UNIT 4 NON-FORMAL AND CONTINUING EDUCATION

Editors' Note

Education is more essential than almost any other possession in life. Every government is always serious about the educational policy of its country, since education creates human capital. Every body wants to acquire more and more knowledge. Education is also important for improving job prospects and for getting a better job. Non-formal and continuing education caters to this need of the learner. Through this mode of education a learner can earn and learn at the same time. The learner can learn at his/her own place and pace. Distance education supplements this mode of education and assists the learner in acquiring education at a distance. The planning of the curriculum needs special attention in this system of education. Curriculum is a dynamic aspect of educational theory and educational aims can only be achieved through a well designed curriculum, which means that different types of curricula are needed for programmes conducted under different modes of education. In the present article, the authors Khalipha M. Bilety and Johnson Odharo have designed a curriculum to improve health services through upgrading 'Enrolled Nurses' (EN) to 'Registered Nurses' (RN) through distance education; a good example of non-formal and continuing education.

The Distance Education Programme (DEP) model was proposed and adopted to reduce the cost and duration of the training of the nurses. The opening sentence of the article is very appealing and impressive. It explains the very nature of distance education. The authors then explain the goals of the programme and the interrelated units of DEP.

First, the article lays stress on human resources development by providing job training to the EN to become RN. Then the curriculum design and development is elaborated. This combines traditional classroom instruction and distance education. The curriculum is designed to create and increase interest among the learners and to get aid and help from all sections of the concerned departments of the government: Ministry of Health, Institute of Health Sciences, Ministry of Local Government, Lands and Housing, Ministry of Education, University of Botswana etc. The article presents the guidelines laid down for the planners of continuing education to plan a curriculum for the learners who are to be trained through distance education mode of teaching. The DEP for 'Improving Primary Health Care Service through Distance and Nursing Education Botswana' is meant for upgrading Enrolled Verses to the level of Registered Nurses. It is based on the interrelated units designed for distance education.

The curriculum for non-formal and continuing education should be a combination of traditional class-room instruction and distance education to enable the learners to learn at their won pace according to the available resources, due to the strain employment which they weight is under. The authors have suggested and have designed the curriculum to achieve better integration of clinical theory and practise needed for the training for upgrading the EN to RN. The programme involved the creation of a working environment essential for the effective combination of nursing education and services. For the development and successful implementation of the curriculum, the joint efforts of all the government and educational institutions are required. Secondly the goal of the curriculum was to train the nurses according to the required standards of training and knowledge, so it was divided into two parts: general course units and detailed blue prints for contact classes. This helped the nurses to have the comprehensive training needed. The curriculum included the production of study-material

according to the norms of the distance education mode. The study material was produced on the principles of Self Instructional Material (SIM) and was based on text books by writers established, as a part of curriculum, in the catchment area and residential tutorials were provided to the learners. The curriculum included all the components of learning required for technical programmes under non-formal and continuing education. Assessment was based on the upgrading of the students' performance. Along with assignments and practicals, there were also assessed tests for the award of certificates. The curriculum was designed on the basis of the needs of the learner.

Non-formal and continuing education through distance education provides an opportunity and a chance to professionals, technicians and officials to continue learning and to improve professional competence and betterment throughout their life span. Now, please read the article and appreciate the curriculum development, its implementation and the methods of evaluation in non-formal and continuing education.

Thereafter do attempt to answer the questions given at the end.

IMPROVING PRIMARY HEALTH CARE SERVICES THROUGH DISTANCE AND NURSING EDUCATION IN BOTSWANA

—Khalipha M. Bility, and Johnson Odha

INTRODUCTION

This paper examines a distance education model designed to improve primary health services through upgrading Enrolled Nurses to Registered Nurses, Preliminary feasibility studies conducted between 1985 and 1992 indicated that it is feasible to improve the quality of primary health care services, especially in the rural areas through upgrading ENs through distance education.

During the past decades, the Government of Botswana made considerable progress in expanding training programmes and access to quality health care services. Between 1975 and 1985 the capacity of hospitals, clinics, and health posts increased over 100 percent. Expansion of health facilities was unmatched by the output of training institutions. The resulting imbalances between demand and supply of nurses created the need to explore possible ways of expanding educational opportunities for nurses. In the current planned period (1972-1977), continuing education for nurses and other health care professionals was identified as a priority by the Government of Botswana. The target is the Enrolled Nurses (ENs) who constitute about 53% (1,433) of total nursing work force. Given the long and prohibitive cost of continuing nursing education, few upgrading programmes were established. For example, between 1985-1991 (NDP 7), 80 Enrolled Nurses (ENs) were upgraded to Registered Nurses (RNs) at the prohibitive cost of 9,440,000 Pula, resulting in a per student cost of 118,000 Pula. Under the present residential upgrading systems, it takes about ten years for an EN to complete a University degree in nursing education or administration at the University of Botswana. Consequently, few nurses benefit from this traditional upgrading programme

Distance Education Programme

The Distance Education Programme (DEP) model was proposed and adopted to reduce cost and duration of training ENs to RNs. Specific goals of the programme are to (a) improve the quality of health care services; (b) expand educational opportunities for enrolled nurses; (c) motivate nurses by improving the conditions of service; (d) improve access to quality nursing education; (e) develop the capacity of tutors to conduct research and organize training programmes to improve nursing practice; and (f) make nursing education cost-effective. The organization of DEP consists of five interrelated units:

- human resources development
- curriculum design, development and materials production
- education materials distribution
- academic services
- nurse-student support services.

Curriculum implementation strategies, such as, clinical instruction; mentorship; residential face-to-face tutorial; and study circles shall supplement text-based print modules. Examinations and assignments seek to test student mastery of relevant and appropriate body of knowledge and experiences in the social, basic and nursing sciences.

Programme Characteristics

Unlike the residential curriculum, distance education programme structures and organizes learning content into learnable self-instructional units or modules. This structure is unique in several respects; first it combines elements of traditional classroom instruction and distance education. Second, it enriches the reservoir of experiences among EN's as adult learners to develop a structured sequence of learning activities responsive to PHC strategies. This process allows for a better integration of clinical practice and theory. Third, the mentorship component of the programme creates a working environment essential for effective collaboration between nursing education and nursing services. This relationship between education and service seeks to maximize the relevance of education to the world of work.

Collaborating Institutions and Agencies

The DEP was designed in collaboration with Ministry of Health and Institutes of Health Sciences (HIS): (Gaborone, Molepolole, Labasto and Francistown); Ministry of Local Government Lands and Housing (MLGLH); Ministry of Education (MoE); University of Botswana (Centre for Continuing Education and Department of Nursing); and Kellogg Foundation, USA. The Ministry of Health (MoH) is the principal agency responsible for overall financing, administration, and management of all programme activities. The University of Botswana will accredit this distance education programme. The Center of Continuing Education of the University of Botswana provides technical and professional assistance for training and production of education materials. The Ministry of Education (MoE) shall provide technical support for programme development, and evaluation. The Distance Education Resource Centre (DERC), located at the Institute of Health Sciences in Serowe will be equipped with media, such as video, models, maps, overhead projectors, audio-visual materials, and other resources.

THE CURRICULUM

The goal of the curriculum is to prepare an EN to effectively and efficiently achieve standards of nursing care required of an RN. Inputs for the curriculum were obtained from a needs assessment of nursing services and content analysis of EN/midwifery and RN programmes. The output was used to develop a philosophy and a conceptual framework for the programme with embedded three elements of Primary Health Care (PHC) orientations: provision of services in community settings; provision of health care by a health team and appropriate integration of preventive, primitive, and curative services.

Layout of the Curriculum

The basic frame work of the curriculum consists of two levels of operation: general course units and detailed blueprint for content areas. Table 4.1 shows a summary of courses and time-frame.

Table 4.1: EN to RN upgrade courses

CONTENT AREA	TIME
(Theory and Practice)	
BASIC SCIENCES – 3 courses	
Anatomy and Physiology	80 hrs
Physics and Chemistry	60 hrs
Microbiology	30 hrs
NURSING SCIENCES – 9 courses	

Fundamentals of Nursing	30 hrs
Professionalism in Nursing	40 hrs
Care of Well and Sick Child	30 hrs
Care of Sick Adult/Medical	80 hrs
Care of Sick Adult/Surgical	80 hrs
Community Health Nursing	50 hrs
Nursing Management	44 hrs
Applied Research in Nursing	50 hrs
Mental Health Nursing	85 hrs
SOCIAL SCIEANCES – 1 course	50 hrs

Each course unit shall be organized according to the following example:

1) *Topic Area* : Anatomy and Physiology of human cell.

2) *Objective* : Identify and describe functions of human cells and body tissues.

3) *Theory* : Study of the anatomy and physiology of human cells and body tissues with specific reference to health and disease processes.

4) *Clinical Practice* : Observation of the pathophysiology of body cells.

5) *Learning Activities* : Laboratory exercises, examinations of cells, models, tissues and review of modules.

6) *Evaluation* : Exercises using self-assessment format, clinical demonstration, multiple choice tests, short answer questions to state functions of cells and tissues in relation to health and disease processes.

Training

Short term and long-term strategies can be employed to maximize the contribution of existing staff. Training will be located in local and international institutions with a good track record in distance education, (for example, Nursing Times, University of South Africa, Open University). Study leave will be provided for staff designated for distance education to develop individual and institutional distance education capacity and facilitate the transfer of skills, knowledge and expertise.

Instructional Materials Development

All text-based instructional modules will be developed by the Curriculum Design and Writing Team. Workshops for training members of the team will involve writing instructional objectives, instructional design, editing, formatting of modules, and text production.

Curriculum implementation Strategies

The interface between theory and practice is adequately integrated by using five strategies which focus on didactic and clinical activities at appropriate times during the learning cycle, (1) clinical instruction jointly supervised by tutors and mentors; (2) text-based modules for self-instruction; (3) student study circle in specified catchment area; (4) mentoring and preceptorship; (5) residential tutorials.

Clinical Instructional Methods

The objectives of health care instruction are to (1) prepare each nurse to acquire the necessary competencies to manage clinical conditions requiring the application of nursing process; (2) to apply clinical knowledge to prevent disease, promote health and rehabilitate ill patients in hospitals, clinics, health posts, mobile stops and community settings. Clinical teaching will take place in a variety of settings: hospitals, clinics, health posts and communities. Each represents a different, yet equally important dimension of unique learning opportunities in keeping with the credos of PHC: access, quality, relevance, and appropriateness of care for individuals, families, and communities.

Each student will be required to complete four weeks of clinical rotations in the nine core nursing subject areas. Clinical rotations will run concurrently with assignments and reading of text-based self-instructional modules. Evaluation and supervision of clinical rotations will be conducted by mentors, in collaboration with clinical preceptors and tutors.

Mentorship

Closely integrated with clinical instruction is the mentorship component of the programme. Mentors serve as a link between the clinical teaching sites and the Institute of Health Sciences – Serowe. The goal of the mentorship programme in distance education is to create a framework of positive and beneficial interaction between student and nurse leaders. This interaction is likely to enhance the development of clinical skills of competent, efficient, and professional registered nurse. Each mentor is expected to perform many overlapping roles, including clinical preceptor, role model, and resource person. The mentor-student relationship prepares and socializes nurse-students into the role of RN.

Nurse leaders selected to serve as mentors will undergo an orientation and training programme for no less than one week. This orientation will involve: (1) extensive briefings on distance education programme; (2) clear outline of the characteristics, functions and responsibilities of mentors vis a vis students; (3) techniques for organizing student support services; and (4) clear outline of personal and professional support available for mentors to function effectively and deal with role conflicts.

Residential Tutorials

Residential tutorial is a mode of teaching and learning requiring that students travel to Institute of Health Sciences – Serowe once every two months of meet face-to-face with tutors, staff development fellows and programme administrators. While at the Institute, the students shall write exams, attend classes and participate in tutorial programmes.

Study Circle and Student Learning Centres

The study circle is the fourth component of the programme. The idea of a study circle is based on current practices in Botswana. In most communities, students engaged in corresponding courses meet periodically to review course materials. The study circle is not only an academic support group, but provides a base for social cohesion to groups of adult learners sharing a similar concern. The intention of the study circle is to bring together students living within close proximity of a catchment area to work on common problems and issues once a week.

Text-based Modules for Self-instruction

Independent study is the fifth component of the programme. The basic framework for the organization of the core curriculum is the modular system. The entire

package of learning material is designed to enable students to study and learn independently. Each module consists of unit goals and objectives, content, assignments, criteria for completion, assessment, self-test and study guides. Textual materials will be developed to sustain interest and motivation. Content will be sequenced in a manner that allows for systematic progression. Typically each unit will have a self-help study guide that explicates the progression to the subsequent unit.

Programme Implementation, Management and Administration

The success of distance education demands special administrative arrangements. Unlike residential programmes, distance education requires a relatively complex administrative setup, mainly because of the physical distance between students, tutors, and programme administrative units. The success or failure of distance education is highly dependent on the administrative and management set-up to ensure that programme quality and integrity is maintained five working teams will be instituted. These are (1) Project management; (2) Curriculum, design, development, and implementation, (3) Educational materials distribution, (4) Human resources and training; and (5) Academic and nurse-student support services. Members of these working teams will be derived from the programme core staff consisting of tutors, staff development fellows, research and curriculum officers, and support staff.

General academic policies

General academic policy pertains to admission requirements, student assessment strategies, the interface between groups of courses and examinations.

Admission Requirements

A student who applies for admission into this programme must meet the following requirements: (1) evidence of completion of enrolled nursing programmes; (2) proof of current registration with Nursing Council of Botswana; (3) evidence of current practice.

Continuous Assessment

Continuous assessment will be both formative and summative. Formative information will be used for improving student performance as well as supportive services. Summative information will be the basis for deciding if a student is to be selected, retained, promoted, and certified as a competent registered nurse.

Continuous assessment shall be the most important aspect of the overall assessment of student performance. Clinical observations, demonstration, role play, community assessment, and clinical presentations shall constitute part of the overall assessment. The intention is to document the students ability to process, analyze synthesize, and apply information to prevent disease, promote health and well-being.

In keeping with the accreditation requirements of the University of Botswana, there shall be a minimum of two (2) written assignments per course. Clinical practicum shall be evaluated as unsatisfactory, satisfactory, good, and excellent. Continuous assessment and final examination shall consist of the following ratio: 2:1.

Academic Progression:

To progress from Group A to Group B courses, a student must satisfactorily pass Group A courses and (a) attain a minimum mark of 50 in each course taken individually or (b) attain a minimum mark of 50 in courses taken together. Also, these criteria apply to the Final Examination. A student shall be permitted to

supplement a maximum of two courses in each group and allowed to repeat a course twice only.

Award of the Diploma

To be awarded a diploma a student shall be required to pass both Group A and B courses. The final mark shall be a simple average for Group A and Group B marks. The mark of the diploma shall be classified as follows:

Pass with distinction	80% and above
Pass with merit	70-79%
Pass with credit	60-69%
Pass	50-59%
Fail	49% and below

PROGRAMME EVALUATION

Programme evaluation is a complex, but essential activity undertaken to document the efficiency and effectiveness of all aspects of the DEP. Monitoring is adopted as the preferred model of distance education evaluation because monitoring strategies are readily adaptable to programme management. The overwhelming bias towards good management is particularly important, given the lack of experience among the staff in the management of distance education activities. This concern with management shall focus on six issues of what, where, how, why, who and when. What is the programme? How will the programme be implemented? Where and when will the programme be implemented? Programme supervision, as a monitoring strategy is designed to ensure efficiency of instructional delivery system, academic quality, and effectiveness of technical, professional, and support staff.

Data for monitoring programme inputs, process and outcomes should be reviewed against programme goals and objectives. The quality of inputs will impact programme processes as well as outputs. Data required for monitoring distance education can be conceived of as being related primarily to inputs, process and outcomes. Specific data source for programme evaluation includes student records, academic reports, programme implementation schedules, availability and utilization or resources and progress reports, among others.

CONCLUSION

Distance education provides an opportunity for professionals to continue learning and improve professional competence throughout the life-span. The curriculum emphasizes community orientation activities designed to develop a healthy balance between institutional and community care and to move nursing away from traditional and singular focus on nursing care activities, such as: one to one patient care; care from acute, chronic, ill and disabled individuals; and secondary and tertiary prevention. This integrated approach attempts to socialize the nurse-student in the process of primary health care, rather than focus on the application of nursing process to sick care.

REFERENCES

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QUESTIONS

l) Why was the Distance Education Programme (DEP) model proposed and adopted?

2) Point out the specific goals of DEP.

3) The organisation of DEP consists of five interrelated units. Name them.

4) Mention the relevant curriculum implementation strategies.

5) The authors point out that the distance education programme structure is unique How is this so ?

6) Mention the role of the Ministry of Health and the University of Botswana in the working of DEP?

7) What is the goal of the curriculum of DEP model for ENs?

8) How will be training be provided?

9) How is the interface between theory and practice integrated?

10) Explain the function of the mentor.

11) What is the goal of the mentorship programme?

12) What is meant by a residential tutorial?

13) Why is there a study circle?

14) For the success of this programme, which five working teams were proposed?

15) Give the classification of marks of the diploma.

ANSWERS

l) The DEP model was proposed and adopted to reduce the cost and duration of training Enrolled Nurses (ENs) to be Registered Nurses (RNs).

2) a) to improve the quality of health care services.

   b) to expand the educational opportunities for ENs.

   c) to motivate nurses by improving the conditions of service.

   d) to improve access to quality nursing education.

   e) to develop the capacity of tutors to carry on research.

   f) to make nursing education cost effective.

3) i) human resource development.

   ii) curriculum design, development and material production.

   iii) education materials distribution.

   iv) academic services.

   v) nurse-student support services.

4) i) clinical instruction,

ii) mentorship.

iii) residential face to face tutorials.

iv) study circles

5) i) It has the elements both of conventional class room instruction and of distance education.

ii) It provides for a reservoir of experience among ENs, as adult learners

iii) It creates a working environment needed for effective collaboration between nursing education and nursing services.

6) The Ministry of Health is responsible for the arrangement of finances, management and administration of all programme activities and the University of Botswana is to accredit this programme.

7) The goal of the curriculum is to prepare an EN to achieve the standard of nursing care required of an RN.

8) Training will be imparted in institutions with a good record in DE, the services of the existing staff will be utilized and study leave will be given to the staff designated for DE.

9) i) clinical instructions jointly supervised by tutors and mentors.

ii) text based modules for self instruction.

iii) student study circle in the specified catchment area.

iv) mentoring and preceptorship.

v) residential tutorials.

10) The mentor is a link between clinical teaching and the Institute of Health Sciences – Serowe.

11) The goal of the mentorship programme is to provide a framework of positive and beneficial interaction between student and the nurse leader.

12) Residential tutorials require a student to travel to the Institute of Health Science once every two months for face-to-face interaction with tutors and programme administrators.

13) Study circle is to bring the students together to work on common problems and issues once a week.

14) i) Project management.

ii) Curriculum, design, development and implementation.

iii) Distribution of educational materials.

iv) Human resources and training.

v) Academic and nurse-student support services.

15) i) 80% and above Pass with distinction

ii) 70%-79%   :   Pass with merit

iii) 60%-69%   :   Pass with credit

iv) 50%-59%   :   Pass

v) 49% and below   :   Fail.