance information and library services as practised in some institutions around the world, and
 - the application of information and communication technology (ICT) in library systems.

This exploration was intended to assemble secondary material to gain greater background knowledge and understanding of the subject.

b) A structured interview schedule was used to collect data. In conducting this interviews were arranged with:

- DEU staff who are the providers of distance education at the UB, and
- Library staff, who are directly in-charge of providing library and information services to the distance learners.

c) The empirical element of this research was conducted using a questionnaire. These were administered to

- Diploma in Primary Education (DPE) students, and
- Certificate in Adult Education (CAE) students.

The questionnaires to the DPE students were self administered, whereas they were mailed to the CAE students.

3.3 STAGE 2: PRIMARY RESEARCH DESIGN

The approach applied to this second stage depended on the knowledge derived from the informal research discussed above. The primary research design adopted was both descriptive and exploratory. Descriptive research, according to Gall, Borg and Gall (1996) “is a type of quantitative research that involves making careful descriptions of educational phenomena”. Ary, Jacobs and Razavieh’s (1990) description is relevant, as it looks more detailed. They maintained that descriptive research “describes and interprets what is. It is concerned with conditions or relationships that exists; practices that prevail; beliefs, points of view; or attitudes that are held; processes that are going on; effects that are being felt; or trends that are developing. Its major purpose is to tell what is”.

Our motive in this study was to obtain a picture of the practices that are prevalent in the attempt of the UBL to provide library and information services to distance learners of the UB. Mouton & Marais (1990) also declared that, “one of the most important considerations in descriptive studies is to collect accurate information or data on the

domain phenomena which are under investigation”. This consideration would be met as the involvement of the UBL in distance education programmes of the DEU is explored.

Referring to exploratory research, Wright and Crimp (2000) declared that “exploratory research is appropriate for asking questions of: customers – collecting information on needs and wants relevant to the research problem”. This exploratory stage provided the researcher with first hand information, and assisted in developing an intuitive grasp of what the aims and objectives of this study should be. At the same time this process helped to clarify the hypotheses used as a basis for the study.

3.4 SAMPLING PROCEDURE

It has been established that the main aim of this study was to carry out an investigation of the role and involvement of the library in the provision of distance education at the University of Botswana. It became necessary to choose a sample that ensured adequate representation of all the major role players in the constituencies involved.

Naturally, the study was focussed on the students, who are the primary users of the library. Therefore one of the groupings of subjects was the students, the distance learners of the university. Students who are directly involved in this mode of learning were in the best position to inform the researcher as to what their experiences have been. The distance learners were therefore the first targets. In addition, the outreach arm that is responsible for taking the University to the students is very important. The DEU is a major stakeholder and was therefore involved as the provider of distance education. Also important, and included as a group, were the librarians at the UBL because of their role and involvement in the provision of support services for distance education students.

The distance learners of the university fall into two categories, according to the programme on which they are enrolled, namely the DPE and CAE programmes. The latter is a two-year course and was the first programme to be established by the distance-learning mode at the UB. It came into existence in 1983. Adekanmbi (1998) wrote that “the intakes used to be admitted every two years”. Although this was later changed, the

CAE programme had, at the time of this study, the least number of students as the programme is in the process of being phased out. It has a total number of only eighteen students – all in their second and final year. No students were admitted this academic year.

The DPE programme was introduced two years ago. There are presently two intakes of students on the programme. The first and the second cohorts admitted each consisted of 600 students. The programme therefore currently has 1200 students on roll.

The scattered nature of distance learners and getting the students to complete the questionnaires was the biggest problem. Coincidentally information was received that one of the thrice-a-year residential programmes normally organised for DPE students was going to be held about the time when the questionnaire was ready to be distributed. This residential programme also afforded the opportunity to meet them. From this group 382 students were randomly selected to complete the questionnaire.

There was no residential programme for the CAE students that could have made this group available for distributing the questionnaires. But since there were only 18 students, it was decided to mail the questionnaires to elicit the needed information from them. The implications of this method were known. For instance, authors like Shao (1999) and Churchill (1987) have discussed the advantages and shortcomings of mail questionnaires.

The shortcomings of this approach include:

- Use of mail questionnaires allows little or no control over timing.
- A mail questionnaire does not permit the use of questions that require extensive probes for a complete response.
- Mail questionnaires allow the researcher little control in obtaining a response.
- There may be no response.

The advantages of this approach include:

- Respondents are able to work at their own pace, and therefore have adequate time to consider their responses.
- There is no interviewer bias.
- It is low cost relative to other methods, like a personal interview.

To limit the shortcomings of the mail questionnaire and to improve the response rate from the CAE students, the researcher decided to contact the 18 students involved by telephone to alert them that the questionnaire had been posted to them. The students were informed about the purpose of the questionnaire and of the importance of completing and returning it in good time. Altogether 400 questionnaires were administered to the students – 382 to the DPE students and 18 to the CAE students.

With regards to the DEU and the library, two separate questionnaires were constructed. In each of the two departments, it was observed that most of the responsibilities rest with two individuals who are professionals. These individuals from the two departments were interviewed using the questions devised. They proved to be keen participants when interviewed by the researcher.

In summary, many of the participants, including those reached via mail (details of which are explained under ‘Analysis of Data’ in 3.7) demonstrates showed enthusiasm in participating in this research.

3.5 QUESTIONNAIRE AS THE RESEARCH INSTRUMENT

The main way of obtaining the relevant data for this study was through a structured, self-administered questionnaire.

In adopting the questionnaire-based exercise, there were some salient issues that had to be taken into consideration. These include:

- The scattered nature and the large number of the sample made it impracticable to conduct a study that was interview-based. Interview-based research is time consuming, and as the DPE students were together as a group for less than two weeks for tutorials, revision and examinations they had no spare time. In the case of the CAE students, they were simply not available for being interviewed.
- The questionnaire format makes it possible for respondents to freely express their views, opinions and ideas on their experience in writing. Therefore it was decided to adopt the questionnaire research for this study.
- It was considered that the anonymity of a questionnaire would help elicit more satisfactory information than would an interview-based method. This claim appeared to be corroborated by the assertion of Sorensen (1973) cited in Dreyer (1980) when he wrote that, “the questionnaire is preferable since it avoids the embarrassment of direct questioning and so enhances the validity of the responses”.
- The structured questionnaire is a universally accepted mode in various disciplines to elicit information for research purposes. It is, therefore, probable that the necessary reliable theoretical and practical requirements of the investigation being conducted would be met.

Before setting out to use the research instrument, the author was aware that the questionnaires would have to be either distributed by hand or sent by mail. He therefore familiarised himself with the writings of authors like Shao (1999) and Cohen and Manion (1989) as to what should constitute a good questionnaire. Writing on what should form the aggregate of an ideal questionnaire, Cohen and Manion declared that, “an ideal questionnaire is unambiguous and uniformly workable. Its design must minimise potential errors from respondents and coders. And since people’s participation in surveys is voluntary, a questionnaire has to help in engaging their interest, encouraging their co-operation, and eliciting answers as close as possible to the truth”.

Weiers (1984) also wrote on mail questionnaires saying that “a mail questionnaire must be made attractive to the potential respondent, and appear simple and not too time-consuming to complete”. On the proper selection and ordering of questions, Lovell and

Lawson (1970) maintained that “presenting respondents with carefully selected and ordered questions is the only practical way to elicit the data required to confirm and or disconfirm a hypothesis”.

The issues raised above by various authors were therefore taken into consideration in the design of the questionnaire. It was decided to design a structured, straightforward unambiguous questionnaire to obtain the information needed. It was intended that the questionnaire would be simple and easy to understand, well ordered and not too time consuming to complete. The patterns of the questionnaire take the following forms:

- The fixed alternative format.
- The close-ended format.
- The multiple choice format.
- The open-ended, otherwise known as self-report format.

Except in a few areas, the questions for the students were of the predominantly fixed alternative format. In order to follow Weiers’ counsel that the questions should not be time consuming, it was a straightforward questionnaire with only twenty-five questions. It was believed that the respondents would be encouraged to complete the questionnaire in a short time. The only open-ended question was the one at the end, which asked the respondents to offer comments, criticisms, views, ideas or opinions on anything pertaining to library services to them as distance learners. The open-ended question was included among a preponderance of fixed-alternative questions to avoid imposing a response to fit a fixed alternative, or forcing a response to a question on which the respondent did not have an opinion.

On the other hand the questions for both the DEU and Library staff were predominantly open-ended. The questions were meant to elicit information on how distance education and the library services for the learners are currently run. The thinking was that the form of the questionnaire would allow adequate appraisal of the various issues to be addressed.

The questionnaire was in three parts, each reflecting the groups involved in the exercise. Part one of the questionnaire was meant for the students, part two for the DEU staff and part three for the Library staff. The questionnaire was not further sub-divided.

In part one, questions 1-5 were intended to elicit personal information about the students in relation to their study. Issues raised included the course of study, the length of time the students had been involved in the study, whether they were employed or not and where they lived or worked (city, town or village). Information was also sought on whether they had any physical disability that made it difficult for them to get to the library.

Questions 6-13 were intended to obtain information on their utilisation of library facilities for their course of study. Had they been using any library facilities? Is it a stated requirement for them to use the library for their course? How often and for what purposes do they use the library? Has any training been received on the use of the library? These, among others, were the questions asked in this section to get the information required from the students.

Questions 14-17 concentrated on their use (if any) of the University of Botswana Library or any of its branches. The information required was the distance to these libraries and the time needed to get to them.

Questions 18-22 were very specific and focussed on the knowledge and application of the Internet in the library that they attend, the extent of the accessibility of the Internet and how much they used it to search the UBL database.

In Question 25, an open-ended one, an attempt was made to obtain the respondents' views, suggestions and proposals that they might have for the library.

Part two of the questionnaire was meant for the DEU staff. The intention of this part was to find out from the DEU staff about the relationship existing between the DEU and the UBL. Information was sought about the running of the programme, the frustrations and

the encouragement that the distance learners may have received regarding support services from the library.

In part three there were questions for the Library staff who were directly involved in the running of library services for distance learners. This section was to enable the library staff to articulate their perceptions and understanding of the library delivery system to distance learners, and to give information on current practice and future plans. It was intended to get a much clearer picture of the problems experienced by the distance learners from the perspectives of the Library staff. This was designed to establish if there was any correlation with the answers provided by the students.

Parts two and three were predominantly open-ended questions. In order not to narrow all the questions down to the researcher's own perspectives, a general question was asked at the end that would allow staff to offer their views. They were then asked whether there were any further aspects regarding the distance education programmes, the use of the library by the distance learners and the relationship between the Library and the DEU that they would want to bring to the researcher's attention.

3.6 ADMINISTRATION OF THE RESEARCH QUESTIONNAIRE

The researcher administered a total of 382 questionnaires to the DPE students at two centres where residential programmes were taking place (See Appendix I for a copy of the questionnaire and the covering letter that accompanied it).

In addition, after permission was sought and obtained, the researcher was given 30 minutes in each of the two centres to distribute the questionnaires. It was observed that the time allocated was more than that needed for the students to complete the questionnaire. The researcher therefore decided to take the opportunity to speak on the importance of the questionnaire to the students. This enabled the researcher to establish rapport with the students. He explained the purpose of the research study, and informed them that the questionnaire was part of it. They were told why their involvement was

needed, and were also informed that the researcher intended to come up with some suggestions relating to their responses.

They were told that they did not need to write their names on the questionnaire. This gave an assurance of confidentiality. The students were requested to be open and honest in their responses to the questions, and were encouraged to offer as much detailed information as possible in the final open-ended part of the questionnaire. In order to remove impediments and improve responses, the researcher stayed with them while they were completing the questionnaire. This enabled the students to ask him some questions. He also explained some of the questions where assistance was needed. Despite the concerted effort made by the researcher to closely monitor the students' responses to the questionnaires, not all of them were properly completed and returned. Nevertheless the students were thanked for their participation in the research exercise. The reason for not being able to collect all the questionnaires was established. In each of the two centres, some of the respondents complained that they did not know that they would need a pen or pencil. Hence they could not complete the questionnaire, but they promised they would do so. An appeal was made to the students to return them on completion to their coordinators, from whom the researcher could easily collect them.

In the case of the CAE students it was decided to mail the questionnaires to them. Stamped self-addressed envelopes were enclosed with the questionnaires so that they could be returned at no cost and without much delay. Since there were only a few of them, they were all telephoned to inform them what was on the way. During the telephone conversation, we discussed with them what had been explained to the DPE students. Their contact addresses and telephone numbers were obtained from the DEU. Apart from mailing the questionnaires, faxed copies were sent to those who had access to a facsimile machine. Some of them completed the faxed questionnaires and faxed them back. The researcher also made a follow up to the scattered CAE students by telephone.

In the case of the four members of staff from the DEU and the UBL, arrangements were made to visit them for a question and answer session. They showed their experience in the dialogue that ensued, and the information volunteered was found to be very useful.

3.7 ANALYSIS OF DATA

As soon as the questionnaires were completed they were examined for errors and inconsistencies. Of the 382 questionnaires administered to the DPE students, 265 were returned completed. With regard to the 18 CAE students who were reached via mail and telephone (some of them also by facsimile), 10 of them responded. This gave a total of 275 questionnaires completed and returned out of 400 distributed to the distance learners. Thus a response rate of 68.75 percent was obtained.

Data was abstracted from the 275 questionnaires and entered into Microsoft Access of a personal computer for computational analysis. Standard statistics were used, including frequency distributions and percentages, to carry out the analysis. For most of the items in the questionnaire a separate table was used for ease of reference.

3.8 CONCLUSION

A structured questionnaire was designed for the purpose of achieving the overall research objectives of this study. In designing the questionnaire we wanted to ensure that it would be easy to complete by the respondents, especially the 18 CAE students who had to be reached by mail. Thus this exploratory study was conducted as envisaged and planned. On the whole, there was a fairly satisfactory response, which suggests that the primary subjects of the study were keen to make their contributions to it.

The objectives and hypotheses of the study have been formulated in Chapter 1. We carried out the review of the literature in Chapter 2, whilst explanation on the research methodology has been provided in Chapter 3. What follows in the next chapter (Chapter 4) is an analysis and discussion of the research findings.

CHAPTER FOUR

4 RESEARCH FINDINGS AND DISCUSSION

4.1 INTRODUCTION

This penultimate chapter deals with the research findings and discusses their implications. In chapter three the research methodology was explained and why questionnaires were used as the research tool. This chapter provides an analysis of the responses to the questionnaires administered to the students, and the staff of the DEU and the library. The results are presented in sequence, one that follows the items in the questionnaire, and they are discussed accordingly.

It needs to be reiterated here that with 275 completed and usable questionnaires received from the distance learners, a response rate of only 68.75 percent was recorded. The results of the students' responses are presented first, followed by those of the DEU and lastly those of the University Library staff.

4.2 STUDENT QUESTIONNAIRES

4.2.1 PERSONAL INFORMATION

In this section, the questions asked were related to information about the students and the courses being pursued.

4.2.1.1 Course of study

FIGURE 1

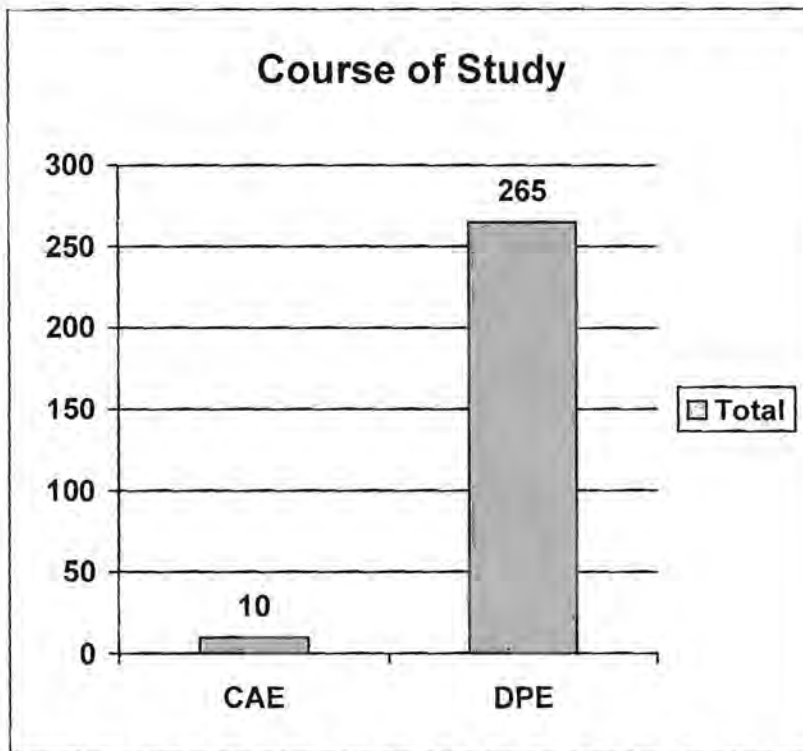
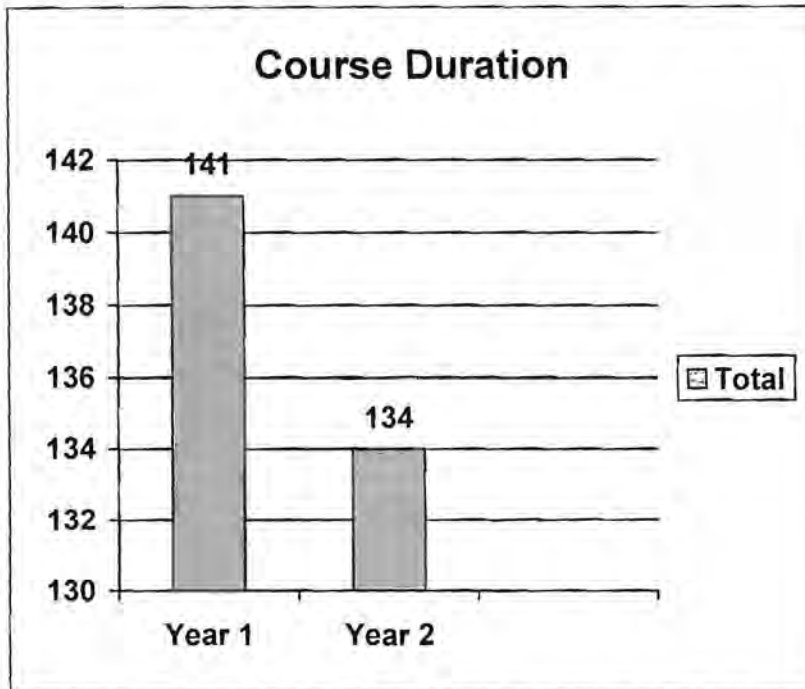


Figure 1 indicates that there are two categories of students studying on distance education programme provided by the UB. They are the CAE and the DPE students. Only 10 of the 18 students on the CAE course responded to the questionnaire. This was 55.6 percent of the total number of CAE students. The 10 CAE respondents formed only 3.6 percent of the total respondents. The total number of questionnaires administered to the DPE students was 382. Of this number, 265 students responded to the questionnaire. This was 69.4 percent of the total number of students who received the questionnaire in this group, and was 96.4 percent of all the respondents.

4.2.1.2 Course duration

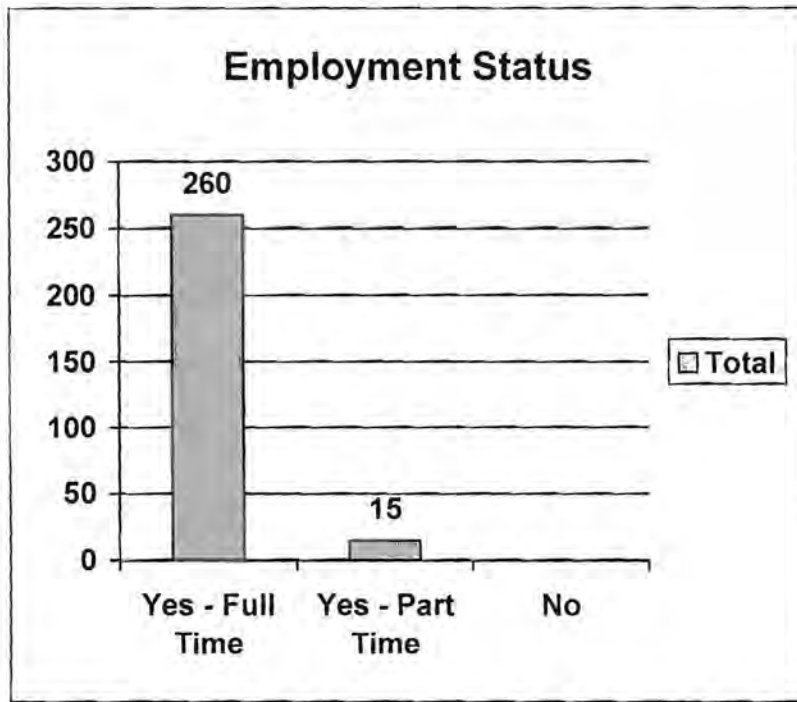
FIGURE 2



In order to ascertain in which year of the programme the respondents were enrolled, they were asked to complete a portion in the questionnaire that requested this information. What is seen in Figure 2 is the distribution of the students. From the figure, there were 141 respondents in their first year, which apparently meant that they were in their eighth month in the programme. They were 51.3 percent of all respondents. In the second year there were 134 (48.7 percent). It was noted earlier that the number of CAE students that responded at the time of compiling the results of the questionnaires was 10 out of 18. All the CAE students were in their second and final year. In other words, of the 134 respondents in year two, 10 were CAE students. This means that 7.5 percent of the respondents in the Year 2 group were CAE students. The remaining 124 respondents (92.5 percent) in year two were DPE students.

4.2.1.3 Employment status

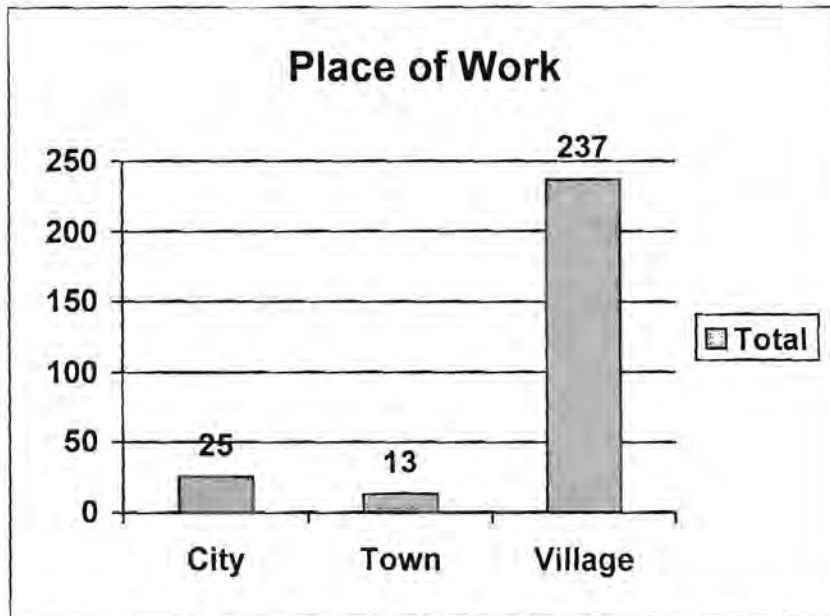
FIGURE 3



The above figure shows the employment status of the respondents. Three options were provided. These included whether they were working full time, part-time or not at all. Figure 3 indicates that not one of the respondents is without a job. However, 15 of the respondents (5.5 percent) are working part time, while 260 of them (94.5 percent) are engaged in full-time employment. Thus all the students who responded have to cope with a job and studying. It is also important to note that 11 (73.3 percent) of those who were engaged in part-time work were based in town or close to where UBL has a presence.

4.2.1.4 Place and location of work

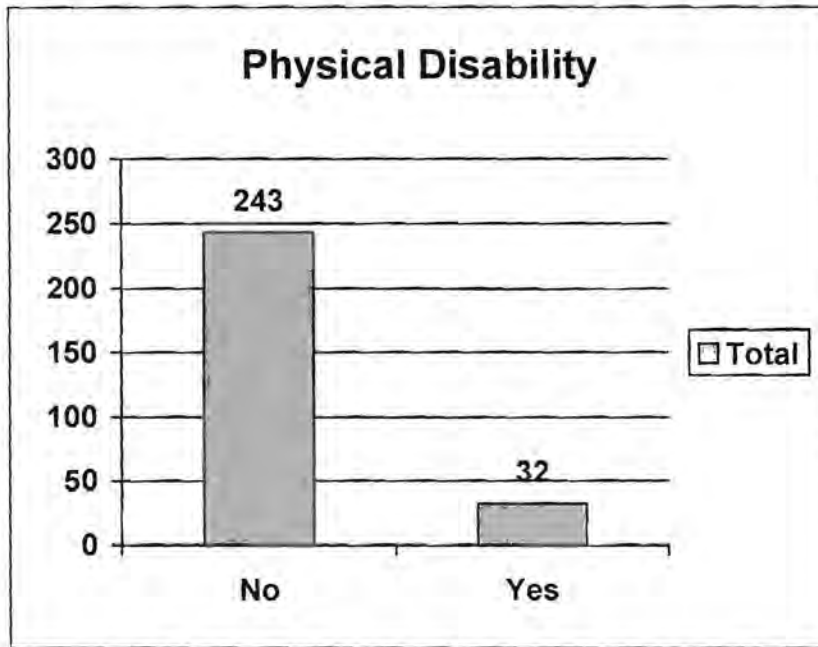
FIGURE 4



The questionnaire asked the students to state where they live and work. It is clear that the University of Botswana, in terms of physical structures, like the Library, makes its presence felt mostly in two cities in the country. Figure 4 above shows that most of the respondents live in remote areas, rather than in metropolitan or urban areas. Out of the 275 respondents, 237 respondents (86.2 percent) live or work in villages, 26 respondents (9.5 percent) are city dwellers and 13 (4.7 percent) live or work in towns.

4.2.1.5 Physical disability

FIGURE 5



The respondents were asked to state whether they have any physical disability, which is severe enough to make it difficult for them to get to a library. Figure 5 above shows the distribution of those who responded 'yes' and 'no'. The response of 243 respondents (88.4 percent) was that they did not have any disability that made it difficult for them to get to a library. On the other hand, 32 of them (11.6 percent) responded that they had a disability. Although most of the respondents did not have a disability, it is important that the small minority with a physical disability should be given due consideration by the library.

4.2.2 LIBRARY UTILISATION

The intention of this section was to determine the extent of the current utilisation of library facilities by the students for their course of study. We wanted to know if they were specifically told that it was a requirement for them to use the library for their

course. Questions raised included a number trying to establish how they had been equipped to use the library and how often they use library facilities.

4.2.2.1 Library as a requirement

FIGURE 6

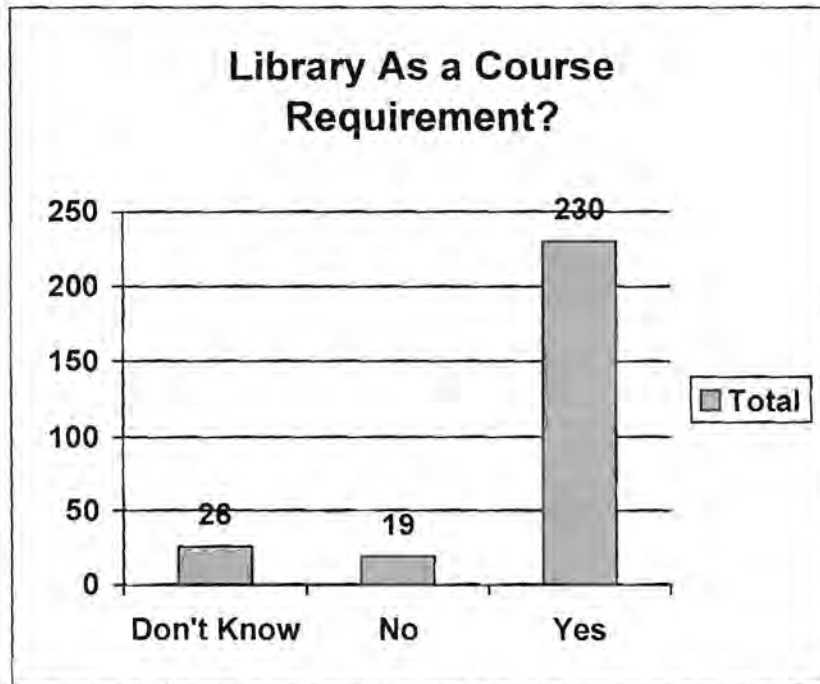


Figure 6 shows the degree of awareness of the students concerning the use of library facilities for their course of study. A question was asked to find out from the students whether it was a clearly stated requirement of their course for them to make use of libraries or not. Some 230 students (83.6 percent) responded that it was a clearly stated requirement for them to make use of libraries. Only 19 of them (6.9 percent) offered 'No' while 26 students (9.5 percent) claimed they did not know.

4.2.2.2 Need to supplement course material

FIGURE 7

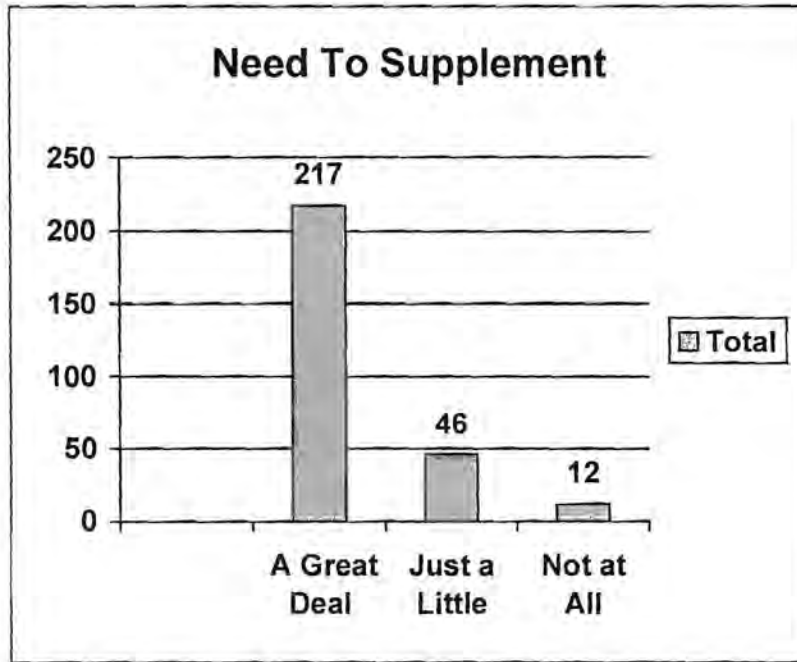


Figure 7 above shows whether students felt there was a need to supplement course materials given to them with additional reading or not. A good majority of them responded in the affirmative and only a small number did not see the need to supplement the course materials given to them. 12 respondents (4.4 percent) answered 'Not at all', 46 students (16.7 percent) 'yes' but 'just a little', while 217 of them (78.9 percent) responded 'yes' with 'a great deal'.

4.2.2.3 Use of library for courses

FIGURE 8

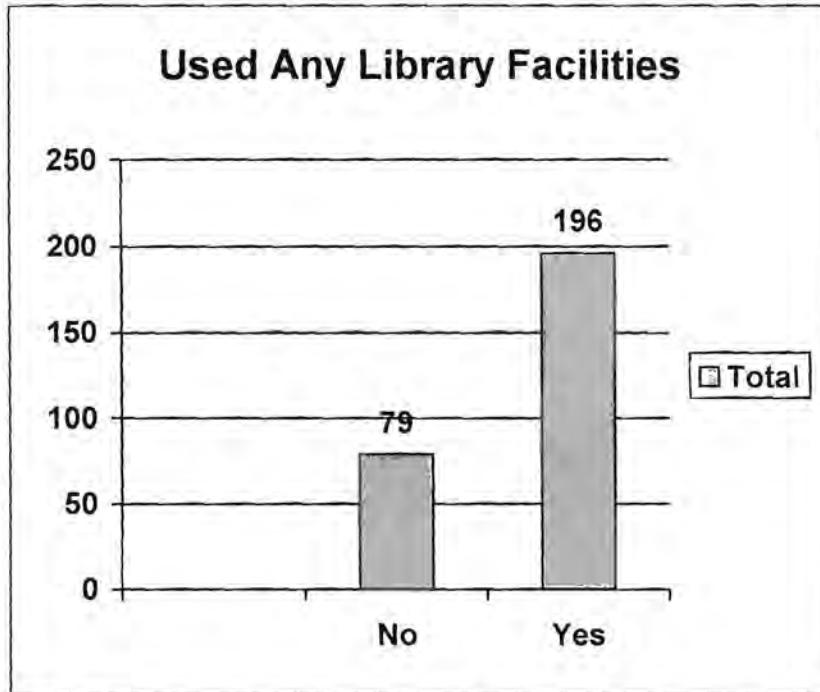


Figure 8 above shows students' responses to the question 'Have you used any library facilities for your course?' 196 of the respondents (71.3 percent) claimed they had, while 79 students (28.7 percent) offered no, they had not been using any library facilities for their course. In other words, this last category of students have been depending entirely on the course materials given to them for preparing for their examinations and for writing their assignments.

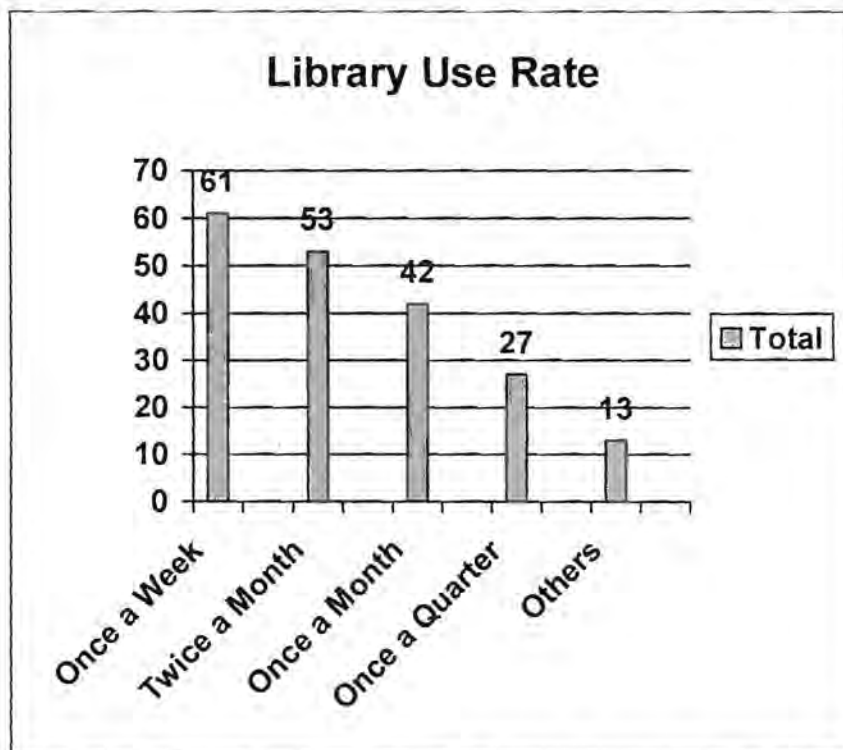
4.2.2.4 Time span of using library facilities

With regard to those who said they had been using the library, they were asked for how long they had been using the library facilities. The responses received from this question were so diverse as to render it difficult to represent them in a table. It ranged from two years, that is, from the time they started their programme, to as short as a few days before the DPE students came for the residential session where this questionnaire was

administered. Of course, a number of them responded that they had not used a library since they had started their programme. It was noted, however, that some of them indicated that they wanted to use a library but that they did not live or work in an area where there was a library.

4.2.2.5 Library use rate

FIGURE 9



In Figure 9 the responses of the respondents to the question “How often they used the library” are shown. 61 of the respondents (22.2 percent) claimed they used the library once a week. It has been noted above that 11 of those engaged in a part-time job live in a town or close to where the UB Libraries are situated. It is remarkable that only 2 of them (18.2 percent) belonged to the group that claimed they used the library once a week. These two part-time workers represent 3.3 percent of those who patronise the library once a week.

53 respondents (19.3 percent) maintained they visit the library twice a month, 42 respondents (15.3 percent) once a month and 27 of them (9.8 percent) went to the library only once in three months. In the event that none of the above options were applicable for some respondents, an ‘Others’ option was included asking them for a specific response. Only 13 respondents ticked this option: some of them indicated that they visited the library two to four times a week, some three to six times a month and others stated whenever they wanted. This group represents 4.7 percent of respondents. The total number of respondents to the question shown in Figure 9 was 196. This figure corresponds with the number of those who claimed that they were already using library facilities, as given in figure 8.

4.2.2.6 Purpose of library use

FIGURE 10

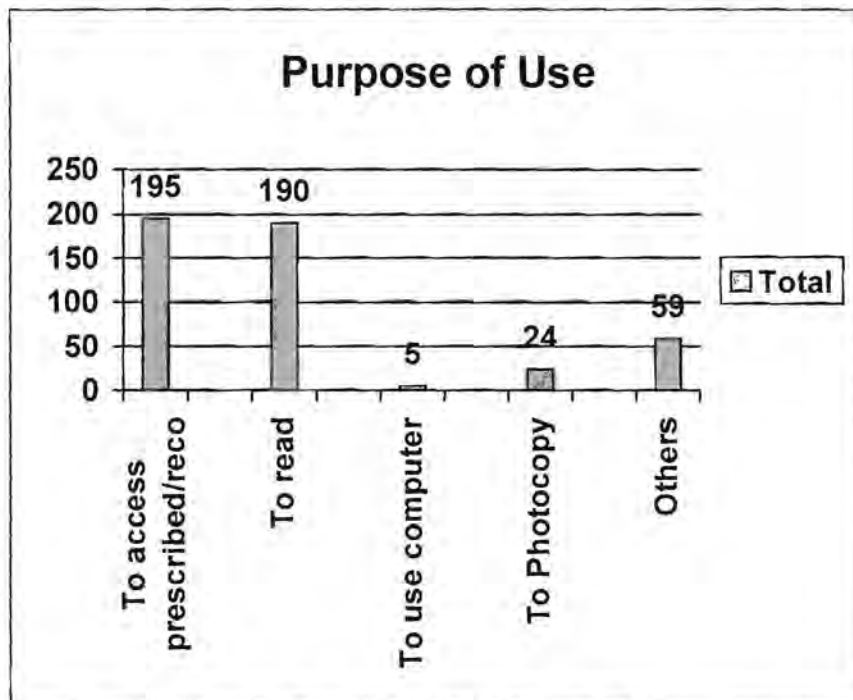


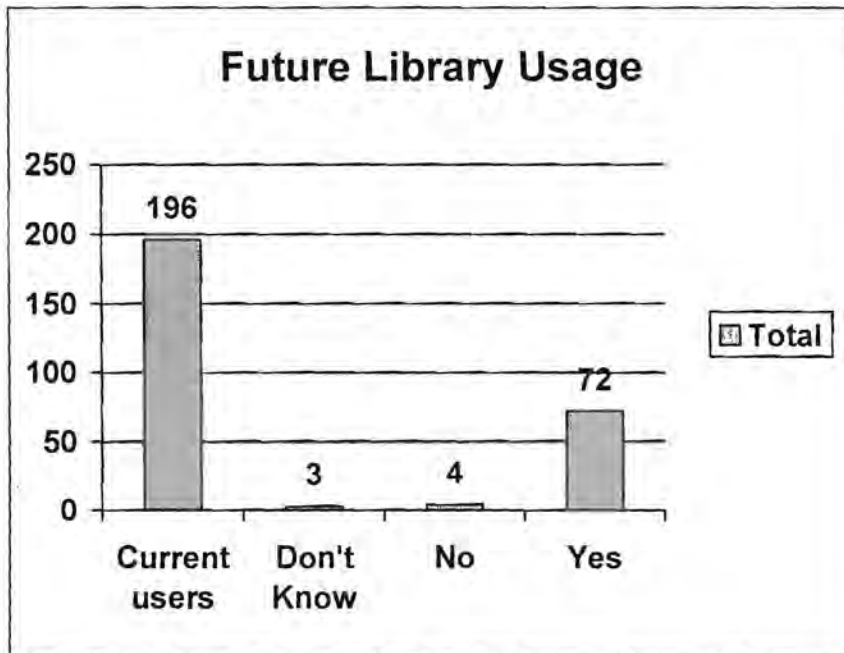
Figure 10 above shows the purpose for which students use the library. In asking this question a list of options was provided out of which the students were asked to choose the

ones that might be pertinent or relevant to them. If their options were not included in the list provided, they also had the option of adding any other purposes for which they used the library. It should also be noted that the respondents were not limited to the number of options that they could choose. They were free to select as many options as were relevant or appropriate to them. It is, therefore, not surprising that some respondents selected all the options available. A total of 195 respondents claimed that they used the library facilities to access prescribed and recommended materials. This figure represents 70.9 percent of the total number of respondents; and 99.5 percent of those who maintained that they were using the library facilities. 190 respondents stated that they used the library facilities to read. This is 69.1 percent of the total number of the respondents and 96.9 percent of those who had been using the library facilities. To use a computer was another option provided as a purpose for using the library. This option recorded a very low score as only 5 respondents stated that they used the library for that purpose. These were 1.8 percent of all the respondents and 2.6 percent of those who maintained they were using the library.

24 of the respondents claimed they went to the library for the purpose of photocopying, 8.7 percent of the entire respondents and 12.2 percent of those that were using the library. There were 59 other respondents who claimed that they used the library for purposes other than those itemised. These other purposes for which they stated that they used the library included research, borrowing and recreation.

4.2.2.7 Future library use

FIGURE 11



The respondents who claimed they had not been using library facilities for their course at the time of this research were asked if they expected to use the library in future. Three options were provided for them. The options included: don't know, no and yes. Altogether, 79 respondents answered this question. As seen in the above figure, 196 respondents were currently using a library. Out of the 79 students who were yet to start using any library, 72 of them (91.1 percent) responded that they expected to use a library in the future for their course, 4 students (5 percent) answered no, and 3 students or 3.8 percent thought they did not know if they would use the library in future.

4.2.2.8 Library use training

FIGURE 12

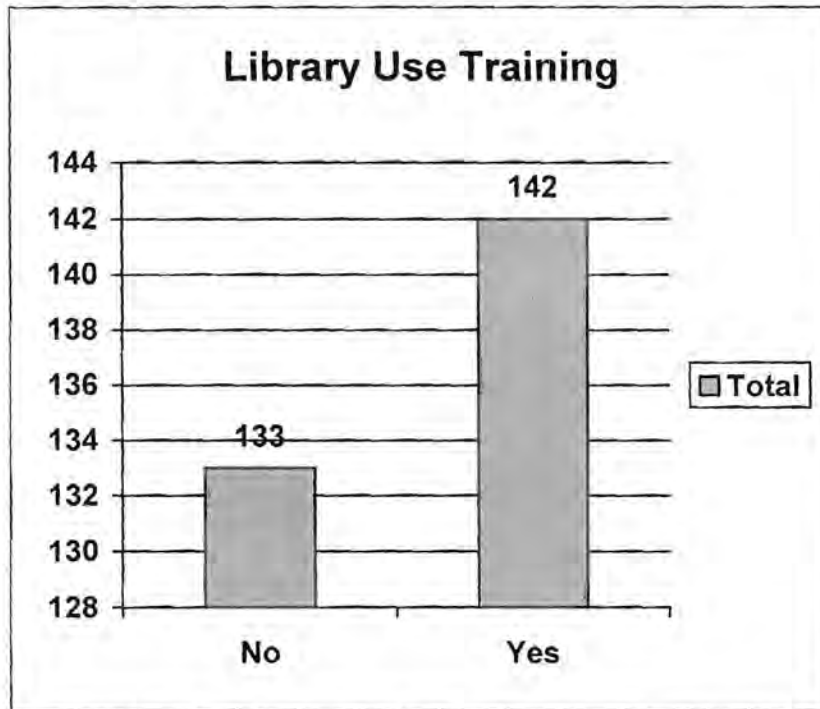


Figure 12 above represents the response of the students to the question asking whether they had received any training in the use of libraries as part of their course. 133 (48.4 percent) answered no, and 142 (51.6 percent) responded yes. The explanation given by those who responded in the affirmative was that they obtained training on library use during the orientation given to them when they went for registration after getting admission to the University. Others said they received brief training from librarians at the public library. Some of them added that they would not regard the orientation briefing as training.

4.2.3 STUDENTS AND UBL

4.2.3.1 Nearest university library

FIGURE 13

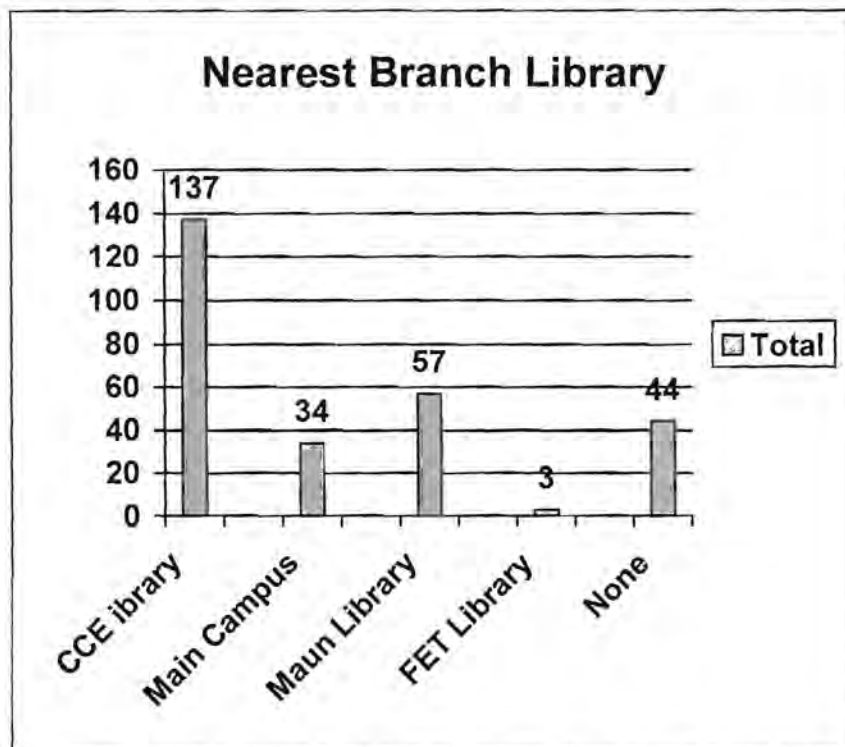


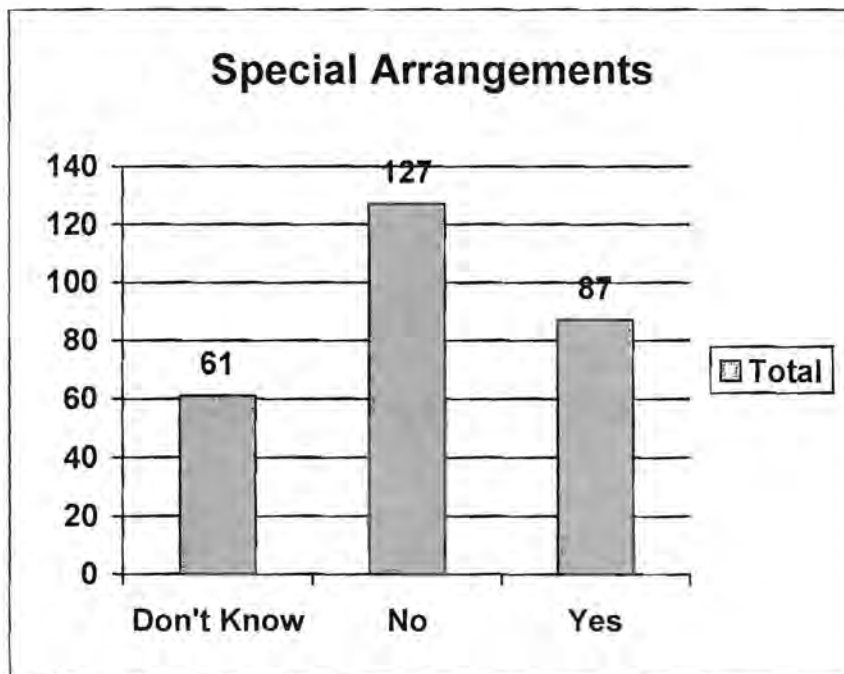
Figure 14 indicates that the majority of the respondents (137 of them or 49.8 percent) stated that the CCE (North) library was the closest to where they lived or worked. 57 respondents (20.7 percent) were living or working very close to the newly established branch library in Maun, for 34 of them (12.4 percent) the main library was the nearest, and 3 students (1.1 percent) indicated that the FET branch library was the closest. Even though an option for 'none' was not provided, 44 (16 percent) of the respondents declared that none of the branch libraries was close to their home or workplace.

4.2.3.2 Distance from the libraries

Even though we wanted to ascertain the distance the students need to travel to get to any of the university branch libraries, as well as the time it takes to get there from their places of work, this proved somewhat difficult to establish. The reason for this was that the majority of the students could not give an estimate. They therefore left the question unanswered. It is, however, worth noting that some of them that completed this question claimed they needed to travel 500 to 1300 kilometres, for up to two days in some cases because of inadequate transport facilities, to get to one of the branch libraries of the UB.

4.2.3.3 Arrangement to use nearest library

FIGURE 14

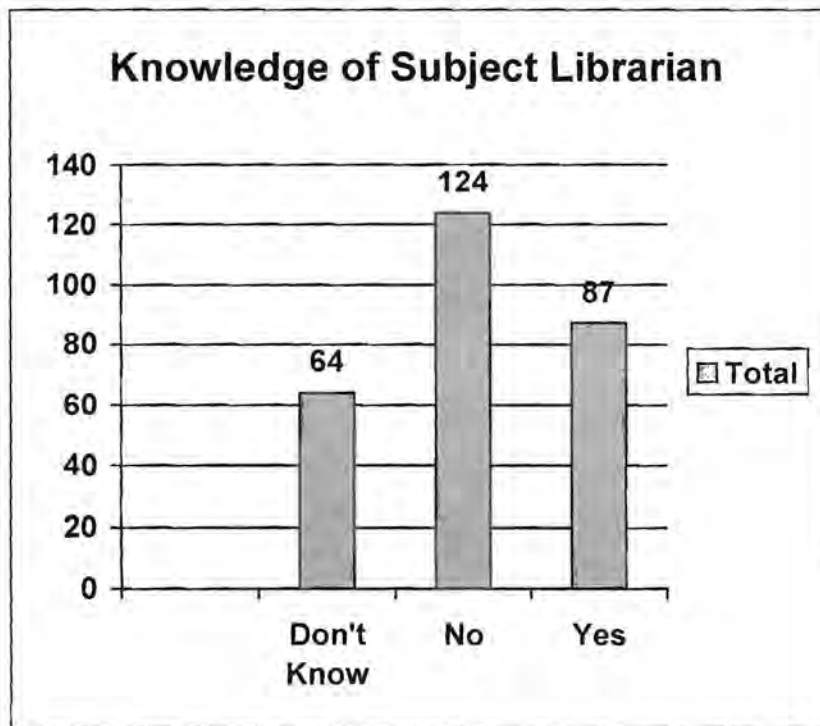


The respondents were required to indicate whether or not, to the best of their understanding, there were any special arrangements put in place for them to use a library near where they lived or worked. The response could either be 'yes', 'no' or 'don't k

know'. 87 of them (31.6 percent) ticked 'yes', 61 (22.2 percent) answered 'don't know', while the largest number, 127 (46.2 percent) gave 'no' as a response.

4.2.3.4 Knowledge of accessibility to subject librarian

FIGURE 15



The findings in Figure 15 show that 64 respondents (23.3 percent) did not know how to get access to the subject librarian for their course of study. 87 of them (31.6 percent) did know, while the largest group of 124 students (45.1 percent) responded 'no' to the question.

4.2.4 KNOWLEDGE AND APPLICATION OF THE INTERNET

4.2.4.1 Internet knowledge

FIGURE 16

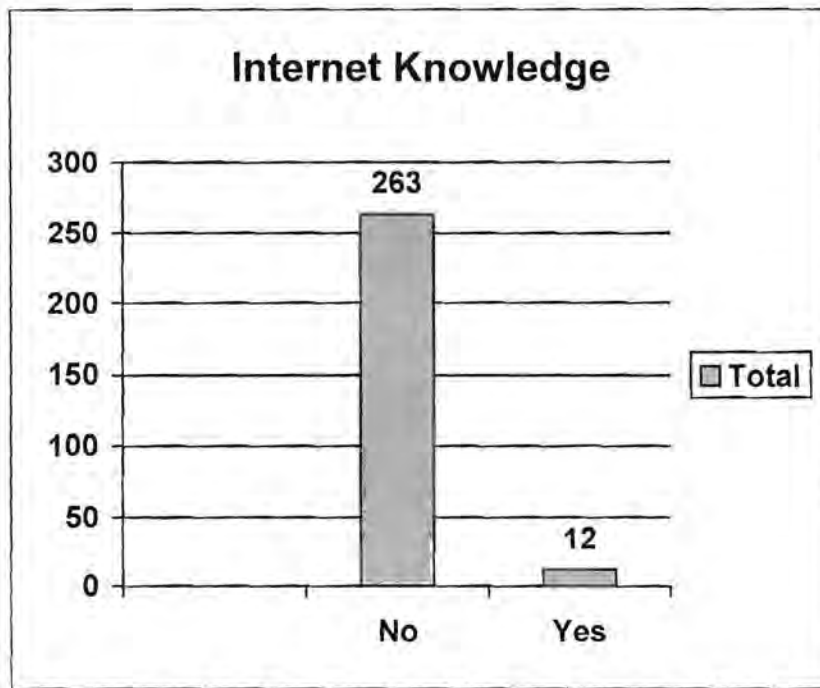


Figure 16 represents the respondents' knowledge of the Internet. Of the 275 respondents only 12 (4.4 percent) of them claimed to have knowledge of the Internet. The majority of them - 263 (95.6 percent) - disclosed that they did not have any knowledge of the Internet. Regarding their responses to whether they could search the UB Library website for information, surprisingly only 34 of them (12.4 percent) stated that they could (See Figure 18 below). It is hard to believe that the respondents could not identify the link between the UBL website and the Internet. Obviously, adequate training and enlightenment is required on library skills and computer and Internet skills for these students.

4.2.4.2 Access to computer with Internet

FIGURE 17

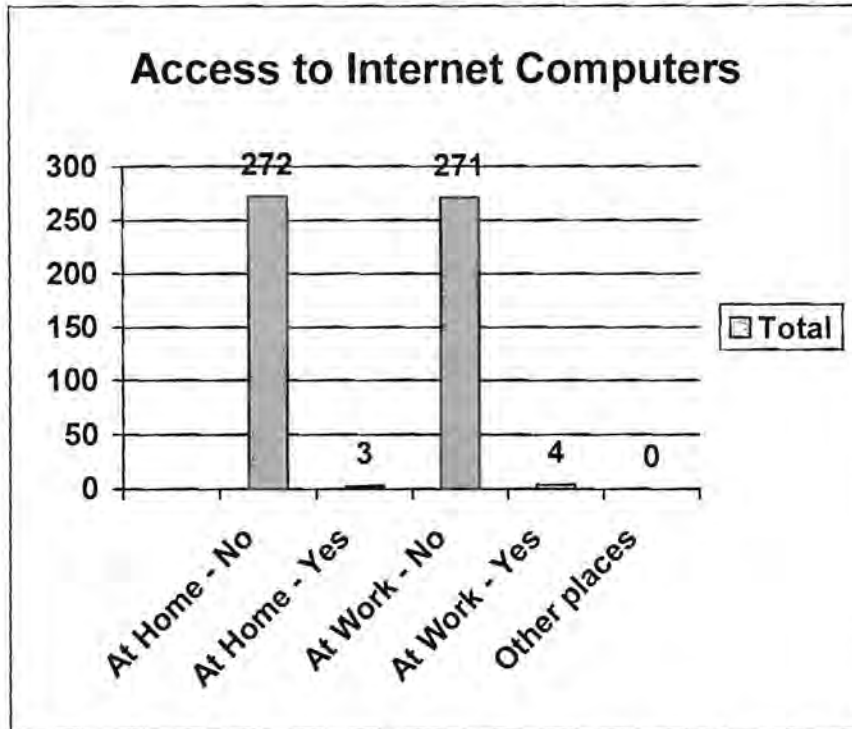


Figure 17 reveals the responses to the question about whether or not students had access to a computer linked to the Internet. An attempt was made to find out where they could obtain access, whether 'at home', 'at work', or 'other places'. The responses were not encouraging as only 3 respondents (1.1 percent) stated they had access to a computer with Internet facilities at home, while 272 (98.9 percent) do not have such facilities at home. At work there is little difference. Only 4 (1.5 percent) had access to the facilities, whilst a large majority (271 representing 98.5 percent) disclosed that they did not. There were no responses to 'other places'. Previously only 12 respondents (4.4 percent) stated that they had Internet knowledge (See Fig.16 above).

4.2.4.3 Knowledge of searching for information at UBL website

FIGURE 18

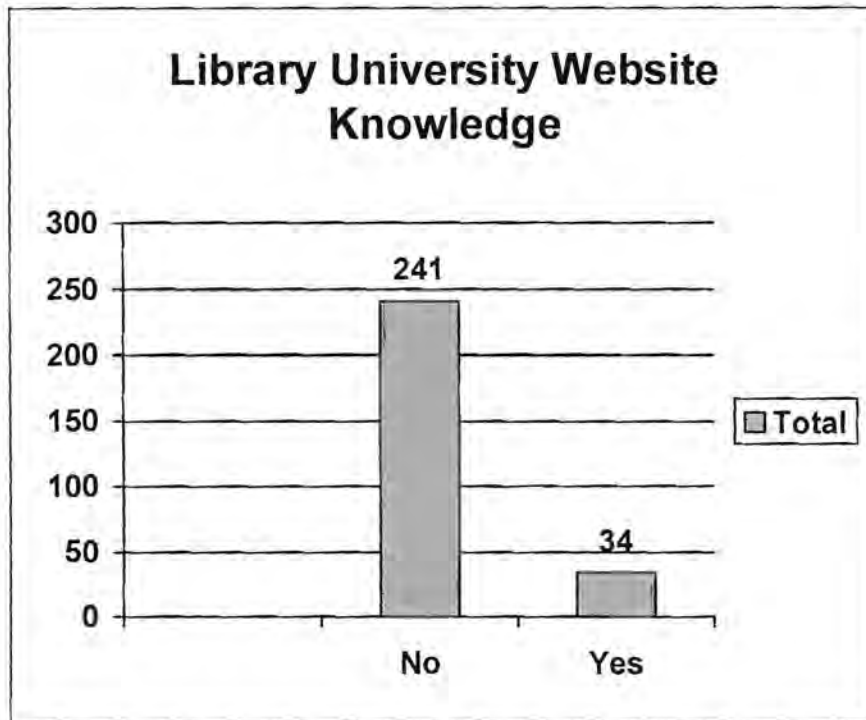


Figure 18 above indicates whether or not the respondents know how to search for information at the University Library website. Even though more than half of the respondents claimed they had training in use of the library, and that they received their training during their orientation programme in UB (see Figure12 above), only 34 of the respondents (12.4 percent) knew how to search for information at the UBL website. This is despite the fact that most of them claimed that they were taken through the website when receiving library training during orientation. A large majority of them - 87.6 percent (241 respondents) - claimed they did not have any knowledge about how to search for information at the UBL website.

4.2.4.4 Searching the UBL database

FIGURE 19

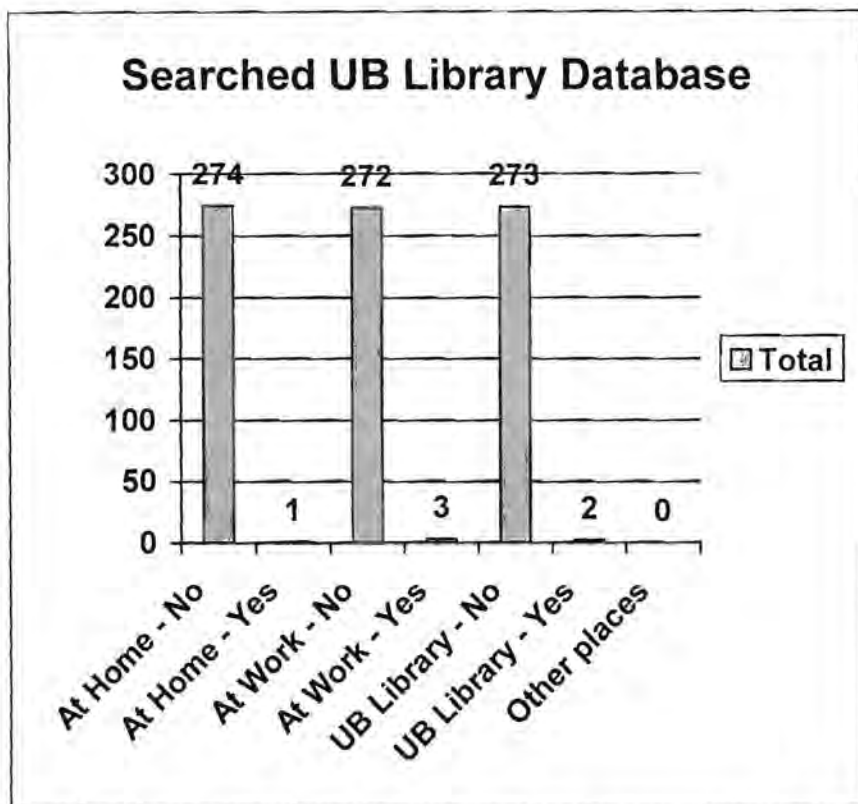


Figure 19 shows the responses of the students to the question on whether or not they had searched the University Library database. In asking this question, various options were provided. Such options included: 'at home', 'at work', 'UB Library' and 'other places'. The respondents' answers were quite revealing as well as disturbing. Out of the 275 responses for the 'At Home' option, only one respondent meaning (just 0.4 percent) gave yes, while 274 respondents (99.6 percent) had never searched the UB Library database at home. There was no significant difference in the responses to the 'At work' option. Only 3 respondents (1.1 percent) claimed they had searched the UB Library database at work. It will be recalled that more than half of the total respondents - 142 (51.6 percent) - stated they had some training in the use of libraries (See Fig. 12 above) yet only 2 respondents (0.7 percent) had searched the UB Library database even in the UB Library. These responses correlate with the responses to the question on whether they had access to the

Internet. It will be recalled that in Figure 17 only 4 respondents said they had access to a computer with Internet facilities at work and 3 respondents had such a facility at home.

4.2.4.5 Internet café in locality

FIGURE 20

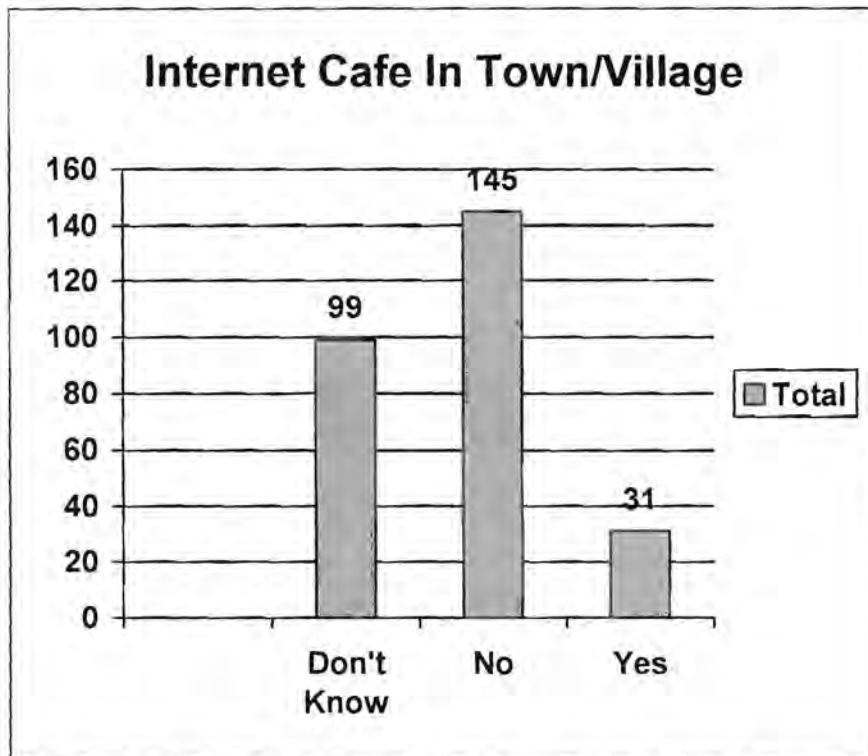


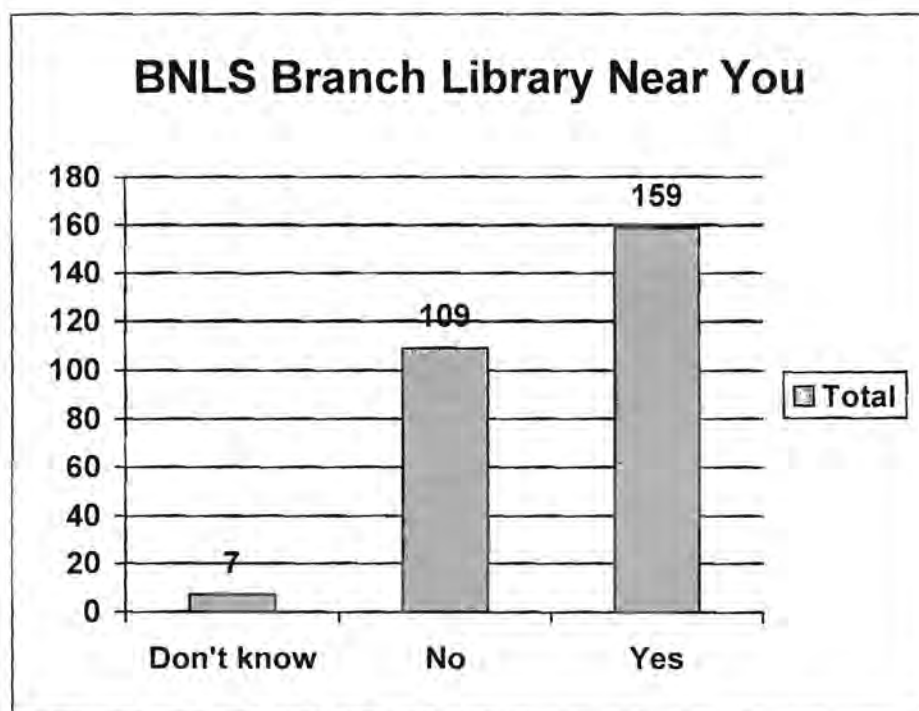
Figure 20 above depicts the responses to the question posed on the availability of the Internet in their locality. Specifically, the question asked was 'Is there an Internet Café in your town or near where you live?' A high proportion of the respondents answered 'don't know'. This group numbered 99 (36 percent). The highest response to this question came from those who stated 'no'. More than half of the respondents - 145 (52.7 percent) - made up this group, while 31 (11.3 percent) responded 'yes' to the question. Looking at Figure 17, which shows the responses to whether or not they had access to a computer with Internet facilities, however, a total of only 7 respondents stated that they had these facilities either at home or at work and in 'other places' there were no responses. One

could only assume that the reason for this discrepancy was in the interpretation given to the word 'access' by the students. They probably thought it meant easiness and freedom to use the Internet facilities, without having to take much trouble to do so or be asked to pay for the service immediately.

4.2.5 OTHER LIBRARY RESOURCES

4.2.5.1 Availability of BNLS branch library in locality

FIGURE 21

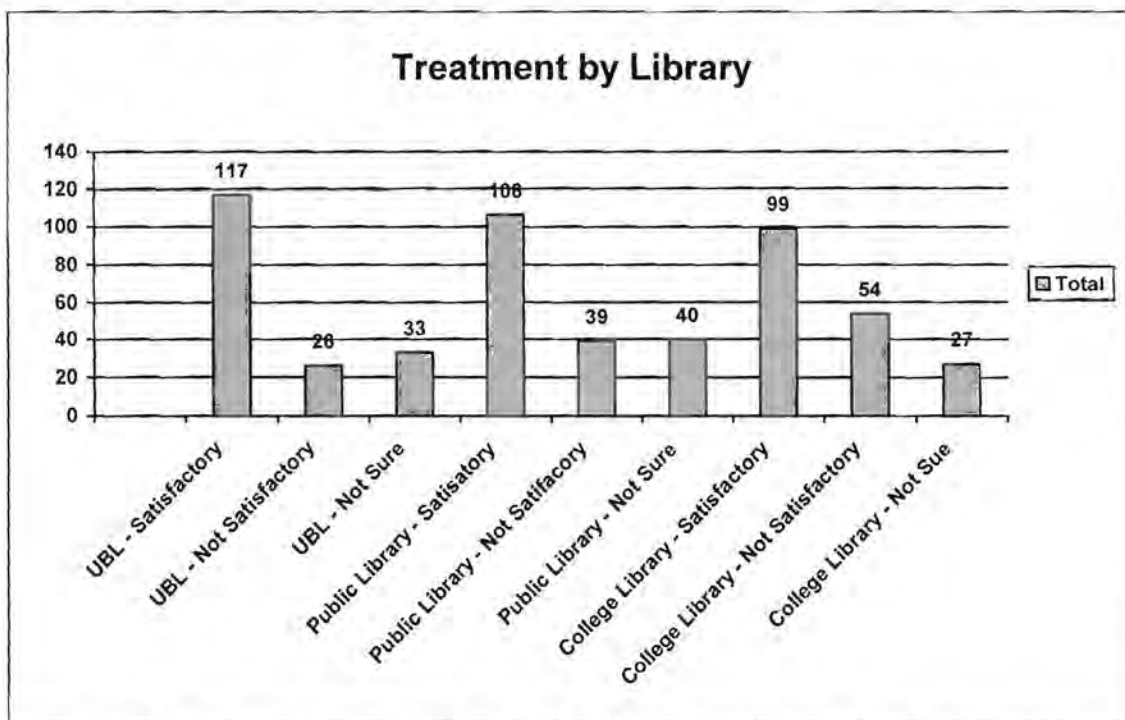


The Botswana National Library Service (BNLS) has branch libraries spread across the country. The UBL is said to be negotiating with this organisation with a view to establishing some form of partnership. The question was therefore designed to find out whether respondents have a branch of this library near their home or workplace. The purpose was to determine how useful the BNLS could be for the UB distance learners if and when collaboration took place. As expected, a majority of the respondents numbering

159 (57.8 percent) responded that there was a branch of BNLS in their area. A substantial number (109 or 39.6 percent) stated there was not. What is most disturbing is that there were some respondents whose answer was ‘Don’t know’ to whether the BNLS had a branch library near them or not.

4.2.5.2 Treatment of students by libraries

FIGURE 22



We wanted to ascertain the views of the students who were already using the library by asking them to rate their quality. The libraries the distance learners were using, as indicated in the questionnaires, were the UBL, the Public Library and the College of Education libraries. An option for ‘others’ was included, should there be any other library the students were using that we did not know of. For the rating, three options were provided. These included ‘Satisfactory’, ‘Not satisfactory’ and ‘Not sure’. They did not have to limit their opinion to only one library. They could rate each one as long as they

patronise them. With regard to the UB Library, the 117 respondents who had used any of the branch libraries were satisfied with the treatment received. This forms 42.5 percent of all respondents and 59.7 percent of the number of respondents who had used a library for their course (See Figure 8). 26 respondents (9.5 percent) thought the treatment they received from the UBL or its branch libraries was not satisfactory, and 12 percent (33 respondents) ticked 'Not sure' as their response for the rating.

Regarding the public library, 106 respondents who had used the BNLS claimed they were satisfied with the treatment received. This represents 38.5 % of the total respondents and 54.1 percent of those who confirmed they had used library facilities for their course as shown in Fig. 8 above. 39 respondents (14.2 percent) indicated they were not satisfied with the treatment received, and 40 of the respondents (14.5 percent) were not sure about the treatment received.

With regard to the College Libraries, 99 respondents (36 percent) were satisfied with the treatment received, as patrons of a college library. Considering the total number of those who claimed they had used library facilities for their course, this figure represents 50.5 percent. 54 respondents (19.6 percent) felt they were not satisfied with the treatment received; and 27 respondents (9.8 percent) were neither not satisfied nor satisfied. They ticked 'not sure' as the preferred option for the treatment received in the course of their dealings with the college library.

4.2.5.3 Comments from respondents

In the questionnaire a space was provided for the respondents to make additional comments on anything they felt concerned about, but which the questionnaire did not address. While most of the respondents left the space blank, others took the opportunity to make comments. Altogether, some 67 respondents made submissions that were seen to be very pertinent. Their comments ranged from complaints, dilemmas they faced and appeals and suggestions about the difficulties distance learners experienced during their studies. For the sake of convenience, the various comments received were categorised under nine groupings, and these are presented below.

4.2.5.3.1 No library around

In this section, the respondents' various comments that centred around the lack of library facilities where they live or work are provided. The comments were as follows:

“I have not used the university library since it is far from my destination”.

“I have never used any library”.

“We should be able to borrow books at our schools which have enough information because we do not have libraries in our areas”.

“The distance education gives me a lot of problem because I cannot study well because there is no library”.

“Students failed because there are no library to assist”.

“Try to provide materials to us who are in the rural areas”.

“Students in remote areas are suffering. They need special treatment. It is strenuous to come to town from our rural areas for library service”.

“I think it will be advisable to have at least a village reading room in my village where we will be able to go and study”.

“Libraries should be built in our villages to reduce expenses on travelling”.

“I have never used any library because my working place is far away from town where there is a library”.

“I am far from all library centres and it is not easy for me to use any”.

“Our modules should be supplied in time if there is no library”.

“I have never used any of these libraries since they are not where I live”.

“Please provide library service to us in remote areas”.

“Arrange with Primary school in remote areas so that we can get library materials – we don’t have library”.

“We people living in rural areas have no access to any library. We only use our modules for our assignment. Then the tutors’ comments are not favourable. They tell you “copy from modules”. We don’t have any library to do our research anywhere”.

4.2.5.3.2 The National/Public library

Below are the respondents’ comments that concern the Botswana National Library Service and its branch libraries. The BNLS is either referred to as the national or public library. Essentially the students either want the BNLS to establish branch libraries in their areas or have the existing ones equipped with materials that are relevant to them.

“There are not enough books at the library which I am to use. At the Public library I have not told them I am a D.E student”.

“National library should be well equipped with enough materials for us to be able to get adequate materials”.

“National library should be built in every sub-district and village reading rooms should have all the materials to cater for us”.

“There is no relevant information for DPE students in Public library”.

“There are no relevant books in BNLS for our use”.

“Supply enough and relevant books to BNLS branch libraries for our use”.

“The BNLS branch near my area does not have enough books to use for my assignment”.

4.2.5.3.3 Establishing more libraries

The respondents' comments provided below relate to the provision of library services or the establishment of more libraries.

“It would be profitable if all districts have libraries for every distance learner to benefit”.

“I need to have access to the library services so as to pass my course. Saturday use of the library is not enough”.

4.2.5.3.4 Library opening hours

Some students apparently felt that the libraries should be more generous with their opening hours. The following comments were offered concerning this matter.

“Time doesn't favour us as full-time workers because library closes at 6.00p.m. On Saturdays they open for only 4 hours”.

“CCE Francistown should not close early during vacation because distance learners don't go for vacation. So we need to use the library throughout especially in the evening”.

4.2.5.3.5 Training

In their comments provided below, the respondents demonstrated the need for them to be adequately trained in library and information literacy skills, skills that involve the use of the computer and the Internet.

“We need training in use of library, computer, Internet. We need to be given time to study the use of the above not during residential time”.

“Train us in the use of a computer”.

“You should organize a workshop on how to use a library for us”.

“There are many students who still need to be exposed to library research methods and skills”.

“Library is very important for us distance learners. There is need for us to be taught how to use computer to search”.

4.2.5.3.6 Book shortages

Comments were made on the shortage or non-availability of relevant materials for the use of the students in their various locations. These included:

“We should be provided with our own resource books”.

“No reference books at the village libraries”.

“In the library that I once visited there was a problem of shortage of books. The building was also too small to accommodate readers”.

“At times you get to the library to see that you have wasted your money in coming from your village to the library in town”.

“I use BNLS library in my village but the problem is shortage of books. It is not well equipped. The librarians there do understand our problem”.

“Sometimes the books recommended for further reading are not available in public library”.

“You cannot get the resource book that is needed since we are many who want to use the same book”.

“The library has no books. Librarian failed to help you because of no materials or books”.

4.2.5.3.7 Special arrangements

The comments below are appeals or suggestions made by the respondents for improving library services for them. Among others, suggestions were offered on places that could be used to provide them with library services in their remote areas.

“I suggest the university should look for a suitable library we should use near us”.

“I would like to see distance learner given IDs for library like other students of the University so that we can borrow and use library freely”.

“We must be attached to libraries in Community Junior Secondary schools near our working places”.

“Libraries help a lot. All libraries should have the same facilities as that of the university”.

“I would like to have access to the library so that I can research for my assignment”.

“UB Library can supply Junior Secondary schools with books for us”.

“The course is becoming difficult as I live far away and there is no library nearby. Arrangement should be made to cater for us”.

“Distance learners should be transferred from places where there are no libraries to places where libraries are available”.

“Books should be brought to schools we are teaching”.

“Please provide resource books relevant to our course in nearby libraries”.

“Supply book box with relevant books for those of us in the very remote areas to benefit from. We are really suffering”.

“Provide books in primary school to help reduce weekend travels to libraries in town only to get there and find the libraries closed”.

“I only use CJSS school library”.

“Could you please make sure that these libraries are set up in rural areas to minimize long distance travel searching for library”.

“We travel 220km to get to the nearest library using a lot of money. It will be fine if CJSS can be well equipped with relevant books for us”.

“Mobile library should visit rural areas regularly to encourage those who live far away to read”.

“There should be a mobile library to be used by distance learners. Many books should be supplied”.

“Start mobile library service for distance learners”

“Make proper arrangement for us to use the library in rural areas”.

“Books which supplement the modules should be sent to us in time in our stations”.

“It cost us so much to get to the library from my village. There must be a library branch in Shakawe”.

“All libraries should be equipped with distance education materials so as to cater for us”.

4.2.5.3.8 Parity of treatment

The students apparently observed some degree of disparity in the treatment being meted out to them compared with their on-campus counterparts. They understandingly reported this in the following comments:

“We should be given the same type of treatment with other students in UB libraries”.

“I have tried twice to register with the University Library without success. Membership should be made easy for us”.

4.2.5.3.9 Other comments

The respondents' comments provided below take the form of excuses or reasons why some of them were not using the library facilities available.

“Some of us as teachers are not allowed to go to the libraries by our school heads”.

“No time to search for information from the libraries or visit libraries”.

“Due to my workload I don't satisfactorily use the library”.

4.3 ISSUES RAISED WITH THE DEU STAFF

4.3.1 THE NATURE AND TYPE OF COURSE MATERIAL PROVIDED

The first question put to the DEU staff asked them to give brief descriptions of the nature or type of course material provided for the distance learner. According to them, the type of course material provided was in the form of modules, manuscripts that have been completed, audio-tapes, radio scripts and other related items. They explained that in producing the course material the unit, through the subject co-ordinators, identified writers, editors and other part-time staff to develop material. A course team approach is used in the overall development of material, although individual writers have the responsibility of working on their own on the module or unit before passing it to the content editor, who examines it and returns it for correction. The document then goes back to the content editor. Next it is sent to the copy editor and to the graphic artist who deals with the illustrative work. After incorporating any comments and suggestions offered it goes for printing.

4.3.2 SELF-SUFFICIENCY OF STUDENTS' COURSE MATERIAL

The question was asked as to whether the course material given to students were entirely self sufficient to the degree that students did not have to use a library. The DEU staff maintained that, in distance education terminology, material given to students is "self-

contained”. Thus, the material is complete. Nevertheless, they added that if any of the modules were checked, it would be observed that each has a ‘further reading’ section. This identifies chapters and pages of other texts to which students could refer to obtain further information. They added that students who sought additional reading matter were likely to be high achievers, and this separated them from the ordinary students. They believe that the average student should be able to achieve a pass without having to undertake extra reading. However, the units also include a range of activities aimed at ‘activating the text’ or, to put it in distance education language, ‘making the text interactive’. This is a feature of the self-contained material provided on the UB distance-learning programmes. They maintained that a student would need to work hard on the material provided to be able to get a pass. On the whole they thought that the students were encouraged to use library facilities.

4.3.3 NUMBER OF GRADUATED STUDENTS FROM THE CAE AND DPE PROGRAMMES

The total number of students who have graduated from the CAE programme is about 315. As the programme is in the process of being phased out, the 18 students currently on the CAE programme are in their last year. The DPE programme is in its second year of operation. No students have, therefore, graduated from DPE programme to date. A total of 1,200 students have been admitted to the programme – 600 students for each of the two cohorts now enrolled.

4.3.4 NUMBER OF STUDY CENTRES IN PLACE FOR DEU PROGRAMMES

Currently only four Colleges of Education (Primary) in the country are being used as centres for the DPE programme. The DEU staff added that arrangements were on-going for the remaining two Colleges of Education (Secondary) to be used. For the CAE programme, only one centre currently exists, and this is in Gaborone. The DEU hopes to have more study centres located in secondary schools around the country for the DPE

students. They added that since the CAE programme is being phased out, there was no need to increase the number of study centres for students on this programme. Besides, at the request of the students, it was decided that those still on it be given the opportunity of meeting in one place occasionally. The DEU staff stated that they were still committed to increasing the number of study centres around the country. They added that this idea would be revived in future when new programmes by distance delivery mode are started.

4.3.5 EXPECTED PRODUCTS OF DISTANCE EDUCATION

The DEU were questioned about the kind of products they expected from the distance education programmes of the university. They stated that they were looking forward to seeing individuals produced who would be able to effectively carry out their assignments and duties in their various organisations.

4.3.6 COMPARING DISTANCE LEARNERS WITH OTHER UNIVERSITY STUDENTS

As a follow up to the preceding question, the staff were asked their views on how distance learners compared with the rest of the university students. According to the DEU staff they claimed that in distance education, talking about parity of esteem was a common phenomenon. This meant that it was expected that their students' learning and teaching would be comparable to that of students in the conventional setting, if not better. They expected the distance learners, after graduating, to perform equally well if not better than their traditional counterparts.

4.3.7 PARITY OF TREATMENT OF THE UB DISTANCE LEARNERS WITH THEIR FACE-TO-FACE COUNTERPARTS

Since the DEU would want or expect the distance learners to perform as well as or better than conventional students, it was logical to ask them if the two categories of students were receiving equal treatment as far as academic work is concerned. The purpose of this question was to determine if the distance students were being adequately equipped to

perform on a par with their conventional colleagues. If the response was 'No', we wanted to know what features were inadequate. The responses of the staff to this question were 'yes' and 'no'.

In explaining their 'yes' response, the DEU staff claimed that better treatment was given to the distance learners because 'the modules given to them is better than the lecturer's notes'. In stating 'no' the DEU staff thought that as distance students they 'do their stuff through the back-door, they do not have the library for twenty-four hours a day'. They contended that distance students do not have counselling services in the same way that the face-to-face students have them. Other disadvantages that faced distance learners include the fact that they were far removed from their lecturers. They thereby miss the personal touch, warmth and interaction provided by face-to-face teaching throughout the entire period of study. Furthermore, distance students were unable to come together as they might wish to discuss matters as a group.

4.3.8 THE RELATIONSHIP BETWEEN THE DEU AND THE UNIVERSITY LIBRARY

The DEU strongly believed that a good working relationship existed between them and the University Library. However, they complained that there had been some occasional gaps in communication between the two departments. They claimed that the University Library was usually invited to the discussions about the programmes offered by the DEU, in order to keep the library, among other stakeholders, abreast of the developments in the DEU.

4.3.9 PROBLEMS THAT DISTANCE STUDENTS EXPERIENCE

Apart from the problems identified in 4.3.7 above, when asked about the nature of problems confronting distance learners of the university, the DEU staff reiterated their belief that the problems highlighted by Dodds (1986) are the same as those being experienced by their distance learners. Among others, these included the following:

- The problem of the isolation of learners.
- The tendency of the learners to depend on rote learning.
- The possibility that the learners who undergo this programme might be stale.
- The possibility of attendant high drop out rate in some programmes.

4.3.10 DISTANCE STUDENTS' CONTACTS WITH THE UNIVERSITY LIBRARY

The question asked in this section dealt with the frequency that they thought their distance learners contacted the university library and the type of problems students faced in doing so. They felt they were unable to answer the question. However, they were aware that only a relatively insignificant few were going to the library regularly, and that those in remote areas might not be going to any library at all. According to them, the reasons why students would go to the library would be for information to write their assignments, and also to refer to materials recommended for further reading in their courses.

4.3.11 KNOWLEDGE OF WHETHER THE STUDENTS USE OTHER LIBRARIES

The DEU were asked whether or not they were aware that students make use of other libraries apart from the UBL. They claimed they actually encouraged them to use any library close to them. Since the residential programmes organised for the DPE students take place in institutions running a similar programme (that is in the Colleges of Education) they believed that the students used the libraries in those institutions, at least during the period of the residential programme. They also stated that arrangements had been put in place to ensure that libraries in these institutions operated longer opening hours during the residential programme, and that the librarians in these Colleges were paid overtime for working during the residential programme. With this structure in place, they concluded that the students had to be using other libraries apart from the UBL. They

also said that both the CAE and DPE students were encouraged to use BNLS library branches close to where they live or work.

4.3.12 EXTENT TO WHICH STUDENTS USE OTHER LIBRARIES

The DEU were unable to make a categorical statement on the extent to which their distance learners use other libraries. They thought that opening hours were normally extended for the students to use the libraries during the residential programme, for which the librarians were paid overtime. They could only hope that the students made judicious use of these facilities that were being paid for while they were on the residential programme.

4.3.13 INVOLVEMENT OF THE LIBRARY IN THE PLANNING AND THINKING OF THE DEU

The purpose of asking this question was to see if we could determine the extent of the relationship existing between the DEU and the library, and the degree to which the library is involved in the plans and thinking of the DEU. Information was also sought as to how the involvement has assisted the library in drawing up their plans and strategies for providing library and information services for distance learners. The response elicited was that the library was not always adequately involved in the thinking and planning of the DEU. While they were 'not sure of where to lay the blame', it was suggested that this could be an oversight on the part of the DEU.

4.3.14 CHANGE IN THE PRESENT STRUCTURE AND PROCEDURES OF THE DEU

As to what should be changed in the present structure and procedures of the DEU, the DEU staff argued that the perception of the community should be positive toward programmes being delivered by the distance delivery mode. They were also convinced that the unit needs a strong research and training base to keep the Unit aware of current

and successful practices elsewhere. They also wanted to see an environment that was self-contained in terms of availability of materials and people to work in it. Finally they identified the need to acquire leadership skills that would ensure that the DEU are respected for their academic prowess within the context of a university and tertiary education.

4.3.15 WHY THE CAE PROGRAMME IS BEING PHASED OUT

It has been noted that one of the programmes currently being run by distance delivery mode, the CAE, is in the process of being phased out. The current students are the last cohort of the programme, and are in their last year. In only a few more months they finish, and the CAE programme will cease to exist. We wanted to know why the Distance Education Unit was phasing out the programme. According to the DEU staff, the original client, the Department of Non-formal Education (DNFE), that sponsored the students on this programme, was raising the entry requirement for their Department. They explained that the lowest qualification for entry to the DNFE is now the Diploma in Adult Education. It was therefore decided to phase out the CAE programme and introduce the Diploma in Adult Education (DAE) programme instead. They added that other potential clients had agreed to this decision.

4.3.16 DROP-OUT RATE FROM THE CAE AND DPE PROGRAMMES

Information was sought on the drop-out rate from the CAE and DPE programmes, and what accounted for it. This question was asked to see if the problem of dropping-out could in any way be related to the provision or non-provision of library services to the students, especially those in remote locations. While the actual figures for drop out could not be established, the DEU staff claimed that the number was usually very small and constituted a low percentage of those enrolled.

With regard to the question as to what accounted for failure or dropping out, the DEU staff thought that this might be the rigour of the system for the DPE students, plus the fact

that some drop out because they have received sponsorship from the Government to attend a full-time programme elsewhere. With respect to the CAE programme, they thought that the growing incidence of self-sponsorship by students is creating its own problem. They affirmed again that the number is small. There have also been a few deaths.

4.3.17 FURTHER AREAS IDENTIFIED

To identify issues that might not have been mentioned but are pertinent to the topic, and in order to give the DEU staff the opportunity to air their views and opinions, it was decided to ask if there were any further aspects they would like to bring to the attention of the researcher. In response to this, the first suggestion offered was concerning the library. They wished to ensure that the librarians handling distance learners were exposed to appropriate training through conferences, seminars and workshops on this new aspect of librarianship. They believed that attendance at international conferences would enable the librarians to be exposed to and learn from their colleagues handling library and information services for this category of students in other parts of the world. They thought that the University library should also establish links with other related institutions, both within and outside the country. They suggested that the university library would also benefit from partnership with other libraries in the country. They also hinted that the DEU was expected to start using high technology soon with the introduction of a University-wide video conferencing facility. They made an appeal to both the university community and the general public not to see distance education as second rate education, but as a viable complement to the existing systems – one that makes use of the best available methods, media, personnel and resources to achieve excellence.

4.4 ISSUES DISCUSSED WITH THE LIBRARIANS

4.4.1 UTILISATION OF AVAILABLE LIBRARY RESOURCES AND SERVICES BY DISTANCE LEARNERS

Although the library may provide resources and services, it is not always the case that those for whom they are made available will use them. This led us to ask the librarians in charge of the distance learners whether or not the services and resources that the library provide for the distance learners were being utilised by them. In the responses to the questions asked, it became clear that the distance learners were not adequately utilising the resources and services available to them.

4.4.2 DISPARITY IN THE SERVICE RENDERED TO DISTANCE LEARNERS AND TRADITIONAL STUDENTS

The response of the library staff as to whether or not there should be any disparity in the services rendered to distance learners and their counterparts in the face-to-face system was that the most difficult customers of a library to satisfy, particularly in a dual-mode environment, were distance learners. They traced the reason for this assertion to the way programmes had to be delivered to distance learners. Distance learners were usually spread all over the country, and some of the very remotest areas were not within easy reach. They added that it was the fact that the students were very widely dispersed that caused them to be the most difficult customers of the library to deal with. They disclosed that it was the wish of the library to provide easy accessibility to the library facilities of the University to this group of people. They stated that there should be no disparity in the services rendered to distance learners and the traditional students. They added that justice and equity demanded that the two groups of students should be treated equally. They confessed, however, that the reality was that a wide gap existed between the treatment given to the conventional students and that offered to the distance learners.

4.4.3 HOW THE LIBRARY PROVIDES ITS SERVICES TO DISTANCE LEARNERS

Knowing the nature of distance education, we asked the librarians how the library provides its services to distance learners, particularly those in the remote areas. The librarians claimed that they took the advantage of the efficient telephone service in the country to the maximum. This efficient telephone facility is also available in the villages across the country. It was therefore not too problematic for students to get in touch with the library from their remote areas. Material could be posted to the students directly, or to the nearby BNLS branch library from where the students could collect them. Such material, according to the librarians, could be returned in a similar fashion. They also felt that they were already informally taking advantage of the BNLS that has its branches spread all over the country. In doing this the requests made by the distance learners through the BNLS branch libraries were normally attended to in the form of inter-library loans that could be sent to any of the UB branch libraries. Apart from getting in touch with the library by telephone, the students were also given the fax number of all the library branches. It was possible for library staff to use fax machines in their offices to make their requests. They observed that the students who had access to email could also make their requests through this facility.

4.4.4 SERVICES AVAILABLE TO TRADITIONAL STUDENTS BUT NOT TO THE DISTANCE LEARNERS

A question was asked that dealt with the differential treatment meted out to distance learners and the traditional students. We wanted to know the extent to which distance learners were disadvantaged. The question asked was which services were available to the traditional students that were not available to the distance learners. In their response the librarians observed that through living on campus or being on a face-to-face programme, conventional students enjoyed great advantages over their distance-learning counterparts in many areas. For instance, it was easy for the traditional students to consult with their subject librarians without having to pay the telephone bill; they could use many methods and formats to retrieve whatever information they needed; they did not have to

depend on someone else to do their searching for them. They declared that they had easy access to the facilities such as the Internet and email, and that they did not experience any delay in obtaining information needed. This was not so with the distance learners who are at the mercy of the post and telecommunication systems through which material is sent to them. They also thought that all students of the university, except the distance learners, participated in the information literacy skills (ILS) programme that was being taught as a credit-earning course to the face-to-face students. They regretted that, important as the ILS course was, it was not yet introduced to distance learners of the University. One other advantage that the traditional students had was that they were made aware of current services available to them. The librarians explained that they compiled lists of new books and made photocopies of the contents pages of journals on subscription. These were circulated to inform students of the new arrivals and material in the library.

4.4.5 NATURE OF THE PROBLEMS THAT DISTANCE STUDENTS EXPERIENCE

We wanted to know whether the library was aware of the problems confronting distance learners. The respondents were asked what kind of problems the distance learners had. The librarians enumerated a number of problems they knew that the learners could be encountering. These, according to them, included that they did not receive responses to their requests in timely fashion, that they were unable to consult with their subject librarians without having to pay for telephone calls, and that they could not adequately conduct literature searches. Another problem was the distances many had to travel to get to the UBL or any of the branch libraries or, in some cases, even the BNLS library that has several branches spread all over the country. They also mentioned the fact that the UBL had yet to finalise special arrangements for them to use other libraries. This caused problems for the students. Finally, distance students had great difficulty in gaining access to the Internet, and this was another problem they were facing.

4.4.6 DISTANCE STUDENTS' CONTACT WITH THE LIBRARY

In responding to the question as to how often the distance learners contacted the library, the librarians stated that those living near the UBL or one of its branches did not have any problem. Students in these areas could go to the library as often as they wished. Where problems arose mostly, according to library staff, was how to provide service for the students in rural areas. They regretted that necessary infrastructures were not in place yet to do this or to monitor them. However, they were aware that the students visited public libraries nearest to them. They thought that the students went to the library mostly during their leave and holidays. For those who live in areas where there is a UB library, they often visited it after school hours.

On the question about the type of problems the students brought to the library, the staff stated that they ranged from how to get materials for further reading or to write their assignment, to such problems as that there were not enough copies of certain books. With regard to those in the rural areas and places far removed from the UB branch libraries, they thought that such students often complained that the public libraries they used did not stock materials that were relevant for their use. In addition, they complained that when materials were requested through inter-library loans it often took a long time for the materials to arrive and sometimes would not arrive at all.

4.4.7 STATISTICS OF REQUESTS FOR BOOKS, ARTICLES AND OTHER MATERIALS BY DISTANCE LEARNERS

On the question of whether there were any statistics on the requests made for books, articles and other materials by the distance learners, the librarians stated that no separate statistics were kept for the distance learners. They added that they did not want to see different treatment of the two groups of students, the traditional and the non-traditional students. However, they stated that plans were being made to collect separate statistics for the two groups of students as it had become necessary.

4.4.8 KNOWLEDGE OF WHETHER THE STUDENTS MAKE USE OF OTHER LIBRARIES

The response to the question as to whether the library staff knew that the students made use of other libraries was in the affirmative. Specifically, they mentioned that they used the BNLS that has branch libraries in various places in the country.

4.4.9 EXTENT TO WHICH STUDENTS USE OTHER LIBRARIES

When the librarians were asked whether they knew the extent to which the students use other libraries, they were unable to say precisely. They thought it natural for the students to look for information and necessary assistance when they had assignments to complete. They also expected them to use the libraries nearest to them during the weekends, since the students had time to spare for studies at weekends. In practice they mostly sought materials and books that were listed for further reading at the end of each unit of their modules.

4.4.10 COMMUNICATION BETWEEN THE DEU AND THE LIBRARY ON THE THINKING OF THE DEU

The respondents were asked if the library received adequate information on the thinking of the DEU in relation to their programmes. The response to this question was both 'yes' and 'no'. According to the library staff there were some issues about which the library was adequately informed. However, there were many other salient issues that the library ought to be informed about but, either by commission or omission, the DEU did not provide the information expected. They thought that the Library had initiated a number of meetings with the DEU to ensure that there was an adequate flow of information and that the library was acquainted with the way the DEU operated and what it was planning. This view appears to coincide with that expressed by the DEU staff, who informed the researcher that the library was not always adequately involved in the thinking and planning of the DEU. This was in response to the similar question posed to the DEU staff. The librarians thought that they were not getting maximum cooperation from the DEU. However, they did state that the DEU was gradually improving in these matters.

4.4.11 REGULARITY AND ADEQUACY OF INTERACTION BETWEEN THE DEU AND THE LIBRARY

The respondents were asked how regular and adequate the interaction was between the DEU and the library. The response was that there was no fixed schedule as to when the two departments met. Meetings were arranged on the initiative of either of the two parties, depending on who wished to raise and discuss an issue. The librarians thought that the library, after the restructuring that recently took place, now had a unit called Customer and Extension Services (CES), headed by a deputy director. This is the unit now responsible for dealing with the DEU. Since its inauguration the CES, they maintained, had been in constant touch with the DEU to discuss how best to serve the distance learners of the university.

4.4.12 LIBRARY PLANS FOR DISTANCE LEARNERS

When asked of the plans the library was considering putting in place for distance learners, the librarians suggested the following list:

4.4.12.1 Document delivery

The Customer and Extension Services, through the Inter-library Loans unit, promised to meet requests for articles by students and for those recommended by their tutors. A form has been designed for this purpose.

4.4.12.2 Literature search

The library would provide literature searches from relevant databases in the library on specific project topics on behalf of the students, as soon as the library was notified of the request.

4.4.12.3 Library orientation

The library would provide general library orientation and other services that would equip the distance learners with the skills to use any library with ease.

4.4.12.4 Web OPAC

Adequate training on remote access on Web OPAC would be provided for those who have access to the Internet.

4.4.12.5 Contents pages of journals

This service involves photocopying of the Contents Pages from a selected list of journals and sending them to the students. Students would be encouraged to identify from the list relevant articles, which the library would photocopy from the local collection or obtain through the inter-library loans system. The cooperation of the tutors was also expected in identifying relevant journal titles, which the library would scan for the table of contents.

4.4.12.6 Postal service

A postal service with the expenses borne by the library is to be put in place for registered distance-learning students. They might have to pay for the return of the items posted to them. Bibliographies will be compiled using the OPAC and sent to some selected locations across the country.

4.4.12.7 Reference/Enquiries

Telephone requests for information would continue to be dealt with. Similarly, enquiries and reference questions would also be attended to in person, by e-mail, by fax, or by post.

It is understood that the students would be informed about all the library services available to them at the time of registering. Forms would, at the same time, be handed out so that they would be able to order materials from the library or obtain photocopies.

4.4.13 THE PERCEPTION OF DISTANCE EDUCATION AS CURRENTLY PROVIDED BY THE UB

In a bid to let the librarians air their views on the present procedures of the provision of distance education at the University of Botswana, they were asked about their perception of the present mode of providing distance education. According to the librarians they believed that though a great deal had been done, so much more was necessary. They recommended that the DEU should be more responsive to other University sections such as the UBL. They believed that much still needed to be done in their marketing strategy. Besides, the major stakeholders, like the library should be properly and adequately involved in distance education. They advocated for more university-wide consultation by the DEU.

4.4.14 PRODUCTS EXPECTED FROM THE DISTANCE EDUCATION PROGRAMMES OF THE UB

When the librarians were asked as to the kind of products they expected from the distance education programmes of the UB, they expected a well-finished product. They added that the UB is not the first institution to be involved in distance learning. They quoted other well-established institutions, even within the Southern African region, where programmes are run via the distance delivery mode and the products of the institutions concerned have been tested and found adequate. They felt that the products they expect from the distance education programme of the UB should also be the same good human resource material.

4.4.15 HOW THE DISTANCE LEARNERS COMPARE WITH OTHER UNIVERSITY GRADUATES

The librarians' response as to how the distance learners should compare with the rest of the University graduates was simple. They thought that they should compare well with them.

4.5 SUMMARY AND CONCLUSION

Primarily, the purpose of this chapter was to obtain the views of the subjects on their involvement with the library and its services in relation to the distance-learning programme offered by the University of Botswana. The subjects involved were the distance-learning students of the present two programmes delivered by distance mode by the university. Others were the providers of the programme, and the staff of the university library. This is the agency that provides library and information services for the distance learners of the University.

The author was particularly pleased that the results of his investigation supported the hypotheses formulated in Chapter One, and that the research discussion proceeded as envisioned. We were able to appreciate the dilemmas and difficulties of the students, particularly those who live a long way from the library. It is apparent that the involvement of, and the accessibility to, the library plays a significant role in distance learning, and that non-accessibility of students to a library makes them feel very much disadvantaged. It is evident from the accounts given by the students that many had to depend solely on the notes and modules given to them to write assignments and prepare for examinations. Unfortunately, relying completely on these notes and modules resulted in critical comments from their tutors who often 'reprimand' them for depending on the modules only for doing their assignments. It was also observed with regret that some of them require up to two days travel to get to the nearest UB Library branch. While some of them found material and resources in public libraries, there is a problem of a lack of relevant materials for their use in these libraries. To compound the problem, they were concerned that the University Library did not make any special arrangements for them to use even the national libraries.

Whilst the University Library may be advantaged by the availability of computer mediated infrastructures like the Internet, the distance education students lack such facilities not only at home but also at their workplaces. Indeed the vast majority of the

students did not even have a basic knowledge of the computer and its associated resources, including the Internet. Thus great difficulty is experienced because they can neither access university library catalogues nor enjoy easy contact with their library via such facilities as email, for example. Their overwhelmingly disadvantaged position makes them feel the great disparity that exists between them and the traditional students. There is a large gap in the way the two groups are treated by the University library. However, from the information elicited from both the DEU and Library staff, it is acknowledged that a great deal still needs to be done.

From the research findings and the discussion of them in this chapter, it is evident that some critical challenges have been identified. However, it is not enough to simply identify these challenges; concrete action must be taken. Therefore, the next chapter, which concludes the study, offers recommendations on what could be done, and the direction to take, and a roadmap is provided for getting there.

CHAPTER FIVE

5 CONCLUSION AND RECOMMENDATIONS

5.1 INTRODUCTION

As stated in Chapter one, the main purpose of this study was to examine the involvement of the library of the University of Botswana in the distance education programmes of the university, to see if there is room for improvement in the service rendered, and to offer suggestions for better services to distance learners. In pursuance of this goal some objectives and hypotheses were formulated (as noted in chapter one), a review of literature was undertaken and questionnaires were used as tools or instruments of research. This was demonstrated in chapters two and three respectively. This chapter is concerned with bringing together the trends that have emerged from the study. On the basis of the results of this study, the most important conclusions are identified, some implications noted and major recommendations made.

5.2 CONCLUSION

It was noted in the last chapter that there are many perspectives from which problems could be perceived. The study has highlighted some issues on students' personal information relating to their studies. These indicated that a vast majority of the students live or work in rural areas that are far beyond easy reach of libraries (See Chapter 4.2.1.4 under 'Place and location of work'). It is also worthy of note to remember that some of the distance learners not only switch between work and study, they also have physical disabilities that make it even more difficult for them to get to a library. The study discussed students' library utilisation patterns. Issues raised included: whether or not they felt the need to supplement the course materials provided with additional reading matter; the extent to which they used the library and whether they did so; the reasons for using a library; and the library training they had received. The study also attempted to shed light

on whether the distance learners were familiar with the university library. For instance, most of the responses to the questions dealing with the distance between where they lived to the nearest UBL branch, and whether any special arrangements were made for them to use the library and get access to the knowledge of subject librarians, indicated that the UB distance learners are strangers to a library environment that is supposed to be familiar to them. As if this was not enough, distance students have little knowledge of the modern information and communication technology systems that could be used to access library databases, or to use the email facilities to get in touch with their subject librarians from a distance. Very few of the students who responded know about, or have access to, computer Internet facilities whether at home, at work or elsewhere.

Realising their predicament the students could not but draw attention to their situation in which they did not have easy access to an adequately equipped library. Whilst some of them undertook a long trek to the widespread public libraries, more often than not they were frustrated because they were unable to get relevant materials for their courses and assignments. This is because public libraries are not properly equipped to meet the kind of demands being placed on them by distance university students.

As far as the DEU was concerned, the study also underscored the held view that though the students were given self-contained course materials and modules, tutors encouraged them to use library facilities to supplement these. However, the majority of students did not find libraries that took care of their needs in the remote locations where they lived or worked. Consequently, they had to make use of the course materials given to them to write assignments and prepare for examinations. It was also noted during the researcher's interviews with the DEU staff that, either through oversight or deliberately, the library was not normally involved in the thinking and planning of the DEU. This assertion was corroborated during the discussion with the librarians. Despite this the DEU expects the distance learners to achieve as well as, if not better than, the rest of the university graduates.

With regard to interaction with the library, the study reflected the librarians' belief in providing equity of service and that there be no disparity in the treatment of distance learners and their traditional counterparts. Yet many gaps were perceived in the present handling of the two groups as the librarians described the services that the traditional students currently enjoy that are not available to distance learners. Despite these inadequacies, the librarians desired that the products of distance education would compare favourably with their face-to-face colleagues being taught face-to-face who presently appear to receive better treatment. The librarians wanted this in spite of their in-depth appreciation of the problems confronting the distance .

In the various areas that this study covered, there is no doubting the fact that whilst there were encouraging situations, some disturbing features were noted in some other areas. In the light of the above, it is clear that every effort must be made to offer adequate solutions, as a number of areas require attention. These areas were identified by the library staff, the students, and the DEU - the providers of distance education programmes at the university. The findings, therefore, call for urgent, holistic and targeted efforts to ensure that adequate infrastructures are put in place.

5.3 IMPLICATIONS

This section is concerned with bringing together some developments that have emerged from this study. These form the groundwork that leads to the recommendations of this study. What follows, therefore, is a brief discussion of the implications of the research findings and a discussion of the literature review, which also formed a part of the methodology adopted for this research. The implications are divided into groups as stated below:

5.3.1 IMPLICATIONS OF RESEARCH FINDINGS ON THE ROLE OF THE LIBRARY

This study has examined the responsibility and role of the library in the distance-learning programme of the University of Botswana. This has provided an understanding of what the role of the library was and is, what the library has done on the one hand, and what the feelings of the students are about the facilities and services put in place by the library, on the other. This, in turn, has provided a concrete base from which recommendations can be made. The findings supported one of the hypotheses: that the involvement of the library plays a significant role in distance learning, and that the inability of distance learners to have easy access to library facilities would have a negative impact on the performance of students. An example would be appropriate here. Some respondents claimed that they were denied high marks because they could only ‘regurgitate’ what they read from their course modules when writing assignments, since they did not have a library available to provide them with additional sources of information. The majority of the respondents made it clear that they were willing to use library facilities if they were available.

5.3.2 IMPLICATIONS OF RESEARCH FINDINGS ON NON-AVAILABILITY OF ADEQUATE BRANCH LIBRARIES AND COMPUTER MEDIATED FACILITIES FOR DISTANCE LEARNERS

The findings show that the UB branch libraries are located in only two cities in the country. The way this affects the scattered distance learners has been analysed and discussed. Coupled with this is the non-availability or non-provision of adequate modern technology (such as the Internet) in strategic locations across the country that could be used by the distance learners.

The second hypothesis of this study is supported by the findings: distance learners of the university are further disadvantaged because of the absence of branch libraries and necessary computer-based infrastructures (including Internet facilities) in many parts of

the country. When Internet facilities are not readily available, difficulty is experienced by distance learners in gaining access to the university library web-page. The challenge here is to seize the opportunity and develop the necessary strategies and infrastructures aimed at facilitating a better support service to the distance learners who are scattered across the country.

5.3.3 IMPLICATIONS OF THE LITERATURE REVIEW

The enormous value of the WWW or the Internet in the provision of library and information services to distance learners has been amply demonstrated in the review of the literature. It was argued that the converging technologies, the rapid development and widespread acceptance of the Internet, and the application of the World Wide Web in education have created a lasting impact on the development of distance education programmes in the last decade. It was also seen that the technologies have also revolutionised the dispensation of library and information services within the same period. Examples were given of some institutions where these modern technologies were being applied in library and information services to the great advantage of distance learners.

The third hypothesis of the study is corroborated by the findings. This stated that the advent of the World Wide Web is having a major impact on library and information distribution particularly to distance learners. This ICT has not been fully exploited to the advantage of the distance learners of the University of Botswana. Though available at the University of Botswana Library and the branch libraries, no effort is apparently being made to put these infrastructures in place to the advantage of distance learners. In expressing their wish to know how to use a computerised library system, the distance learners have clearly indicated that special training should be organised for them.

5.3.4 OTHER IMPLICATIONS

5.3.4.1 The DEU and the Library

In the light of the insistence of both the DEU and the library that they expected the products of the distance education programme of the University to be as good as, if not better than, other graduates of the university, in fairness the two departments must not ignore the problems confronting distance students. A great deal of responsibility, therefore, rests squarely on the shoulders of the two departments to ensure maximum cooperation with one another. The question of the right hand not knowing what the left hand is doing should not arise. A situation where one department has, either consciously or unconsciously, failed to carry the other along greatly disadvantages these students.

5.3.4.2 The University of Botswana library

Any conceptual plan of action by the UB Library to take its services to the doorsteps of the distance-learning students of the university should take into account the potential invaluable collaborative or joint role that can be undertaken with other similar institutions within the country.

5.4 RECOMMENDATIONS

This section attempts to provide recommendations based on the entire study. It is made up of four sections. One section provides some guidelines to the distance learners, the second presents some suggestions to the DEU - the unit charged with the responsibility of taking the university to the people. Another section is devoted to the Library - the department that has the responsibility of providing library and information support services to the scattered off-campus students. The last section offers concluding remarks.

5.4.1 DISTANCE LEARNERS

5.4.1.1 Development of reading culture

Even though the employment status of the respondents indicated that there was not one of them without a job, there were at least 15 of the respondents (see Figure 3) who stated that they were engaged in part-time employment. What is surprising is that despite the fact that at least eleven of this group live in towns or close to the UBL, only two of them claimed that they visit the library once a week. The rest visit either once a month or once in three months. Besides, as seen in Figure 9, the extent of library use is not encouraging. There were some respondents who believe that the modules or course materials given to them were sufficient, and that there was no need for any additional or supplementary reading (Figure 7). Even then, there were indications that some of the respondents who live or work in urban centres where the university has a branch library claimed they did not have time to visit the library. All this boils down to the absence of a reading culture. It is therefore important that the students themselves cultivate the habit of developing a reading culture.

5.4.1.2 Purpose of using the library

It was noted that the students understanding of purpose for which they could use the library was mainly to read and see if they could access prescribed or recommended materials. Only relatively few visit the library for other very useful purposes like research, to use computer or to surf the Internet. As noted in Figure 10, only a handful of the respondents – 24 (8.7 percent) maintained that they make use of reprographic (photocopying) services in the library. Using a computer in the library was the activity that had the least adherents among the respondents (see Figure 10). It is strongly recommended that there is a need for students to know and be familiar with uses of the library other than for reading material suggested in the modules given to them.

5.4.1.3 Knowledge of ICT

We are now living in a world where there is rapid evolution in the new global information infrastructure, where the old order of producing materials in print form is gradually giving way to the proliferation of digital resources. Barnard (1999) wrote that, “even these digital media have quickly moved from stand-alone CD-ROMs to local area networks within libraries, then to campus-wide area networks, and finally to World Wide Web sites on the Internet”. This aptly describes the situation at the University of Botswana Library. What is worrisome is that despite the fact that the distance students are aware that many of the services of the UB library are available in digital form, they nevertheless show little or no enthusiasm to acquire the necessary skills that will make them functional in this environment. For instance, Figure 16 shows that only 12 (4.4 percent) of the respondents have knowledge of the Internet. Apparently no effort has been made by the distance learners to respond to the demands of modern technology. Indeed, when asked, many of them did not know whether there was an Internet café in their locality or not. In the light of the above it is important to let the students know that they can enjoy their studies more, and obtain adequate or better support services as distance learners if they offer themselves for training in the use of these technologies.

5.4.1.4 Use of other libraries

It is surprising to note that a significant number of the respondents had never used any library. Their excuse was that there was no library available where they lived. Figure 8 indicates that 28.7 percent of the respondents reported that they had never used any library facilities. Some of them have been studying for up to two years, yet they claimed it had not been possible for them to visit a library even once. Even though the UBL or its branch libraries may be at a distance from where many of these students live, some other libraries, especially the Botswana National Library Service, has more than twenty branches spread across the country and offer free services that the students could use even on weekends. In addition, there is an existing alliance between the UBL and the

College of Education libraries. Being affiliated institutions to the University of Botswana, it is possible for the distance learners to use the facilities in these college libraries, most of which stock materials relevant to distance education courses.

5.4.2 DISTANCE EDUCATION UNIT

In the light of our findings from the study the following recommendations may be pertinent for the DEU to take cognisance of.

5.4.2.1 Clear policy on the use of the Library

One of the issues that came up in the study that calls for further clarification was the use of the library by distance learners. The respondents were asked whether it was a clearly stated requirement of their course that they should make use of libraries. Even though a majority of the students answered “yes”, some of them offered “no”, or that they “don’t know”. There should be no reason for confusion. The erroneous impression that they do not have to use the library, probably accounts for much of the reason why some students were not eager to use library facilities. The DEU policy should be very clear on this, and the students should be informed.

5.4.2.2 Opening of study centres

At present there seem to be no study centres. Our discussions with the DEU revealed that what is in place are the occasional residential programmes for the distance learners. It is also significant that there are hardly any residential programmes for distance learners that take place on the UB campus or any of the satellite campuses. This completely rules out the idea of the students visiting their university campus and interacting with any of the support units like the library and counselling services. Apart from the fact that students would have the advantage of coming together more frequently to discuss and share views thereby offsetting isolation, it would also facilitate bringing a human face to a seemingly anonymous form of education, since tutors would also be at the study centres to meet

their students. In addition, it would be possible for the library, too, to make more formal arrangements about seeing and giving more and better services to the students.

5.4.2.3 Harmonious relationships with the UBL

Though this is further discussed under the ‘Partnership with faculty’ section below, it is important to stress here that there is need for both the DEU and the Library to see each other as members of the same team whose unity and harmonious relationship would benefit them, and work to the advantage of their distance customers. The results of this study suggest that proper coordination on the thinking and planning of programmes does not take place between the two departments. Either by commission or omission, the Library is not involved in some issues when it should be. The Library should not have to seek information from the DEU: the DEU should volunteer the information. Indeed, the Library should not be kept in the dark as to what is going on in the DEU as far as the distance programmes are concerned. The Library should be represented in most of the meetings that the DEU holds. The DEU should regard the Library as a partner, especially in providing distance education.

5.4.3 LIBRARY

The results of this study have revealed that the University of Botswana Library still has a lot to do in order that distance learners of the university do not feel estranged from its operations and services. In this context the following suggestions are offered for consideration.

5.4.3.1 Establishment of satellite branch libraries

Distance education has demonstrated that it is a form of education that knows no boundary in terms of where the student could live to undertake his studies. Unlike the

traditional system where students are confined in a face-to-face dialogue with the teacher, and where students are free at any time during the opening hours to walk into the library to obtain what he wants and to meet his subject librarian, the situation is different in distance learning. It is known that whilst distance learning appeals to people in urban or metropolitan areas, it also has many adherents in rural areas. The findings in this research, as shown in Figure 4, have established that a vast majority of UB distance learners work or live in rural areas. It was recorded that 237 respondents (86.2 percent) live or work in the rural areas, while the rest live in urban centres.

In contrast, the two main branches of the University Library are in the cities and they are far removed in most cases from where the majority of students live. When asked for the distance, and the travelling time to get to the nearest UB branch library, the responses were as varied as they were disturbing. In some cases the distances are between 1000 and 1300 kilometres, and in some instances it could take up to two days to reach a library. To find out whether library services would be needed or not, students were asked whether they felt the need to supplement the course materials provided with additional reading. An overwhelming 217 respondents (78.9 percent) wrote they felt the need 'a great deal', and 46 respondents (16.7 percent) 'just a little'. Only 12 respondents (4.4 percent) thought 'not at all'. In other words, as many as 263 respondents (95.6 percent) felt the need in one way or another to supplement the provided course materials with additional reading.

Even when those who had not been using any library facilities were asked if they expected to use the library in future for their course, 72 out of 79 respondents (91.1 percent) in this group answered 'Yes' (see Figure 11). These findings suggest that only the library can satisfy the demand for further reading on the part of the distance learners.

In order to adequately satisfy the needs of and to cater for these students the UBL should, apart from going into partnership with other libraries (see below), expand by putting up more satellite branch libraries around the country. Not all these branch libraries have to be big or staffed with a large number of personnel, but they do need to be equipped with good communication facilities. Such a step would be particularly appropriate, now that it

has been confirmed that the DEU is committed towards substantially increasing the number of programmes and courses being run by the distance-learning mode.

5.4.3.2 Training for students

While comparing information searching in the traditional printed sources with a computerised based system, Terena and Margaret Isaacs (2000) declared that, “with traditional printed sources, the main requirement for information searching was knowledge of where to look”. Whereas with computerised bibliographic databases, they wrote that, “focus shifted to the techniques for searching them, from *where* to the *how*”. They hinted that as a result of the massive array of services available in the library on-line resources, effective searching would require both a mastery of techniques and knowledge of sources. To obtain these the students would need adequate training and orientation.

In the bid to determine the training need, respondents were asked whether they had training in the use of libraries as part of their course or not. 133 of the respondents (48.4 percent) claimed they had not received any training, while 142 (51.6 percent) stated that they had. Even then, a high proportion of those who responded “yes” disclosed that the training received was not thorough. Some stated that they were trained during an orientation programme organised for them when they registered, and others said that they received their training outside the university from the public library they used. It is suffice to say that even in a manually operated library, there is need to educate users on the modes of operation in the library. This is even more important in a library environment that is fully automated or assisted by computerisation.

Similarly to Appleton (1993) at the University of Queensland in Australia, this study also investigated access by electronic means to library resources for distance learners, and their ability to deal with the technology required for this access. The results indicated that only 12 out of 275 respondents (4.4 percent) asserted that they had knowledge of the Internet (Figure 16), while only 7 respondents (2.5 percent) had access to the Internet at

home, at work or elsewhere (Figure 17). This picture poses the serious challenge that the library has to face if the distance learners of the University of Botswana are to be properly trained and updated to effectively utilise the library and information support services.

In order for these students to be operational in any library environment - be it a manually operated system or one driven by technology - and in order for them to acquire a mastery of the techniques and knowledge of sources to operate on their own in any library, they must be exposed to proper and adequate training. Only this can ensure their effective utilisation of the library.

5.4.3.2.1 Teaching of information literacy skills

Extensive attention has been paid to the teaching of information literacy skills (ILS) in the literature review. At the University of Botswana the teaching and learning of ILS is compulsory for both library staff and enrolled students. Apparently one of the issues that may determine how the distance learners will compare with their on-campus counterparts are their information and literacy skills. Admittedly, the teaching of ILS by the librarians is bound to pose a challenge to the librarians bearing in mind the fact that the students – the distance learners, are out of sight. But then, as highlighted in the section “Distance education and teaching” in chapter one librarians too should take up the challenge and work out how to teach ILS at a distance, just as other courses have to be taught in modular format to distance learners.

5.4.3.2.2 Brief curriculum outlines

In the light of what has been found out about the distance learners who are the primary subjects in this study, it is appropriate to highlight some areas in which the students might be given training for them to be more effective in the use of the library. Apart from the fact that the students will need to have knowledge of word processing, special focus in

the following areas is considered necessary for them to make full use of the electronic information available.

5.4.3.2.2.1 Information concept and skills

- Information concept and definition
- Information format: printed, non-printed and electronic
- CD-ROM databases and other electronic databases
- Local area network and network resources

5.4.3.2.2.2 Library organisation

- Organization of Information
- Library and library organisation (classification systems: including DDC and LC)
- The University of Botswana Library collection

5.4.3.2.2.3 Information access tools

- Library Catalogues
- On-line public access catalogue (OPAC)
- Bibliographies
- Reference materials: concept, general and specialised reference sources
- Inter-library loans

5.4.3.2.2.4 Electronic communication

- Electronic mail
- Receiving and opening an e-mail message
- Replying and forwarding an e-mail message
- Creating a new message
- Sending e-mail with attachments and spell checking
- Highlighting and deleting material such as an e-mail message

- Creating mailing lists

5.4.3.2.2.5 The WWW/Internet

- Web browsers, such as Internet Explorer and Netscape Communicator etc.
- Search engines and searching strategies
- Uniform resource locator (URL or Web address) and pathnames
- Bookmark
- Text and hypertext
- Links and hyperlinks
- Application of various functions such as scroll bar and back and forward buttons
- Information download

5.4.3.3 Partnership with faculty

Whilst advocating partnerships for the librarian and faculty for curriculum enrichment in distance education, Heller-Ross (1996) wrote, “curriculum enrichment is the process whereby librarians assist faculty to broaden their resources beyond the standard textbook”. She supposed that librarians are capable of providing research assistance to faculty as they develop their courses and create reading reserve lists. She enumerated the following strategies employed in Plattsburgh, her college: (1) meeting regularly with faculty to discuss the courses and library involvement; (2) reading copies of course syllabi and offering ideas; (3) attending classes to get a real sense of the courses; and (4) consulting regularly with faculty for input on library acquisitions.

The above issues are some of the reasons why the library should enter into good relationships and partnerships with faculty in general and DEU in particular in the University of Botswana. If this is achieved, the librarians would be able to adequately perform their liaison responsibilities with the faculty. The question of DEU not furnishing the library with adequate information on their thinking and planning would no

longer be relevant. With these relationships in place, both the DEU and the Library would be so much closer to one another.

5.4.3.4 Library service for disabled distance learners

Because of the nature of their mode of study and the remoteness of where many of them live or work, distance learners have generally been regarded as the most difficult customers of the library to cater for properly. A problem situation is when a distance learner has a disability, and this presents an even greater challenge. Figure 5 records information about some of the distance learners of UB who stated that they had a disability, and, as a result, they found it difficult to visit a library. The problems of these students are far greater than those of “normal” distance learners. The library needs to bear in mind that the disability of some students should not prevent them from accessing the library and information services that are to be provided for distance learners. The library needs to take special note of handicapped learners, where they live or work and the nature of their disability, and to give them special consideration or provide specialised services for them in the course of delivering services to distance learners.

5.4.3.5 Special arrangements for use of other libraries

The UBL may be misled to think that it can adequately satisfy the needs of their remote distance learners, whilst its three branch libraries are concentrated in only two cities in the country. The literature shows the need for libraries involved in distance learning to engage in collaboration or partnership with other libraries in the country in order to effectively provide library services to the remote learners. The researcher’s consultations with the DEU suggested that it would be beneficial if the librarians of the four Colleges of Education, where distance learners go for their residential programmes, were directed to help distance students. However, the librarians disclosed that there were, as yet, no formal arrangements with any other library to help distance students. This is unfortunate

and collaboration with other librarians and libraries should be sought at the library-to-library level and not the DEU-to-non-UBL level.

It is noted with interest that, apart from the Botswana National Library Service that has branch libraries in various parts of the country, the six Colleges of Education in the country, four of which run similar conventional DPE programmes as the DEU, have the potential to be of tremendous assistance. This can only happen if the UBL goes into collaborative partnerships with them. In addition, there are several Education Centres as well as Vocational Training Centres (VTCs) in the country that have libraries. These could also be of assistance to the University of Botswana library in its mission to provide an “uninhibited library and information support service” to its numerous distance learners scattered all over the country.

5.4.3.6 Access to subject librarian

The investigation described in this study revealed that a substantial number of students did not know how to get access to their subject librarian. Only 87 respondents (31.6 percent) claimed that they knew (Figure 15). A total of 188 respondents (68.4 percent) did not know how to get access to their course or subject librarian. It is not problematic for the conventional student to get to know and seek assistance from his course or subject librarian, and it should not pose any problem for distance learners to at least know who their subject librarians are and how to get in touch with them. One way of achieving this is for the library to designate librarians to specific groups. Once such an arrangement is made internally the designated librarians could formally write to their students to introduce themselves. They should be informed that they should feel free to get in touch whenever they needed assistance on library and information support services for their courses. The contact details including name, address, telephone number, email address and fax number of the designated librarian should be made known to the students. In addition, the librarians’ invitation to the students to contact them could be included with the course materials to cut costs.

5.4.3.7 Other services

5.4.3.7.1 Toll-free telephone line

Many open and distance learning institutions the world over, particularly those in the advanced countries, operate toll-free telephone lines, otherwise known as the 0800 or 800 or 1 800 phone line. One of the advantages of the telephone in distance learning, as has already been mentioned, is to bridge the gap between the library and the students. The toll-free lines are usually put in place for the advantage of their distance learners who are then able to make telephone enquiries and requests. In Botswana, a number of establishments have already adopted this system. The University of Botswana Library may also want to give consideration to the installation of a 0800 line to enhance the provision of library and information support services for its remote students.

5.4.3.7.2 Postal service

We discussed in the course of the literature review operations involving direct postal services to distance learners in some institutions. Some of these institutions pay the entire cost of postage of materials to and from their distance learners, through what is generally referred to as a prepaid postal service. Other institutions only pay for materials posted one way to the students, whilst the return cost is borne by the students themselves. The University of Botswana Library may want to consider the option that is most suitable, and one that can be accommodated by the institution involved. Using registered post for such materials to or from students would ensure their security and prompt delivery to destinations.

5.4.3.7.3 Opening of e-mail accounts for distance learners

One way of helping the distance learners develop a sense of belonging to the university, and to encourage them to use the library facilities, is to open an e-mail account for each

of them, as is done for the conventional students. It is, however, important to point out that it is not enough to open e-mail accounts for them. They also need to be adequately taught and trained to utilise such facilities. If an e-mail account is opened for each of the distance learners, and direction given to them on how to use it, they would gain easy and direct access to their subject and course librarians and be able to ask for assistance.

In addition to the fact that students would be able to interact with their subject librarians, it would also be possible for them to interact with one another, either on a one-to-one basis or one-to-many. In this way they would be able to share views and work jointly or in groups through using the e-mail facility. One other great advantage of the e-mail facility is the availability of bulletin boards and listservers that could be created for the users. Bulletin boards are like notice boards on which information is placed. Listservers are a forum where a group of people can use e-mail to share information with one another. For the target group of people on the listservers, information and news may be sent through the bulletin boards, and discussions can be held whereby everyone on the listservers is free to make contributions on topical issues. Lehnert (1999) stated that “these lists typically operate as a broadcast medium: one person talks to the list, and everyone else listens”. Thus it is possible for students to use listservers or bulletin boards for each of the modules. Indeed, this system has generally been noted as one of the most cost-effective resources available on-line. Where this is created for distance learners, it would be easy for them not only to contact each other, but also the library, and their tutors.

5.4.3.7.4 Keeping records

The librarians observed that they would not want to see any difference between the distance learners and the traditional students. For this reason they had not been keeping separate statistics of these students' transactions with the library. However, they made it clear that a change was contemplated whereby separate statistics would be compiled in future. They must be encouraged to keep separate records and statistics for these two groups of students. This would provide them with data that would assist them in making appropriate plans for distance learners currently and in the future. Indeed, the keeping of

statistics should not only be limited to the students' transactions in the UB Library and its branch libraries. Adequate monitoring procedures should be put in place in other establishments with whom the UB library has formed partnerships, such as the College of Education libraries, BNLS branch libraries and any others.

5.4.3.7.5 Website for UB distance learners

In addition to the University of Botswana Library Website, extra pages could be constructed for the use of distance learners. On these web pages the rights of, and services available to, this category of learner could be spelt out in some detail. It should also provide links with other very useful websites, both those of the university and relevant websites elsewhere. In advocating web support for distance learners, it should also be possible to include in the website links to all the prescribed materials that are available on-line. If these links were provided, students would have easy access to and would be able to download prescribed articles that could be scanned or made available in the system. It should also be possible for students to make on-line requests for the prescribed books and additional reading materials suggested by their tutors. Forms should be designed for this and made available on the web page. These are some of the benefits that distance learners stand to gain if a web page is specially designed for them.

5.5 CONCLUDING REMARKS

This dissertation could form the basis for further research into the utilisation and the role of the library in distance education in Botswana. This study has been limited to the library and information support services provided by the University of Botswana Library for its distance learners.

The distance programmes currently being run by the University are at the certificate or diploma level. The holders of the Junior Secondary School Certificate or the Grade Two Teachers Certificate are the target audiences. Plans are being made to introduce other programmes by the distance-learning mode at degree and postgraduate levels. The

students for the new programmes are expected to have higher educational backgrounds, and they will probably have different attitudes to using library facilities. It would be interesting and profitable to conduct research similar to the present study when more programmes at higher levels have been introduced. Since the University library would also have gained more experience in the handling of support services for distance learners, such studies should provide further valuable insights into library involvement in distance education programmes of this University. Research incorporating follow-up measurement and evaluation would be desirable to determine the extent of the support services being provided over a period to distance learners in the dual mode environment of the University of Botswana.

This dissertation is a case study, and specifically focuses on the involvement of the University of Botswana Library in the distance education programmes of the University. It is, however, noted that many citizens of Botswana, and a large number of people of other nationalities resident in Botswana, and a large number of people of other nationalities resident in Botswana, are enrolled on a distance education programme. They are studying at various levels with open and distance-learning universities outside Botswana, and are much further away from their institutions than are those who pursue their studies within the country with the University of Botswana. An evaluation of the role and involvement of libraries in the operation of the distance-learning programmes outside Botswana is lacking at present. Such a study would be an interesting and beneficial one to undertake.

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APPENDIX 1

QUESTIONNAIRE FOR STUDENTS

The Involvement of the Library in Distance Education

We are conducting a survey on the above title and felt your input will be needed. We should be grateful if you would please spare us about 10 minutes to complete this questionnaire. No name is required and so, confidentiality is assured.

Thank you.

'Gbade Oladokun
University of Botswana Library
Francistown

Tick appropriate columns

1. Course of study: DPE [], CAE []
2. For how long have you been doing the course?yearsmonths
3. Are you in paid employment?
Yes [] Full time [], Part time []
No []
4. Where do you work/teach?.....City/Town/Village, located inDistrict
5. Do you have any disability which makes it difficult for you to get to a Library?
Yes [], No []
6. Is it a clearly stated requirement of your course that you make use of libraries?
Yes [], No [], Don't Know []
7. Do you feel the need to supplement provided course material with additional reading?
Not at all [], Just a little [], A great deal []

8. Have you used any library facilities for your course?

Yes [], No []

9. If Yes, how long ago?year(s),month(s)week(s)

10. How often do you use the library?

Once a week [], twice a month [], Once a month [], Once in a quarter [],

Others.....(pls. specify)

11. For what purpose(s) do you use the library? You can tick more than one options

To access prescribed / recommended materials [], To read [], To use computer []

To photocopy [] Others.....(please specify)

12. If No to Question 9, do you expect to use a library in the future for your course?

Yes [], No [], Don't Know []

13. Have you had any training in the use of libraries as part of your course?

Yes [], No []. Please give details

.....
.....

14. Which branch of the University of Botswana Library is closer to you?

Main campus [], FET (former Polytechnic) Library [], CCE Francistown [],

Maun Branch []

15. How far do you live from:

please estimate

| | Kilometres | Travelling Time |
|--|------------|-----------------|
| University of Botswana Library, Gaborone | | |
| University Library, Francistown | | |
| University Library, Maun | | |
| University Library, FET | | |
| Your nearest Public Library | | |
| Nearest College of Education Library..... (please specify) | | |
| Any other Library.....(pls. specify) | | |

16. To the best of your understanding, is there any special arrangement for you to use a library near where you live? Yes [], No [], Don't Know []

17. Do you know how to get access to a subject librarian for your course/study?

Yes [], No [], Don't Know []

18. Do you have knowledge of the Internet? Yes [], No []
19. Do you have access to a computer that is linked to the Internet?
At Home: Yes [], No []
At Work: Yes [], No []
Other place: Yes [], No [] please specify.....
20. Do you know how to search for information at the University of Botswana Library Website? Yes [], No []
21. Have you before searched the University Library database from
Work? Yes [], No [] ; Home? Yes [], No []
UB Library? Yes [], No [] Other places[pls. specify]
22. Is there an Internet Café in your town or near where you live?
Yes [], No [] Don't know []
23. Is there a branch of the Botswana National Library Service in your area?
Yes [], No []
24. If you have used any of these libraries, how do you feel you were treated as a distance education student? Please tick:

| | Satisfactory | Not Satisfactory | Not sure |
|----------------------|--------------|------------------|----------|
| Your university | () | () | () |
| College of Education | () | () | () |
| Public Library | () | () | () |
| Others | () | () | () |

25. Please use the space provided below for any additional comments you would like to make.

APPENDIX 2

QUESTIONS FOR DEU

1. Can you give a brief description of the nature / type of course material that is provided to the distance students?
2. Are the course materials given to students entirely self sufficient in such a way that students do not have to use the library?
3. How many students have graduated from CAE/DPE programmes?
4. How many study centres are in place? What has hindered the take-off of the planned study centres?
5. What kind of product do you expect from the distance education programmes?
6. How should they compare with the rest of the university graduate?
7. Do you think the distance learners of UB receive parity treatment with the face-to-face students of the university? YES [], NO []. If No, what is inherently inadequate?
8. What degree of relationship exists between the DEU and the University Library?
9. What is the nature of the problems that distance students experience?
10. How often do you think the distance students contact the university library? And with what type of problems?

11. To the best of your knowledge, do you know whether the students make use of other libraries?
12. If yes to 11 above, to what extent do students make use of such libraries?
13. Do you think the Library is adequately involved in the planning/thinking of DEU?
14. What in the structure / procedure of DEU as presently operated do you think should be changed?
15. Why is CAE programme being phased out?
16. Has there been any drop-out from
 - a) CAE programme? Yes [], No [] If yes, how many?
 - b) DPE programme? YES [], No [] If yes, how many?
17. If yes to 16(a) above what do you think has accounted for the failure or drop-out?
If yes to 16(b) above, what do you think has accounted for the failure or drop-out?
18. Are there any further aspects regarding the distance education programmes, the use of the library by the distance education students and/or the relationship between the library and the DEU that you would like to bring to my attention?