A COMPETENCY-BASED THERAPEUTIC RECREATION LEADERSHIP PROGRAM FOR SELECTED ORTHOPEDIC DISABILITIES

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ABSTRACT

A COMPETENCY-BASED THERAPEUTIC RECREATION LEADERSHIP PROGRAM FOR SELECTED ORTHOPEDIC DISABILITIES

by William M. Spann

This study was conducted to identify a hierarchy of competencies to be used as the basis for the development of competency-based contract modules that would facilitate acquisition of knowledge and skills needed by recreation leaders who will be working with selected orthopedically handicapped individuals (arthritis, cerebral palsy, lower-extremity amputation, muscular dystrophy, and stroke) during field experiences I, II, and III.

A survey questionnaire form with a list of 59 competency statements and 8 demographic items, related to the therapeutic recreation leader or his duties, was mailed to forty-eight selected hospitals and nursing homes, twenty-three community recreation centers, and twenty-nine public schools within a radius of one hundred miles of Raleigh, North Carolina. A total of sixty-three (63%) were returned.

The hierarchy of competencies was determined by ranking each competency statement according to its mean

Female therapeutic recreation leaders were more favorably employed in nursing homes; men had a higher rate of employment in community recreation centers; older practitioners were employed in nursing homes more than other settings; a large number (59%) of the respondents indicated no affiliation with the National Therapeutic Recreation Society; and the majority of the respondents had obtained the bachelor's degree but little or no undergraduate professional preparation in therapeutic recreation.

Due to the closeness of the competency statement mean values, the priority statement in each area could easily be changed to rank order statements 2 and 3.

Within the domain of this study the developed modules can serve the desired purpose of being a basis for future modular development, as well as meeting the initial goals in professional preparation in field experience I for the orthopedically handicapped.

The demographic findings may be used with caution as a basis for assigning students to various settings to work with the handicapped during field experience I.

Recommendations were made for the improvement of the developed modules by having them field tested before full implementation as well as to develop similar modules for field experiences II and III, which should also be field tested before implementation.

value in each of the nine areas in which the 59 competency statements were divided. The competency statement with the highest mean value in each area was chosen as priority for which a competency-based contract module was developed. A secondary survey, in the form of a check list, was mailed to seven professional Allied Health practitioners and twelve students to determine the adequacy of the developed modules.

The findings indicated mean values of the 59 competency statements, ranging in a descending rank order from 2.412 for the most essential to the least important with a mean value of 1.245. The respondents' data indicated a general consensus as to the "most essential" competency statement in each of the nine areas.

The evaluation of the modules indicated that the nine modules were generally adequate but the behavioral objectives could be improved in the area of being "stated in measurable terms."

The finding also revealed that more therapeutic recreation leaders are employed in nursing homes than in other settings surveyed. Stroke patients/clients are in the majority among the orthopedic population surveyed. Arthritic patients/clients were second in number, followed by muscular dystrophy and lower-extremity amputee patients/ clients.

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Chapter 1

INTRODUCTION

Although many elements are fundamental to the realization of national goals in education of the handicapped, none are more important than the availability of school and recreation personnel in sufficient numbers and with appropriate competencies.[1]

In view of the keen competition for limited federal funds to assist institutions and agencies in meeting training efforts or preparing teachers and recreation leaders for education and recreation of the handicapped, the Division of Personnel Preparation, Bureau of Education for the Handicapped, U.S. Office of Education, Department of Health, Education, and Welfare, Washington, D.C., has set the following priorities in personnel preparation: preschool handicapped children and infants, severely and multihandicapped, paraprofessionals, physical education, therapeutic recreation, interdisciplinary programs, general

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[1]Herman Saettler, "Current Priorities in Personnel Preparation," Exceptional Children, 43 (November, 1976): 147.

special education, career or vocational education programs, preservice and/or in-service for regular education teachers and physical education and recreation specialists to work with children who display variation in learning or behavioral styles, postdoctoral training education of the handicapped, and model implementation.[2] The aforementioned areas of concern are critical to continued advances in education of the handicapped and have gained overwhelming support from the federal government. On November 28, 1975, President Ford signed the Education for All Handicapped Children Act into Public Law 94-142. This law assures that all handicapped children in public schools have a trained teacher or other resource person competent in the necessary skills to help children achieve their full potential.

Should Public Law 94-142 be implemented within the time specified, September, 1978, there will be, with adequate appropriations, an influx of physically handicapped individuals into community-based public education programs. As a result, teachers and recreation personnel who possess the knowledge and skills to foster the growth of these individuals will be needed. The burden of responsibility will be on the universities to prepare competent teachers and recreation leaders.

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[2]Ibid.

A recent article by Peter J. Verhoven, referring to a manpower study conducted under the auspices of the National Recreation and Park Association, indicated that the field of therapeutic recreation service can anticipate a decisive number of positions needed to be filled by competent persons through 1980. The most realistic estimate of deficit need yields a figure of 18,786 vacant positions. In view of the responsibility of preparing competent personnel for these vacancies, the following observations were made by the National Recreation and Park Association manpower study: positions assumed to require baccalaureate level personnel could be capably filled by persons with lesser educational qualifications. Such positions as recreation activity specialists, general recreation leaders, and recreation aides were specifically designated.[3]

Since Verhoven's manpower survey was made in 1969, the acceleration in preparation of therapeutic recreation personnel has lowered the estimated needed figure. However, there still seems to be a great need for competent personnel who can render therapeutic services to the ill and disabled.

Responsive to the challenge of preparing competent teachers and recreation leaders for the handicapped, many

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[3]Peter J. Verhoven, "Needed: 18,000 Therapeutic Recreation Service Personnel by 1980," Therapeutic Recreation Journal, 3 (First Quarter, 1969):5.

colleges and universities have changed or are in the process of changing their course-based teacher education programs to competency-based ones.

Most of today's educators seemed to favor a teaching method which can describe program goals in clear, explicit objectives, stated in terms of what the learner can demonstrate. If such a system is realized on all levels of education, it will be a viable system of accountability in assessing teacher education outcomes and force teachers to do more than appear before their classes with enabling and terminal objectives sketched out in a traditionally hazy fashion.

Competency-based, professional preparatory programs enhance the conveyance of recreation, leisure, and cultural services for the handicapped and provide a conceptual framework for the development of relevant, effective teacher education and recreation leadership programs.

Since competency-based education has gained wide popularity in recent years by specification of learning objectives in behavioral terms, by increased learning through individualized instruction, and by attribution to greater teacher and student accountability, this study has followed the principles and guidelines set forth in competency-based education in constructing modules for field experience of therapeutic recreation leaders of the orthopedically handicapped.

STATEMENT OF THE PROBLEM

The primary purpose of this study was the identification of a hiearchy of competencies whereby the realization of teaching modules in therapeutic recreation could be developed that would facilitate acquisition of knowledge and skills needed by recreation leaders who will be working with orthopedically handicapped individuals during field experiences I, II, and III.

A secondary purpose of this study was to develop contractual modules for the most essential competency in each of the nine areas of field experience I. Each module is based on competencies identified by the respondents of this study as being essential to the effectiveness of the prospective recreation leader who will be working in settings, during field experience I, serving a large population of patients/clients with arthritis, cerebral palsy, lower-extremity amputations, muscular dystrophy, and cardiovascular attacks (strokes).

PRACTICAL IMPORTANCE OF STUDY

The relevancy of this study and the results give encouragement and a clearer direction to the writer in developing a program in therapeutic recreation at Shaw University, Raleigh, North Carolina. The results have also provided the writer with a matrix of competencies and

contract modules in therapeutic recreation leadership that will set the stage for compliance with the recommendations made by an evaluation committee on teacher education from North Carolina Department of Public Instruction while visiting the Division of Teacher Education at Shaw University, October 9-10, 1975. The committee's recommendations read as follow; Shaw University needs to:

> (1) Seek ways to strengthen communication between teachers and students; (2) seek ways to better coordinate the field experiences. More extensive planning among faculty and with school and other agencies personnel to more clearly fix supervisory and administrative responsibilities will prove helpful; (3) review program objectives and develop a clear set of general objectives. Specific objectives for each program element should be stated more clearly in terms of competencies to be acquired.[4]

In an attempt to upgrade the teacher education program in North Carolina, the State Department of Public Instruction has required all four-year colleges and universities to convert their course-based teacher education programs to a competency-based one according to the "State's Teacher Education Guidelines."[5]

As a guide for revision, construction and development of other areas in professional preparation

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[4]Report of the Visitation Committee to the State Evaluation Committee on Teacher Education, Shaw University, Raleigh, North Carolina, October 9-10, 1975.

[5]Division of Teacher Education, North Carolina Department of Public Instruction, Standards and Guidelines for Approval of Institutions and Programs for Teacher Education: Competency-Based Program, Publication No. 453 (Raleigh, North Carolina, 1972).

programs in physical education and recreation, to help meet the goals established by the area of Health, Physical Education and Recreation at Shaw University and components of the "Advanced Institutional Development Program,"[6] this study is considered to be a valuable source of information.

DELIMITATIONS OF THE STUDY

This study is developmental in nature and does not include the implementation of the modules developed. However, each module was evaluated to determine its adequacy as an effective teacher-made learning guide for field experience I. By use of a developed check list form, the opinions of professional members in the Allied Health field and twelve students in an introductory course to therapeutic recreation were solicited in an effort to determine the adequacy of each module in therapeutic recreation, field experience I.

The identified competencies and competency-based modules are limited to entry-level knowledge and skills essential to the student's working effectively with selected orthopedically disabled patients/clients; mainly, arthritis, cerebral palsy, lower-extremity amputations, muscular dystrophy, and cardiovascular attacks in nursing

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[6]Advanced Institutional Development Program, Supplemental Proposal, Shaw University, Raleigh, North Carolina, March 14, 1975, p. 57.

homes, community recreation centers, and public school settings during his initial field experience.

DEFINITIONS OF TERMS

For the purpose of this study the following terms and definitions were used.

Behavioral objective--description of the form of the behavior that instruction is to produce, stated in terms of what the student is to be able to do.

Competency--adequacy for task performance or possession of required knowledge, skills, and abilities.

Competency-based education--an educational process which places emphasis on student acquisition of skills required for a task designated as necessary for occupational and/or professional functioning.

Contracts--individualized lessons based on objectives in specific subject matter areas and designed at a level of the student's prior achievements and capabilities.

Disability--the impairment or defect of a bodily organ or member. A disability in this study has specific reference to either of the following: arthritis, cerebral palsy, lower-extremity amputation, muscular dystrophy, cardiovascular attack (stroke).

Educational goals--descriptions of instructional intent, defined in broad terms that identify content

topics or instructional events to be experienced by the student.

Entry level--the beginning level of performance in field experience components of a curriculum.

Field experience I--prescribed entry-level activities for the student during his sophomore year, with a minimum of sixty-four clock hours observing the organization, management, and control of therapeutic recreation in various settings for the orthopedically handicapped.

Field experience II--prescribed learning activities designed to increase the student's knowledge, comprehension, and ability of applying therapeutic recreation to the process of rehabilitation for the orthopedically handicapped. The student's junior year practicum consists of not less than sixty-four clock hours.

Field experience III--A senior year practicum designed for total involvement of the student in organizing, managing, and conducting therapeutic recreation activities in the process of rehabilitating the orthopedically handicapped. A minimum of four hundred clock hours working in one therapeutic recreation setting is required.

Learning activities. In this study, learning activities refer to the alternatives the module makes available to the learner to develop competency of the behavioral objectives.

Module--a cluster of related learning activities. The module title describes the competencies to be learned.

Orthopedic disability--personal inability to perform normal range of motion, statically or dynamically, due to disorders involving locomotor structures of the body, especially the skeleton and joints.

Orthopedically handicapped. Due to congenital or acquired disorders in bones and joints of the body, a person has certain disadvantages when participating with normal individuals in such activities as play, work, learning, or other psychomotor functions someone of his age can normally do.

Physically handicapped--relates to the physical degeneration or loss to an individual that may have been caused by congenital or adventitious factors.

Post-assessment. Statements of what the learner must do to demonstrate the competency relevant to the stated behavioral objectives are given.

Rationale. The rationale serves as an introduction to the module.

Remediation. Remedial activities amount to recycling the learner who has failed to demonstrate competency of stated objectives as measured by the amount of contract points and post-assessment test.

Resource materials are materials that are listed at the end of each module.

Student's options--a statement placed prior to the learning activities which explains various approaches the student may select to attain the expected level of mastery for the module's behavioral objectives.

Therapeutic recreation leadership--service in the field of recreation with a special emphasis on the needs of the ill or handicapped individual.

BASIC ASSUMPTIONS

The researcher postulates the following assumptions:

The results of the survey will identify a hierarchy of competencies in therapeutic recreation for field experiences I, II, and III.

Therapeutic recreation and activity leaders in nursing homes, community recreation centers, and public schools can reach a consensus regarding the most essential and least essential competencies in each of the nine areas of field experience I.

Based on the data received from the responding therapeutic and activity leaders it will be feasible to develop competency-based contract modules in therapeutic recreation for leadership training.

Based on selected hiearchies of learning (knowledge, understanding, and application), the modules developed in this study will facilitate acquisition of each module's behavioral objectives by the students.

A panel of professional Allied Health administrators and consultants will reach a consensus with twelve responding students from an introductory therapeutic recreation class regarding the adequacy of the nine modules developed in this study in meeting the basic needs of the therapeutic recreation leader in field experience I.

Knowledge of the percentages of selected orthopedic disabilities (arthritis, cerebral palsy, lower-extremity amputations, muscular dystrophy, and strokes) in the patient/client populations of nursing homes, community recreation centers, and public schools can facilitate student assignments compatible to achieving the modular objectives in field experience I.

Knowledge of demographic data (sex, age, level of education, employment level, and professional organization affiliation) of the respondents in this study will show evidence for concerted efforts on behalf of the institution's supervisors to prevent improper assignments of students in field experience I to therapeutic settings for the orthopedically handicapped.

Chapter 2

REVIEW OF THE LITERATURE

Physical educators and recreation educators have constantly sought to improve the curriculum in the field experience phase of professional preparation. The purpose of the present study was to identify essential competencies needed by the prospective recreation leader who will be working with selected orthopedically handicapped individuals during his initial field experience. A secondary purpose of the study was to develop contractual modules for the most essential competency in each of the nine areas of the initial field experience (field experience I).

This chapter is concerned with an investigation of literature pertinent to this study in an effort to establish a theoretical and structural framework for attainment of the primary and secondary goals. The literature is presented in four major areas as follow: (1) studies related to competency-based education, (2) studies related to professional preparation in therapeutic recreation, (3) studies related to individualized and modular instruction, and (4) studies related to contract teaching.

STUDIES RELATED TO COMPETENCY-BASED EDUCATION

During the past decade numerous books and articles have been published concerning competency-based education. The grand surge of educators to adopt this technique as a teaching strategem to attain instructional goals appears to be a panacea to certain ills in the teaching profession.

Many previous studies have investigated competency-based teacher education as it relates to professional preparation in physical education and recreation. Robert Snyder and Harry A. Scott in their chapter on "Undergraduate Preparation of Professional Personnel" stressed the importance of "competencies" rather than "courses" as a basis for program design.[1] Because of the vastly differing interests, abilities, motivations, and expectations of students, a more individualized approach to program planning was advocated.

Robert E. Grace conducted a study in 1974 to investigate the concept of competency-based teacher education and its application to physical education. He concluded that competency-based teacher education appears to be a sound alternative in teacher education and warrants

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[1]Robert Snyder and Harry A. Scott, Professional Preparation in Health, Physical Education and Recreation (New York: McGraw-Hill Book Co., 1954), p. 290.

exploration.[2] Grace's tenet reflected that competency-based teacher education should be developed as an alternative program to the traditional teacher-certification track. The program should be flexible.[3]

At the present time, the role of a teacher has not been completely conceptualized nor has a specific set of roles or competencies been universally accepted for therapeutic recreation. One of the most difficult tasks facing program initiators is the process of implementing competency-based programs into existing colleges and universities' crowded educational systems.

Professional preparation programs in physical education and therapeutic recreation can derive benefits from the competency-based approach since the present emphases are respect for individual differences, individualized instruction, the encouragement of problem solving experiences, and the development of students in the cognitive, psychomotor, and affective domains.

William C. Church in a 1974 study at Florida State University constructed a catalog of core competencies for teachers of physical education. His major premise was that the preparation of all teachers, including those in physical

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[2]Robert E. Grace, "Competency-Based Professional Education in Physical Education" (Doctoral dissertation, State University of New York at Buffalo, 1974), p. 6.

[3]Ibid.

education, would probably be improved by adopting the competency-based approach to teacher education.[4]

Most of the literature supporting competency-based education showed that greater emphasis in competency-based programs has been on the college and university levels with declining implementations through secondary schools to the elementary level. However, Betty E. Gober, who is among the minority, directed research to construct a competency-based physical education component of an elementary school education program. Her study contains the basic elements of a competency-based program. There are five modules designed for individualized learning, and students are given a pretest and postest for each module. In each learning task the student may choose from four or more plans, the means by which he can best achieve the objectives which lead to competency.[5] Gober is of the opinion that, unless well supported and on-going systematic developmental efforts are characteristic of instructions that prepare teachers, there is little hope of seeing major improvements in teacher education. However, if systematic program development becomes the norm, the results may be revolutionary in the

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[4]William C. Church, "A Catalog of Core Competencies for Teachers of Physical Education" (Doctoral dissertation, University of Oregon, 1974), p. 5.

[5]Betty E. Gober, "The Physical Education Component of a Competency-Based Elementary Education Program" (Doctoral dissertation, University of Oregon, 1974), p. 12.

education of teachers and in other higher education training programs.

Several other studies have alluded to or confirmed the hypothesis that a competency-based teacher education program is worthy of the time and effort required for preparation and implementation. Stanton E. Wixon studied the reactions of student teachers and obtained favorable data from their evaluation of special education courses presented in a competency-based, performance-criterion-referenced format.[6] McCleary and McIntyre expressed similar views in the statement

> Learning is effective when the things to be learned are clearly specified; when the learner understands what is to be accomplished and accepts it as reasonable and worthwhile; when the prerequisite knowledge and skills are known and the learner possesses them or can attain them with reasonable effort; and when the level of performance of what is to be learned is understood by learner and teacher.[7]

Current educational literature points to the importance of competency-based, teacher education programs and has labeled field experience for therapeutic recreation leaders as an essential aspect of their professional

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[6]Stanton E. Wixton, "Students' Reactions to Competency-Based Special Education," Exceptional Children, 41 (March, 1975):437.

[7]Lloyd E. McCleary and Kenneth E. McIntyre, "Competency Development and University Methodologies--A Model and Proposal," in Launey F. Roberts, Jr., ed., Individualizing Instruction in Educational Administration: A Performance-Based Worktext (New York: MSS Information Corporation, 1976), p. 116.

preparation. Robert Engelage et al. effected a competency-based, student-teacher program through the use of an instrument whereby students know what is expected of them prior to embarking upon their field experiences. This procedure enables them to receive adequate feedback of their progress.[8]

The importance of developing and implementing a competency-based, teacher education program is well stated by John Pisiopo. He identifies three precepts that appeared necessary for professional program curriculum: "flexibility in program content, options for personal choices, and beginning specialization within the structure of preparing a physical education or recreation generalist."[9]

STUDIES RELATED TO PROFESSIONAL PREPARATION IN THERAPEUTIC RECREATION

George B. Leonard's Education and Ecstacy contains many provocative ideas, observations, and suggestions for change in teaching methodology. His basic premise is that "learning involves interaction between the learner and his environment and its effectiveness relates to the frequency,

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[8]Robert Engelage, John Scheer, and William Tuning, "Performance-Based Student Teaching Programs," Journal of Physical Education and Recreation, 47 (May, 1976):13-15.

[9]John Pisiopo, "Flexibility, Options, and Early Specialization," Journal of Physical Education and Recreation, 46 (March, 1975):39-40.

variety, and intensity of the interaction."[10] He suggests that the learning environment is more important than ever before. Teachers should consider different forms of stimulation and teaching media. No longer should education be limited to a single method, such as class lecture. Rather, a student can be stimulated in a variety of ways, and the truly effective teacher explores all possibilities and proceeds accordingly.

The literature on professional preparation in therapeutic recreation indicates a wide variety of designs. Linda L. Odum's study emphasizes a need for the creation and implementation of competency-based curricula. In this study she attempts, first, to identify competencies most vital to therapeutic-recreation-services personnel; second, to relate those competencies in a systematic manner to job-level designations (i.e., Leader, Supervisor, Director); and, third, to construct a circular matrix for use as a framework in the design and development of undergraduate core curricula in therapeutic recreation. The results of Odum's study were also used as a device for competency-based

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[10]George B. Leonard, Education and Ecstacy (New York: Delacorte Press, 1968), p. 19.

testing for entry-level and exit-level skills and/or knowledges.[11]

In a similar study, Harold Smith surveyed bachelor-level practitioners in therapeutic recreation to determine (1) professional undergraduate college courses taken, (2) professional undergraduate college courses deemed essential to successful performance of the job, (3) competencies acquired through completion of undergraduate college courses, (4) competencies needed to successfully perform on the job, and (5) functions that should be performed while on the job.[12] The results from this study showed the following: (1) a wide variety of courses appeared typical of bachelor-level preparation in therapeutic recreation; (2) the majority of the practitioners appeared to have acquired the majority of the competencies during their undergraduate training; and (3) it appeared that the majority of the functions performed by bachelor-level practitioners were, and should continue to be, in the area of direct patient care and treatment.[13]

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[11]Linda L. Odum, "A Curricular Matrix for Use in the Design Development of an Undergraduate Core Curriculum in Therapeutic Recreation" (Doctoral dissertation, Florida State University, 1973), p. 34.

[12]Harold Smith, "Practitioners' Evaluation of College Courses, Competencies and Functions in Therapeutic Recreation" (Doctoral dissertation, University of Utah, 1974).

[13]Ibid.

In an attempt to identify essential competencies for practitioners in therapeutic recreation, the works of Odum, Smith, Grace, Church, and Gober were meaningful as a basis for program development. The work of Kelley, Robb, and others in developing a competency-based entry-level curriculum in the Department of Leisure Studies at the University of Illinois further illuminated the process of program development in therapeutic recreation. Their work provided the first empirical analysis of competencies for entry-level professionals in therapeutic recreation.[14] An overview of the study shows the authors' efforts in the chapters to identify and empirically analyze the competencies required of the entry-level workers in the field of therapeutic recreation. Fifty-nine competencies and eight bogus questions were developed by the project staff and were exposed to the analysis and criticism of advanced professionals, entry-level practitioners, and national consultants in the field of therapeutic recreation. A nation-wide survey of opinions was also conducted to aid in the identification and selection of the final list of competencies. The analysis of these competencies reflected the concepts of Nesbitt, who postulated that "curriculum revision in therapeutic recreation should reflect changes in

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[14]Jerry D. Kelley, Gary Robb, Wook Park, and Kathleen Halberg, Therapeutic Recreation Education: Developing a Competency-Based Entry-Level Curriculum (University of Illinois: Department of Leisure Studies, 1976), p. 70.

society and anticipate skills and knowledge which will be needed in the future."[15]

In the latest study conducted by the Society of Park and Recreation Educators in 1975, therapeutic recreation options in community colleges showed a 125 percent increase since 1970.[16] In spite of the growing number of professional preparation programs in therapeutic recreation on the community college and four year institution levels, there still appears to be a paucity of competency-based curricula in many teacher education programs.[17] In order to meet the professional demands that are and will continue to be placed on the therapeutic recreation specialist, therapeutic recreation curricula must become responsive in developing student competencies required at various position levels. The development of methodology and instruments that verifies competency levels needs greater emphasis in professional therapeutic preparatory programs. Field practicum experiences must be effectively measured; understanding of leisure counseling, activity analyses, client pathology, forces of motivation, and less tangible or seemingly assessable competencies that are necessary for the

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[15]John A. Nesbitt and L. L. Neal, "Therapeutic Recreation Service: State of Art" (National Park and Recreation Association, 1971).

[16]Kelly, et al., p. 17.

[17]Ibid., p. 22.

individual to work effectively with clients must also become measurable.

Pisiopo contends that clinical internship plays a major role in schools and institutions such as Veteran Administration Hospitals, nursing homes, and special schools, and that no one should complete a professional preparatory curriculum without such experiences.[18]

Further support of the field experience program in therapeutic recreation comes from Mundy. Her findings have unlimited implications for program developers in therapeutic recreation field experience courses. She concluded that a great variety of organizational and operational patterns exist in recreational field experience programs. Among the colleges surveyed, program objectives were many and varied. Mundy also found that students were better oriented in field work and had more contact feedback from the college than the agency supervisor. Among other important recommendations, Mundy suggested that "colleges and universities establish carefully organized set of procedures in administration and supervision of field work."[19] Hutton and Talkington's

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[18]Pisiopo, pp. 39-40.

[19]Clair J. Mundy, "A Descriptive Study of Selected Practices in the Administration and Supervision of Field Work Programs in Selected Four-Year Recreation and Park Curricula" (Doctoral dissertation, New York, Columbia University, 1972), Dissertation Abstracts International, p. 4193A.

"developmental record" can greatly aid agency supervisors to become more objectively involved in charting the experiences of students in field experience courses.[20] The developmental record is an individual rating form ideally designed for individual and group assessment of development by multidisciplinary team staffings of individual program needs or progress. It can be used as a quick indicator of achievement for appropriately placing an individual within a wide range of program services.

STUDIES RELATED TO INDIVIDUALIZED AND MODULAR INSTRUCTION

> Efforts to individualize and/or personalize instruction in many curricula areas have increased significantly during the past decade. The Performance/ Competency-Based Education movement which employs an extensive array of individualized instructional strategies is rapidly gaining adherents in colleges and universities in the several throughout the country. In a similar vein, in recent years, there have been increasing efforts by a number of professors of educational administration to individualize and/or personalize instruction in their classes in an effort to increase understandings, to develop activities that are reality-oriented, and to provide a mechanism for the demonstration of specific competencies.[21]

The work of Roberts is mainly a body of selected readings in individualized instruction,

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[20]W. O. Hutton and L. W. Talkington, The Developmental Record Manual (Corvallis, Oregon: A Continuing Education Book, 1974).

[21]Launey F. Roberts, Jr., ed., Individualizing Instruction in Educational Administration: A Performance-Based Worktext (New York: MSS Information Corporation, 1976).

performance/competency-based education, competency-educational administration, and self-paced individualized instructional modules used in an introductory course in educational administration. The selected readings and modules were written primarily for educational administration but can easily be adapted to other areas of instruction.

Mood's article "Another Approach to Higher Education" stressed the attainment of education by learning at home. "The bulk of education will come from video and tape cassettes."[22] Mood envisioned a video university where learning through video cassettes and other means would be assisted by an institutional structure. This structure would clarify and record what is learned by students.

Hunter wrote on the topic of "Implementing Individualized Instruction." From his point of view

> . . . the teacher who is focused on individualizing instruction with optional effectiveness will constantly be making decisions about (1) the learning task, based on the diagnosis of what the learner knows and what he is next ready to learn, (2) the utilization of that student's most effective learning behaviors, and (3) the

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[22]Alexander M. Mood, "Another Approach to Higher Education," in Launey F. Roberts, Jr., ed., Individualizing Instruction in Educational Administration: A Performance-Based Worktest (New York: MSS Information Corporation, 1976), pp. 12-15.

> determination of appropriate teaching behaviors to maximize learning.[23]

Torkelson stated that individualized instruction requires a philosophical and professional commitment to the notion of allowing students and others to have a say in the content and form of construction. It requires a fresh look at media and mediation processes, even to the point where part of the teacher's responsibility is to supply alternatives among mediation forms from which the learner chooses to suit his learning style, abilities, and goals.[24]

The eleven instructional modules developed by Roberts have basically the same format, a rationale, behavioral objectives, prerequisites, pre-assessment, learning activities, post-assessment, remediation, and resource materials. The student reads the rationale to the module and, if the module will meet his needs and interests, he elects to take the pre-assessment; should he pass, he then selects the appropriate learning activities that will provide the experiences to master the behavioral objectives;

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[23]Madeline Hunter, "Implementing Individualized Instruction," in Launey F. Roberts, Jr., ed., Individualizing Instruction in Educational Administration: A Performance-Based Worktext (New York: MSS Information Corporation, 1976), pp. 22-29.

[24]Gerald M. Torkelson, "Technology: New Goals for Individualization," in Launey F. Roberts, Jr., ed., Individualizing Instruction in Educational Administration: A Performance-Based Worktext (New York: MSS Information Corporation, 1976), pp. 30-33.

should he fail the pre-assessment, he selects a more comparable module. Post-assessment of the student's learning activities takes place upon completion of the module. If he passes, another module may be selected; should he fail, by conferring with the instructor, remediation procedures follow. The student then selects appropriate activities that will improve his proficiency. All learning activities are designed to develop competence of the behavioral objectives. The student remains in remediation until the desired level of competence is reached.[25]

Brooks, in his paper "Competency-Based Teacher Education: The State of the Art," predicted that (1) the future direction of competency-based education will be packaged in subjects, grades, semesters, or years; (2) learning opportunities will no longer be centered in the school, and no longer will learning be even regarded as a school-centered activity; (3) the learner will accept responsibility for both his own education and accountability for his decisions; (4) the teacher will have a clinical orientation toward learners seeking to stimulate learning

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[25]Launey F. Roberts, Jr., ed., Individualizing Instruction in Educational Administration: A Performance-Based Worktext (New York: MSS Information Corporation, 1976), pp. 164-168.

in each individual; and (5) the teacher will be skilled in development of laboratory settings for learning.[26]

Several writers have reinforced Brooks's predictions and nurtured them to realization. In an effort to contribute to the individualized instruction trend, Dowell outlined and discussed the following teaching designs to achieve individual and group goals: introductory, military, athletic, binary, station, team, individual problem, and innovative designs.[27] The individual design is specifically related to meeting the needs of the individual student. The five phases of this design consist of (1) Individual Schedule, (2) Introduction, (3) Instruction-Demonstration, (4) Practice-Supervision, and (5) Summary and Evaluation.[28]

Frantz, in an attempt to emphasize student accountability, designed several modules to illustrate different systems of individualized instruction to involve students in a self-instructional process.[29] As the result

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[26]Sumpter L. Brooks, "Competency-Based Teacher Education: The State of the Art," in Launey F. Roberts, Jr. ed., Individualizing Instruction in Educational Administration: A Performance-Based Worktext (New York: MSS Information Corporation, 1976), pp. 90-93.

[27]Linus J. Dowell, Strategies for Teaching Physical Education (Englewood Cliffs: Prentice-Hall, Inc., 1975), p. 87.

[28]Ibid., p. 88.

[29]Nevin R. Frantz, Jr., Individualized Instructional Systems for Vocational and Technical Education (Athens, Georgia: Vocational Instructional Systems, 1974).

of several workshops and experiences as consultants in program development, Robert Houston et al. concluded that the instructional module has become a viable curriculum procedure for actualizing competency-based education. In this innovative process they identified the following as typical components of a module: (1) an introduction (rationale) which includes a clear statement of why the module is important, (2) a specific objective or set of objectives, (3) pre-assessment directly related to the module's objectives, (4) a series of activities designed to aid the learner to meet the objective(s), (5) a post-assessment with measurement competency relative to the objective or objectives, and (6) remediation which describes the remedial procedures which would be undertaken with students who were unable to demonstrate achievement of the objectives on the post-assessment.[30]

Kapfer and Ovard extended the concept of individualized learning by putting emphasis on (1) a continuous progress learning plan which permits the student to learn at his own unique rate, (2) structuring of individualized learning packages that offer the student alternative ways of achieving stated behavioral objectives, (3) individualized learning packages which permit the

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[30]Robert W. Houston, Loye Y. Hollis, Howard L. Jones, Don A. Edwards, Ann Pace, and Sarah White, Developing Instructional Modules (Houston: College of Education University of Houston, 1972).

student, with the help of a teacher, to plan his own learning sequences, (4) individualized learning packages that provide for individual differences in ability by directing students to materials which are aimed at a variety of difficulty levels, and (5) individualized learning packages that provide for successful learning experiences at varying levels of self-initiative and self-direction.

Kapfer and Ovard visualize the individualized learning packages as a system to help the teacher in creating a more humanized learning environment. In such an environment, the teacher's role, rather than being one of presenting information, becomes one of facilitating or managing a total environment of learning. In his new role, the teacher spends much more time talking with students as individuals and in small groups rather than talking to them in large groups.[31]

Gronlund illuminates the subject of individualized instruction by fully describing a system of learning where the daily work of a student is guided by written prescriptions designed to meet his individual needs.[32]

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[31]Philip G. Kapfer and Glen F. Ovard, Preparing and Using Individualized Learning Packages for Ungraded, Continuous Progress Education (Englewood Cliffs: Educational Technology Publications, 1972).

[32]Norman E. Gronlund, Individualizing Classroom Instruction (New York: Macmillan Co., Inc., 1974).

In the work of Georgiades and Clark a clear rationale is given for innovations or changes in curriculum. As stated,

> . . . the only justifiable reason for a change in the existing program is the need to improve the quality of instruction for each student. Individualized programs are not built overnight, they require nurture, patience, guidance and evaluation.[33]

Since modular-based instructions are designed to improve the quality of instruction for the student, considerable concerns have been given to the structure of their component parts. A main ingredient of the module, behavioral objectives, has been the basis of concern in structuring modules to meet the needs of the student. Hernandez emphasized the importance of effective writing of behavioral objectives. In his booklet, Writing Behavioral Objectives, several basic examples of how behavioral objectives should be written are illustrated.[34] The major concepts (similar to Mager,[35] Singer,[36] Bloom,[37]

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[33]William Georgiades and Donald C. Clark, Models for Individualized Instruction (New York: MSS Information Corporation, 1974).

[34]David E. Hernandez, Writing Behavioral Objectives: A Programmed Exercise for Beginners (New York: Barnes and Noble, 1971).

[35]Robert F. Mager, Preparing Instructional Objectives (Belmont, California: Fearon Publishers, 1962).

[36]Robert N. Singer and Walter Dick, Teaching Physical Education: A Systems Approach (Boston: Houghton Mifflin Co., 1974).

[37]B. S. Bloom, Taxonomy of Educational Objectives: Cognitive Domain (New York: McKay, 1956).

Boston,[38] and Roberts[39]) of behavioral objectives are clarity, conciseness, and objectivity, which allow for better selections of learning approaches, media used, logical evaluations, and a clearer understanding by the students of what is expected of them. Reilly, in an attempt to develop behavioral objectives in nursing education, offered several creative strategies to aid students and teachers to attain educational objectives in an orderly and effective way. A major emphasis in her suggestions is accountability. Since teachers are mainly responsible for effecting the educational process, accountability for the quality of education has shifted from the learner to the teacher. A great assistance to teachers is the ability to construct meaningful behavioral objectives--objectives that identify the behavior the learner is expected to exhibit as a result of one or more learning experiences. The illustrations presented in Reilly's work are prescriptions for writing behavioral objectives as related to the nursing profession but are transferable to other fields of study.[40]

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[38]Robert E. Boston, How to Write and Use Performance Objectives to Individualize Instruction (Englewood Cliffs: Educational Technology Publication, 1972).

[39]Roberts, pp. 78-84.

[40]Dorothy Reilly, Behavioral Objectives in Nursing: Evaluation of Learner Attainment (New York: Appleton-Century-Crofts, 1975).

Boston states that it still remains a major problem for many teachers to develop effective instructional programs to meet the needs of individual students. In an attempt to eradicate this deficit he proposes several suggestions to assist the teacher and instructional designer to develop instructional programs with the capacity to capitalize on the individual strengths and potentialities of each student. Among the teacher's instructional development problems is the inability to combine in the right proportions the ideas with the available human and material resources. Boston presents an instructional system to further assist teachers to maximize the possibilities to obtain the "right proportion" and consequently reach desired educational results. Of the four suggestions given to achieve the "right proportion," Boston places strong emphasis on the teacher's writing behavioral objectives which describe (1) conditions, (2) tasks, (3) desired outcomes, and (4) criteria for evaluating specific performance.[41]

The concept of individualizing educational experiences and of a more central role for students in the teaching-learning process has characterized all recent major studies in teacher education. The concepts of contract learning, an agreement between a teacher and a student at

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[41]Boston, p. 72.

the beginning of a course as to the grade the student expects to receive and the amount and quality of work he is expected to produce to earn his grade, extend the individualization of instruction to new dimensions. Bertie cited several examples of contract learning and the responsibility of teachers in the process. There seems to be substantial evidence that most students enrolled in contract learning program are satisfied with their experiences. He states that, "through the contract-advising process students can turn to competent individuals who care about their educational and vocational future and about them as a person." Bertie does not consider contract learning to be a panacea to learning but offers it as a viable option to achieve such goals as variety in college programs, more alternatives in curricula, and for greater emphasis in meeting the needs of the individual student.[42]

STUDIES RELATED TO CONTRACT TEACHING

Champagne and Goldman, in their handbook, give several examples of contract learning. As did Bertie, they concluded that a contract should contain three major parts as follow: (1) objectives, written in clear, direct English preferably in student performance terms. Level of

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[42]Neal R. Bertie, Individualizing Education Through Contract Learning (University, Alabama: The University of Alabama Press, 1975).

performance and conditions under which the performance is to be exhibited, (2) procedures, complete, explicit, and mutually understood directions. They should include time, schedules, if possible; generally the procedures are easier to follow if written in sequential order, and (3) evaluation, the terms of evaluation of mastery of the skill should be spelled out. If these are in performance terms at higher level than recall or awareness, so much the better.[43] The authors recommend that a contract be written and kept in a place accessible to both parties.

Although the stacks and files are filled with documented evidences of the values, benefits, and positive results of various innovative systems in teacher education, there still remains concern among educators about effective implementation of these systems. Robb expressed his concern of universities being flexible to permit the type of educational experiences for students who are desired and needed to serve their best interests.[44] In the field of therapeutic recreation, Sulsberger reflects on the importance of the kind of flexibility in higher education Robb referred to. By providing quality non-conventional

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[43]David W. Champagne and Richard M. Goldman, Handbook for Managing Individualized Learning in the Classroom (Englewood Cliffs: Educational Technology Publications, 1975), p. 91.

[44]Gary Robb, "Integrating Pre-Service Education and Professional Functioning," Therapeutic Recreation Journal, 7 (2) (2nd Quarter, 1973):40-46.

experiences for students in an introductory course in therapeutic recreation, Sulsberger gave evidence of positive feedback from the students concerning their attitudes toward disabled persons where before the conventional type of instruction had produced adverse attitudes toward the disabled. Sulsberger concluded, however, that the experience and exposure in and of themselves did not automatically bring about the positive attitudes; the variety of experiences and exposures plus the quality were the key factors.[45] Gustafson, in his study, supported Sulsberger's views through his findings that the results of modular open-back scheduling had positive effects on students' attitudes in physical education.[46]

SUMMARY

The literature reviewed in this study gave strong support to direction and ultimate achievement in identifying the essential competencies which provided the basis for the development of nine competency-based modules

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[45]Thomas Sulsberger, "The Influence of an Introductory Course in Therapeutic Recreation on Students' Attitudes Toward Disabled Persons" (Master's degree thesis, University Park, Pennsylvania State University, 1975).

[46]John Gustafson, "The Effects of Selected Teaching Styles on Learning an Individual Sport" (Ph.D. dissertation, University of Utah, 1972).

in therapeutic recreation leadership for the orthopedically handicapped with selected disabilities.

The literature tends to support competency-based education and views individualized personalized instruction as an integral part of a contract modular system. In spite of the increased awareness of teacher accountability in perfecting the various systems, the writer did not encounter any study that expressed a strong suggestion of returning to the teacher-centered classroom.

Chapter 3

METHODS AND PROCEDURES

The basic methods and procedures used in this study are discussed in this chapter.

The primary purpose of this study was to identify a hierarchy of the most essential competencies needed by the prospective recreation leader who will be working with selected orthopedically handicapped individuals (arthritis, cerebral palsy, lower-extremity amputation, muscular dystrophy, and stroke) during professional preparation in field experience I. During the second semester of a student's sophomore year, this practicum will provide observatory and practical experiences during the assigned period. Direct exposure to the organization, management, and direction of therapeutic recreation for selected orthopedic disabilities in nursing homes, community recreation centers, and public schools under the supervision of an experienced therapeutic recreation or activity leader will be provided.

A secondary purpose of the study was to develop contractual modules for the most essential competency in

each of the nine competency areas of field experience I. Additional undertakings in this study dealt with the identification of a hierarchy of competencies for field experiences II and III that may be used, in the future, as a basis for development of instructional modules in therapeutic recreation. Also, attempts were made to ascertain information concerning the percentages of orthopedic disabilities (arthritis, cerebral palsy, lower-extremity amputation, muscular dystrophy, and stroke) in the patient/client populations of nursing homes, community recreation centers, and public schools as sources of information to facilitate student assignments compatible to achieving the modular objectives in field experience I. To further assist the institution's supervisors in making appropriate student assignments during field experiences, this study was also concerned with the collection of demographic information on the respondents, i.e., sex, age, level of education, employment level, and professional organization affiliation.

The review of related literature revealed several competency-based studies that illuminated the path and offered suggestions as to the procedure that would aid best in obtaining the desired information for this study. The decision was finally made to conduct a descriptive investigation through a survey among the practitioners in the area where the prospective therapeutic recreation

leaders would be engaged in field experience I. It was assumed that, provided with a list of competencies, the practitioners, based on their professional preparation and experiences, would help identify those essential competencies for the teaching modules. The instrument used for this purpose was a sixty-seven item questionnaire form consisting of fifty-nine competency statements and eight demographic items related to the therapeutic recreation leader or his duties (see Appendix B). This questionnaire rating list was designed by the University of Illinois at Urbana-Champaign in the Department of Leisure Studies to train entry-level personnel for the field of therapeutic recreation. Upon receiving permission from Mr. Jerry D. Kelly, project director for the Illinois Community College Study, to use the questionnaire in this study (see Appendix A), the form was modified to ascertain responses concerning essential, most important, desirable, and not important competencies for field experiences I, II, and III. The questionnaire form was also modified to procure information specifically related to selected orthopedic disabilities; namely, arthritis, cerebral palsy, lower-extremity amputations, muscular dystrophy, and strokes.

On November 19, 1977, forty-eight modified questionnaire survey forms, enclosed with a self-addressed, stamped envelope and a descriptive cover letter, were mailed to therapeutic recreation and activity leaders in

selected hospitals and nursing homes, twenty-three to selected community recreation centers, and twenty-nine to selected public schools within a radius of one hundred miles of Raleigh, North Carolina, where students at Shaw University will participate in therapeutic recreation field experiences. The enclosed cover letter was designed to elicit the cooperation of the practitioners as well as to inform them of the study's purposes and the anticipated benefits. The date of December 12, 1977, was requested as the return date for all completed instruments. By December 15, 1977, ten nursing homes, two community centers, and seven public school practitioners had returned usable forms. The methods of getting the remaining forms called for personal telephone calls and visits to the settings of the non-respondents. By January 6, 1978, thirty-five forms were received from nursing homes, seventeen from the public schools, and eleven from community recreation centers for a final count. Of the one hundred forms sent out, a total of sixty-three (63%) were returned. Three hospitals and two nursing homes returned forms indicating that they did not have anyone employed in the position of therapeutic recreation or activity leadership. Other addressees did not respond to initial or follow-up telephone calls or visits.

Through the survey an effort was made to determine the priority of the fifty-nine competencies by asking the practitioners to rate each competency statement of the

survey according to its importance for professional functioning during the student's field experiences I, II, and III. In order to accomplish this task, the survey instrument provided four response choices to each competency statement--"essential," "important," "desirable," and "not important," which were coded as "4," "3." "2." and "1," respectively.

The task of determining the priorities of the competencies in each level of the student's field experiences (field experience I, beginning level; field experience II, intermediate level; and field experience III, advanced level) were arranged in parallel order for ease of comparison during the respondent's rating process (see Appendix B).

The data obtained for field experience I competencies were analyzed and presented descriptively in tables which included the mean, mode, median, standard deviation, rank within each competency area, and rank among all competency statements. Data for field experiences II and III included only the mean and standard deviation values for each competency statement (see Appendixes H and I). Additional and concomitant data were computed and presented in table form for the following phases of the study: number and percentages of male and female respondents employed in the settings surveyed; age and average age of respondents; number and percentages of respondents' degrees of

professional preparation; number and percentages of respondents' level of affiliation with the National Therapeutic Recreation Society; number and percentages of major orthopedic client/patient population with whom the respondents work in therapeutic recreation settings; number of competency statements in each competency area; and the rank order and mean values for each competency area of the study. Each table is preceded by an analysis and brief discussion of its data. All data were computed by the use of a hand calculator and the Honeywell 300 computer system at Middle Tennessee State University.

Based on the competency identified to be "most essential" in each of the nine competency areas, competency-based, contract modules were developed for therapeutic recreation leadership in field experience I. Competency statements and numbers for which modules were developed are indicated as follow:

Module Numbers	Competency Statements	Statement Numbers
1	Application of ethical standards of the therapeutic recreation profession	4
2	Comprehension of the rationale for a "team approach" and the role of therapeutic recreation within the team	14

Module Numbers	Competency Statements	Statement Numbers
3	Knowledge of normal biological growth and development and the structure and function of the human body	21
4	Comprehension of the symptoms that characterize biological and psychological dysfunction	28
5	Knowledge of basic communication theories and their application to the communication process	32
6	Knowledge of various leadership approaches and techniques	38
7	Knowledge of first aid and safety procedures and practices	43
8	Application of ability to utilize specific activities, to meet the needs of the therapeutic recreation patient/ client	48
9	Comprehension of organizational factors and resources required for a therapeutic recreation program	53

The next undertaking was the development of each competency into a contract module. Several sources in the reviewed literature contributed to the modules' structure

and contents, but the collected work of Roberts[1] served as the primary source for the modules' format.

A student manual was developed for the course, Recreation 281: Field Experience I in Therapeutic Recreation. The manual, titled "Field Experience I: Competency-Based Modules in Therapeutic Recreation for Selected Orthopedic Disabilities," consists of the purpose of the manual, course title and number, introduction to the course, instructional goals for the course, behavioral objectives, prerequisites, sequence of instruction, method of evaluation, and the nine modules. Each module begins with the component to which it belongs (Recreation 281: Field Experience I in Therapeutic Recreation), followed by the title of the module, its purpose and importance (rationale), statements specifying the competencies for which a student is held accountable (behavioral objectives), a statement of what a student needs to start the module (prerequisites), steps a student may take to complete the module (student's options) prescribed instructional activities designed to assist the student to attain the behavioral objectives (learning activities), standards of proficiency levels the student is expected to attain and

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[1]Launey F. Roberts, Jr., ed., Individualizing Instruction in Educational Administration: A Performance-Based Worktext (New York: MSS Information Corporation, 1976), pp. 164-168.

formative assessment procedures (post-assessment), a description of what a student must do who failed to demonstrate competence as indicated in the formative assessment procedure (remediation), and materials and resources as aids to successful completion of the learning activities. Specific resource material(s) listed in cross-referenced numbers and pages to the descriptive resource material list are located at the end of each learning activity of a module.

Each learning activity was assigned contract points valuing from five to thirty points depending on the hierarchy of learning, approximate time involvement for completion, and personal expenses required to successfully complete the assignment. Contract points are cumulative from module to module and are considered in the summative evaluation and grade assignment. A student may accrue a maximum of 420 to a minimum of 311 contract points for successful completion of the nine modules. Post-assessment of each module contains a comprehensive test based on the behavioral objectives and learning activities of the modules. A maximum of 870 to a minimum of 736 points may be obtained for successful completion of the nine tests.

Upon completion of all contracted modules, the student will take a final examination for the course, consisting of one hundred items, ranging in contract points from one hundred to eighty-five for successful completion.

The student will receive a final grade based on the sum of contract points for the modules' comprehensive examinations, learning activities, and final course examination. A grade of A, B, C, D, or F will be assigned based on a point scale ranging from 1,292 (A) to 902 (F).

An attempt to determine the adequacy of the developed modules consisted of administering a devised check list to twelve students enrolled in a therapeutic recreation course at A & T State University, Greensboro, North Carolina, and seven professional practitioners, administrators, and consultants in the field of Allied Health. The check lists mailed to A & T State University were administered under the auspices of Dr. Roy D. Moore, Chairman of the Department of Health, Physical Education and Recreation. The check lists were completed and returned by mail. The seven professionals were contacted by telephone to ask their permission to participate in the modules' evaluation. Six check lists and six copies of the modules were mailed to the participants (see Appendix D). Five completed check list forms were personally returned to the writer, and one was returned by mail. The seventh check list was hand delivered to the participant and returned similarly. By use of a hand calculator the data from both sampled populations were tabulated for the mean value of each evaluative statement on the check list (see Tables 19, 20, and 21).

A table of mean values was constructed for the data computed from the check lists of each sampled population.

The procedures used in gathering the data for this study required many hours of involvement. The writer's assumption is that several questionnaire forms were not returned because of several reasons: its length, its technical nature, and its consumption of time to complete. However, the data accrued from the responses received provided invaluable information for the text and completion of the study.

Chapter 4

ANALYSIS OF DATA AND DISCUSSION

The primary concern of this study was the identification of the most essential competencies needed by the prospective recreation leader who will be working with selected orthopedically handicapped individuals during professional preparation in field experiences I, II, and III (see Appendix C for field experience I data). Since this study was not intended to develop modules for field experiences II and III, the basic data collected for these are listed for comparison with field experience I basic data and recorded resources for future development of competency-based modules. The mean and standard deviation are found in Appendixes H and I; no further use is made of these data in this study. In field experience I the most essential competency in each of the nine areas is identified with an asterisk.

A sub-problem of this study was to develop contractual modules for the most essential competency in each of the nine areas in field experience I. Each module was to be based on competencies needed at the entry-level of field experience I and used as a program matrix for future

construction of learning experiences for the students in field experiences II and III.

The survey provided additional information concerning the number of male and female recreation and activity respondents, age levels, level of affiliation with the National Therapeutic Recreation Society, the major client/patient population in the settings surveyed having arthritis, cerebral palsy, muscular dystrophy, strokes, and lower-extremity amputations, and level of educational preparation (see Tables 13, 14, 15, 16, and 17).

Table 1 shows the competency areas consisting of 13 items on "Orientation to Therapeutic Recreation"; "Agencies, Institutions, and Teamwork," 7 items; "Human Growth and Development," 5 items; "Disabling Conditions," 6 items; 5 items each for "Communications," "Group Leadership," and "Activity Skills"; "Activity Analysis and Adaptation," 4 items; and "Program Planning and Development," 9 items. The general information items on the respondents consist of 8 items related to the respondents and job-related duties.

The data were secured during the month of December, 1977. Within the nursing home settings 35 (52%) of the 48 questionnaire forms were returned and used. In school settings 17 of 29 (58%) usable forms were returned, and, of 23 forms sent to community recreation centers, 11 (47%) usable ones were returned (see Table 2).

Table 1

Competency Items Classified by Competency Areas

Competency Areas	Number of Items
Orientation to Therapeutic Recreation	13
Agencies, Institutions, and Teamwork	7
Human Growth and Development	5
Disabling Conditions	6
Communications	5
Group Leadership	5
Activity Skills	5
Activity Analysis and Adaptation	4
Program Planning and Development	9
General Information Items (Age, sex, educational level, NTRS affiliation, employment status, job title, major disability in setting, job title description)	8
Total	67

For the purposes of data analysis the 59 competencies were grouped into nine areas. The mean, median, mode, and standard deviation were computed for each competency to determine the rank order and level of importance among all competencies and the importance of each within its area. Based on the mean values, the competency statements were listed consecutively in table form by item number grouped into nine areas. The competency with the greatest mean

Table 2

Distribution of Data Forms Returned from Nursing Homes, Community Recreation Centers, and Schools

Settings	Number of Questionnaires Sent	Number of Returns	Percent of Returns
Nursing Homes	48	35	52
Community Recreation Centers	23	11	47
Public Schools	29	17	58
Total	100	63	63

value was selected as being most essential for that area. Predicated on these essential competencies, competency-based modules were developed for each area. Competencies and related data are listed in Appendix C.

COMPETENCY AREA I: ORIENTATION TO THERAPEUTIC RECREATION

The first area includes thirteen statements on introductory materials that the prospective therapeutic recreation leader should have to conceptualize competently the function of therapeutic recreation in programming for selected orthopedically handicapped individuals. Table 3 shows the degree of importance practitioners in the three settings surveyed (nursing homes, community recreation centers, and schools) gave to the 13 competency statements in area 1. The rank order and mean values are given for

Table 3

Mean Values and Rank Order of Responses of Hospitals and Nursing Homes, Community Recreation Centers, and School Settings for Competencies in Area 1: Orientation to Therapeutic Recreation

Competency Number	Hospitals and Nursing Homes		Community Recreation Centers		School Settings	
	Rank	Mean	Rank	Mean	Rank	Mean
1	4	2.171	1	2.818	7	2.117
2	12	1.742	6	2.272	1	2.352
3	2	2.294	7	2.272	12	2.000
4	1	2.485	3	2.454	4	2.235
5	11	1.764	4	2.416	8	2.117
6	13	1.257	8	2.181	5	2.232
7	7	2.028	5	2.400	9	2.058
8	5	2.171	13	1.818	10	2.058
9	8	2.028	2	2.818	11	2.058
10	3	2.294	9	2.181	3	2.294
11	9	2.028	10	2.181	2	2.352
12	6	2.057	11	2.181	6	2.235
13	10	2.000	12	2.000	13	1.937

each of the 13 competencies. Competency statement 1, "Comprehension of basic philosophical foundations and theories of play," was placed first by rank order and mean value (2.818) according to the practitioners in community recreation centers. Having a mean value of 2.294, competency statement 4, "Application of ethical standards of the therapeutic recreation profession," was ranked number 1 by the nursing home practitioners. Competency statement 2, "Application of basic Therapeutic Recreation concepts and philosophies," received a mean value of 2.352 according to the practitioners working with the selected orthopedic disabilities in school settings. It was interesting to note that competency statement 1 and competency statement 9, "Comprehension of differentation between process and service as it relates to therapeutic recreation," were ranked according to mean values as numbers 1 and 2 in area 1, "Orientation to Therapeutic Recreation." Although the number of responses from community recreation centers was less than the number from the other two settings surveyed, both statements 1, "Comprehension of basic philosophical foundations and theories of play," and 9, "Comprehension of differentiation between process and service as relates to therapeutic recreation," were found in the combined responses of the practitioners in these settings.

In summary, the major implication inferred by the mean values and rank order of competencies in competency area 1 is the seemingly common consensus of the practitioners that the student in field experience I should have sound knowledge and understanding of ethical standards as related to the therapeutic recreation profession. In view of this, the orientation phase of professional preparation in therapeutic recreation should place emphasis on competency 4, "Application of ethical standards of the therapeutic recreation profession."

COMPETENCY AREA 2: AGENCIES, INSTITUTIONS, AND TEAMWORK

This area includes seven competency statements related to the prospective therapeutic recreation leader's becoming competent in knowledge, comprehension, and application of therapeutic recreation functions in nursing homes, community recreation centers, and school settings while working with the orthopedically handicapped. Based on mean values, competency statement 14 ranks as being number 1 in priority among community recreation center and school practitioners and number 2 among nursing home recreation personnel. Nursing home practitioners, however, ranked competency 16 as being most essential in curriculum development (see Table 4). Of the combined responses from all settings surveyed for all of the competency statements,

Table 4

Mean Values and Rank Order of Responses of Hospitals and Nursing Homes, Community Recreation Centers, and School Settings for Competencies in Area 2: Agencies, Institutions, and Teamwork

Competency Number	Hospitals and Nursing Homes		Community Recreation Centers		School Settings	
	Rank	Mean	Rank	Mean	Rank	Mean
14	2	2.200	1	2.363	1	3.117
15	3	2.083	5	2.000	3	2.500
16	1	2.228	6	2.000	2	2.588
17	4	1.857	2	2.181	5	2.294
18	7	1.685	3	2.181	7	1.882
19	4	1.882	4	2.090	4	2.352
20	5	1.861	7	2.000	6	2.235

item 14 ranks third, and item 16 ranks seventh in importance (see Appendix C).

Practitioners in the setting surveyed are in strong agreement that the student in field experience I should have a thorough understanding of the importance of a therapeutic recreation leader's role on the rehabilitation team while working with the orthopedically handicapped. It is concluded, therefore, that a program of professional preparation should strongly consider competency 14, "Comprehension of the rationale for a 'team approach' and the role of therapeutic recreation within the team," as a priority in curriculum development. Other findings in competency area 2 show relationship of the respondents' preferences and indications which can serve to further develop instructional modules in this area.

COMPETENCY AREA 3: HUMAN GROWTH AND DEVELOPMENT

The community recreation center and school setting practitioners rated competency statement 21, "Knowledge of normal biological growth and development and the structure and function of the human body," with a mean value of 2.363 and 3.058, respectively, as top priority for modular development in competency area 3. However, nursing home personnel rated competency 22 with a mean value of 2.114 to be of greater importance in this area (see Table 5).

Table 5

Mean Values and Rank Order of Responses of Hospitals and Nursing Homes, Community Recreation Centers, and School Settings for Competencies in Area 3: Human Growth and Development

Competency Number	Hospitals and Nursing Homes		Community Recreation Centers		School Settings	
	Rank	Mean	Rank	Mean	Rank	Mean
21	3	1.914	1	2.363	1	2.058
22	1	2.114	2	2.181	2	2.705
23	5	1.057	5	1.363	5	1.764
24	4	1.857	3	2.181	4	2.411
25	2	2.057	4	2.181	3	2.647

Competency area 3 in Appendix C shows competency statement 21, "Knowledge of normal biological growth and development and the structure and function of the human body," as being the most essential item according to the mean value for practitioners in all settings for area 3.

It appears that the opinions of the practitioners in this survey are consistent with the findings of Bookwalter and VanderZwaag,[1] Updyke and Johnson,[2] Edington and Edgerton,[3] Schurr,[4] and Bucher[5] concerning the importance of "Knowledge of normal biological growth and development and the structure and function of the human body" as having top priority in professional preparation of those concerned with human growth and development. The mean value and rank order of competency 21, "Knowledge of normal biological growth and development and the structure and function of the human

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[1]Karl W. Bookwalter and Harold J. VanderZwaag, Foundations and Principles of Physical Education (Philadelphia: W. B. Saunders Company, 1969).

[2]Wynn R. Updyke and Perry G. Johnson, Principles of Modern Physical Education, Health and Recreation (New York: Holt, Rinehart and Winston, Inc., 1970).

[3]D. W. Edington and V. R. Edgerton, The Biology of Physical Activity (Boston: Houghton Mifflin Company, 1976).

[4]Evelyn Schurr, Movement Experience for Children: Curriculum and Methods for Elementary School Physical Education (New York: Appleton-Century-Crofts, 1967).

Charles A. Bucher, Foundations of Physical Education (7th ed.; Saint Louis: The C. V. Mosby Company, 1975.

body," suggest that an instructional module warrants development as a result of its high priority.

COMPETENCY AREA 4: DISABLING CONDITIONS

This area consists of six competency statements designed to provide the prospective therapeutic recreation leader with an understanding of the etiology of selected orthopedic disabilities as related to the functions of therapeutic recreation in the process of curriculum development. Table 6 identifies statement 30, "Under supervision, application of client assessment data in stating treatment objectives," with a mean value of 1.971, to be most essential among nursing home practitioners. Community recreation practitioners considered statement 29, "Comprehension of social-cultural morphological theories that explain some aspects of abnormal behavior," to be the most essential. Practitioners in nursing homes and schools agreed that competency statement 27, "Under professional supervision, application of the knowledge of the etiology of biological and psycho-social dysfunction in relationship to client assessment," was least important in modular construction for this area. Competency area 4, Appendix C, based on combined responses and mean value, shows competency statement 28, "Comprehension of the symptoms that characterize biological and psycho-social dysfunction," to

Table 6

Mean Values and Rank Order of Responses of Hospitals and Nursing Homes, Community Recreation Centers, and School Settings for Competencies in Area 4: Disabling Conditions

Competency Number	Hospitals and Nursing Homes		Community Recreation Centers		School Settings	
	Rank	Mean	Rank	Mean	Rank	Mean
26	4	1.914	5	1.818	2	2.352
27	6	1.771	6	1.727	4	2.176
28	2	1.972	1	2.272	3	2.187
29	5	1.794	3	2.090	1	2.588
30	1	1.971	4	1.818	5	1.941
31	3	1.971	2	2.181	6	1.823

number 25 among all competency statements but number 1 within the area of "Disabling Conditions."

The mean values and rank order of the competency statement in competency area 4 indicate some degrees of indifference among the practitioners in the settings surveyed as to which competency should have top priority in each setting as a basis for curriculum development in therapeutic recreation leadership. However, as a result of the combined mean values and rank order among all competencies, competency 28, "Comprehension of the symptoms that characterize biological and psycho-social dysfunction," should have top priority for curriculum development in competency area 4. Other findings in this area are presented for comparison and consideration for further modular development.

COMPETENCY AREA 5: COMMUNICATIONS

The area of communications contains five competency statements related to the knowledge, comprehension, and ability of the prospective therapeutic recreation leader to apply communicative skills to the achievement of therapeutic recreation goals. Table 7 reports the levels of these five competency statements' importance in curriculum development as viewed by therapeutic recreation practitioners in nursing homes, community recreation centers, and school settings. Competency statement 32, "Knowledge of basic

Table 7

Mean Values and Rank Order of Responses of Hospitals and Nursing Homes, Community Recreation Centers, and School Settings for Competencies in Area 5: Communications

Competency Number	Hospitals and Nursing Homes		Community Recreation Centers		School Settings	
	Rank	Mean	Rank	Mean	Rank	Mean
32	1	2.085	1	2.181	3	2.058
33	3	1.885	3	1.909	4	2.000
34	2	2.085	4	1.909	2	2.235
35	5	1.428	5	1.909	1	2.294
36	4	1.611	2	2.090	5	2.000

communication theories and their application to the communication process," was ranked by nursing home practitioners as having top priority with a mean value of 2.085 for these settings. Community recreation center recreation leaders also ranked competency statement 32 as most essential in curriculum development. School practitioners, however, ranked statement 35, "Knowledge of basic historical linguistic theories that underlie contemporary communications," to be most essential in school settings as a basis for modular development. Nursing home and community recreation practitioners rated competency statement 35 as being least important in their areas. A combined report on all practitioners' responses shown in competency area 5, Appendix C indicates that competency statement 32 has a rank order of 1 within the area of "Communications" and 21 among all competency items.

In view of the mean values and rank order of the practitioners in each of the settings surveyed, it appears that "Knowledge of basic communication theories and their application to the communication process," as related to successful articulation of the practitioners with patients/ clients and co-workers is of utmost importance in area 5, "Communications." Furthermore, it warrants top priority in curriculum development for professional preparation of therapeutic recreation leaders. A listing of other findings

in area 5 is for comparative purposes and consideration for further curricula development.

COMPETENCY AREA 6: GROUP LEADERSHIP

This area includes five competency statements related to knowledge, understanding, and applicability of group leadership to the therapeutic recreation process in servicing selected orthopedic disabilities in therapeutic recreation. Table 8 shows the mean value and rank order for each statement in this area as evaluated by therapeutic recreation practitioners in nursing homes, community recreation centers, and school settings. Competency statement 37, "Knowledge of the nature of groups and group process," with a mean value of 2.090, is ranked number 1 by community recreation center practitioners. Nursing home and school practitioners considered competency statement 38, "Knowledge of various leadership approaches and techniques," to be most essential in curriculum development. Competency area 6, Appendix C shows that the combined responses for practitioners of all settings ranked competency statement 38, with a mean value of 2.174, to be most essential as the basis for curriculum development in the area of "Group Leadership."

The difference of opinion among the practitioners in the various settings could be the result of program emphasis and methods used in the different settings due to the nature

Table 8

Mean Values and Rank Order of Responses of Hospitals and Nursing Homes, Community Recreation Centers, and School Settings for Competencies in Area 6: Group Leadership

Competency Number	Hospitals and Nursing Homes		Community Recreation Centers		School Settings	
	Rank	Mean	Rank	Mean	Rank	Mean
37	3	1.971	1	2.090	2	2.352
38	1	2.085	2	2.000	1	2.470
39	5	1.542	3	1.909	5	1.882
40	4	1.657	5	1.818	5	1.882
41	2	2.085	4	1.909	3	2.176

of the patient/client population. However, it appears that the nursing home and school practitioners are in agreement that competency statement 38, "Knowledge of various leadership approaches and techniques," should be the choice as a basis for curriculum development in area 6, "Group Leadership." In that community recreation centers indicated competency statement 37, "Knowledge of the nature of groups and group process," as being most essential for curriculum development, institution supervisors should consider the placement of field experience I students in these settings and provide them with adequate "Knowledge of the nature of groups and group process" since their experiences presumably will require such competency.

COMPETENCY AREA 7: ACTIVITY SKILLS

This area consists of five competency statements on activity skills related to experiences the prospective therapeutic recreation leader should have to work effectively with the orthopedically handicapped patient/client in nursing homes, community recreation centers, and school settings. Table 9 reveals data on the most essential competency statements as viewed by the practitioners in the three selected settings as being most essential in developing modules in activity skills for therapeutic recreation leaders. Competency statement 42, "Application of basic techniques and skills required for participation in various

Table 9

Mean Values and Rank Order of Responses of Hospitals and Nursing Homes, Community Recreation Centers, and School Settings for Competencies in Area 7: Activity Skills

Competency Number	Hospitals and Nursing Homes		Community Recreation Centers		School Settings	
	Rank	Mean	Rank	Mean	Rank	Mean
42	1	2.200	2	2.000	2	2.470
43	2	2.114	1	2.272	1	2.764
44	3	2.023	3	2.000	3	2.176
45	5	1.485	5	1.454	5	1.411
46	4	1.714	4	1.818	4	2.000

therapeutic activities," with a mean value of 2.200, is ranked number 1 in importance by nursing home practitioners. Competency statement 43, "Knowledge of first aid and safety procedures and practices," is viewed to be most essential as the basis for program development by practitioners in community recreation centers and school settings. Competency statement 45, "Knowledge of mechanical and electrical engineering which is useful in designing and developing various media equipment which may be used for recreation programming," is ranked lowest in importance for this area by practitioners in all settings. Combined responses from all practitioners give indication in competency area 7, Appendix C, that competency statement 43 is most essential in the area of "Activity Skills" and ranks number 1. Among all the competency items, it is ranked number 2.

The findings in competency area 7, based on the mean values and rank order of the competency statements, give indication that the practitioners in the various settings surveyed are in close agreement concerning competency statement 43, "Knowledge of first aid and safety procedures and practices," as being most essential for curriculum development. The nature of the patient/client population in the various therapeutic settings (arthritis, cerebral palsy, lower-extremity amputation, muscular dystrophy, and stroke) is probably the major contributing factor for the

preferences of community recreation center leaders, public school practitioners, and nursing home activity leaders.

COMPETENCY AREA 8: ACTIVITY ANALYSIS AND ADAPTATION

The four competency statements in this area relate to experiences that would afford the prospective therapeutic recreation leader efficiency in analyzing activities and adapting them to meet the needs of patients/clients in nursing homes, community recreation centers, and school settings which provide services for orthopedically handicapped individuals. Table 10 shows the mean values and rank order for each competency statement as viewed and evaluated for curriculum development priorities in therapeutic recreation leadership preparation. Competency statement 48, "Application of ability to utilize specific activities to meet the needs of the therapeutic recreation patient/client," has a rank order of 1 in nursing home and community recreation settings. Statement 50, "Application of the ability to select, adapt, and modify activities for maximizing participation and attainment of objectives," was evaluated as having top priority as the basis for curriculum development by school setting practitioners. Combined responses of all practitioners indicated that competency statement 48 is most essential in the area of "Activity Analysis and Adaptation." It ranked as statement 16 among all other competency items.

Table 10

Mean Values and Rank Order of Responses of Hospitals and Nursing Homes, Community Recreation Centers, and School Settings for Competencies in Area 8: Activity Analysis and Adaptation

Competency Number	Hospitals and Nursing Homes		Community Recreation Centers		School Settings	
	Rank	Mean	Rank	Mean	Rank	Mean
47	2	1.800	2	1.909	3	1.764
48	1	2.114	1	2.272	2	2.117
49	4	1.257	4	1.500	4	1.588
50	3	1.612	3	1.909	1	2.294

The data in competency area 8 include strong support from the practitioners in the setting surveyed that the student in field experience I should have an understanding of how specific activities are utilized to meet the needs of the patient/client in therapeutic recreation. Furthermore, curriculum developers should give considerable thought to preparing the student to know, understand, and apply the techniques of selecting, adapting, and modifying activities for maximizing the participation and attainment of the orthopedically handicapped in therapeutic recreation activities.

COMPETENCY AREA 9: PROGRAM PLANNING AND DEVELOPMENT

This area includes nine competency statements related to program planning and development that would provide experiences for the prospective therapeutic recreation leader to observe effectively and participate in program-planning activities for the orthopedically handicapped patient/client in nursing homes, community recreation centers, and school settings. Table 11 shows the rank order and mean values for the most essential competency statement in program development as viewed and evaluated by practitioners in nursing homes, community recreation centers, and school settings. Competency statement 53, "Comprehension of organizational factors and resources

Table 11

Mean Values and Rank Order of Responses of Hospitals and Nursing Homes, Community Recreation Centers, and School Settings for Competencies in Area 9: Program Planning and Development

Competency Number	Hospitals and Nursing Homes		Community Recreation Centers		School Settings	
	Rank	Mean	Rank	Mean	Rank	Mean
51	7	1.852	3	2.090	2	2.235
52	2	2.142	4	1.909	3	2.176
53	1	2.205	2	2.272	1	2.353
54	3	2.057	7	1.727	6	2.000
55	5	1.942	1	2.545	7	1.882
56	8	1.777	9	1.636	8	1.764
57	9	1.657	8	1.727	9	1.294
58	6	1.885	5	1.909	4	2.117
59	4	2.055	6	1.909	5	2.058

required for a therapeutic recreation program," was ranked number 1 by nursing home practitioners as well as school setting therapeutic recreation leaders with 2.205 and 2.353 mean values, respectively. Community recreation center practitioners evaluated competency statement 55, "Flexibility in application of new and emerging procedures, practices, and approaches applicable to client/patient programming," to be most essential in the area of "Program Planning and Development." Competency area 9, Appendix C, shows that competency statement 53 was rated to be most essential by all practitioners in all three settings of the survey. Competency statement 53 also ranked 19 among all other competency statements as reported by the practitioners.

It is concluded that the practitioners in the nursing homes and public school settings of this study concurred as to the importance of competency statement 53, "Comprehension of organizational factors and resources required for a therapeutic recreation program," being the basis for curriculum development in area 9. Even though community recreation center leaders showed a slight mean value difference of .340 from nursing home leaders and .192 from public school leaders, the mean value and rank order among all competency statements showed competency statement 53 to be most highly preferred as a priority for curriculum development.

The differences in therapeutic settings, nature of the patient/client population, and profesisonal training of the practitioners are probable reasons for many of the differences in mean values and rank orders observed in the various competency areas.

The data in Table 12 show an analysis of all competency statements. A rank order was computed on all competency statements separately for nursing homes, community recreation centers, and school settings. The three population responses were computed for a combined computation place, rank order, and mean values. There were diversity means varied among the responses of the practitioners. Nursing home practitioners placed competency statement 4, "Application of ethical standards of the therapeutic recreation profession," as having top priority in curriculum development; competency statement 1, "Comprehension of basic philosophical foundations and theories of play," was considered to have top priority by community recreation center practitioners, and the school practitioners ranked statement 14, "Comprehension of the rationale for a 'team approach' and the role of therapeutic recreation within the team," as being most essential in curriculum development. The respondents in the three settings had no congruity as to the most essential competency. However, as the rank order progressed from the top third to the bottom, consonances were observed among the

Table 12

Rank Order by Mean Values of All Competency Statements for Nursing Homes, Community Recreation Centers, and School Settings

Competency Rank Order	Nursing Homes		Community Recreation Centers		Schools	
	Statement Order	Mean	Statement Order	Mean	Statement Order	Mean
1	4	2.485	1	2.818	14	3.117
2	10	2.294	9	2.818	21	3.058
3	3	2.294	55	2.545	43	2.764
4	16	2.228	4	2.454	22	2.705
5	53	2.205	5	2.416	25	2.647
6	14	2.200	7	2.400	16	2.588
7	42	2.200	14	2.363	29	2.588
8	1	2.171	21	2.363	15	2.500
9	8	2.171	53	2.272	38	2.470
10	52	2.142	2	2.272	42	2.470
11	22	2.114	3	2.272	24	2.411

Table 12 (continued)

Competency Rank Order	Nursing Homes		Community Recreation Centers		Schools	
	Statement Order	Mean	Statement Order	Mean	Statement Order	Mean
12	43	2.114	28	2.272	2	2.352
13	48	2.114	43	2.272	11	2.352
14	32	2.085	48	2.272	19	2.352
15	34	2.085	6	2.181	26	2.352
16	38	2.085	10	2.181	37	2.352
17	41	2.085	11	2.181	53	2.352
18	15	2.083	24	2.181	10	2.294
19	12	2.057	12	2.181	17	2.294
20	25	2.057	17	2.181	50	2.294
21	54	2.057	18	2.181	35	2.294
22	59	2.055	31	2.181	4	2.235
23	7	2.028	22	2.181	12	2.235
24	9	2.028	25	2.181	20	2.235
25	11	2.028	32	2.181	34	2.235

Table 12 (continued)

Competency Rank Order	Nursing Homes		Community Recreation Centers		Schools	
	Statement Order	Mean	Statement Order	Mean	Statement Order	Mean
26	30	2.028	19	2.090	51	2.235
27	44	2.023	29	2.090	6	2.232
28	13	2.000	36	2.090	28	2.187
29	28	1.972	37	2.090	27	2.176
30	31	1.971	51	2.090	4	2.176
31	37	1.971	13	2.000	44	2.176
32	55	1.942	15	2.000	52	2.176
33	26	1.914	16	2.000	1	2.117
34	21	1.914	20	2.000	5	2.117
35	33	1.885	38	2.000	48	2.117
36	58	1.885	42	2.000	58	2.117
37	19	1.882	44	2.000	7	2.058
38	20	1.861	33	1.909	8	2.058

Table 12 (continued)

Competency Rank Order	Nursing Homes		Community Recreation Centers		Schools	
	Statement Order	Mean	Statement Order	Mean	Statement Order	Mean
39	17	1.857	34	1.909	9	2.058
40	24	1.857	35	1.909	32	2.058
41	51	1.852	39	1.909	59	2.058
42	47	1.800	41	1.909	3	2.000
43	29	1.794	47	1.909	36	2.000
44	56	1.779	50	1.909	39	2.000
45	27	1.771	52	1.909	46	2.000
46	5	1.764	58	1.909	54	2.000
47	2	1.742	59	1.909	33	2.000
48	46	1.714	8	1.818	30	1.941
49	18	1.685	46	1.818	13	1.937

Table 12 (continued)

Competency Rank Order	Nursing Homes		Community Recreation Centers		Schools	
	Statement Order	Mean	Statement Order	Mean	Statement Order	Mean
50	40	1.657	26	1.818	18	1.882
51	57	1.657	30	1.818	40	1.882
52	50	1.612	40	1.818	55	1.882
53	36	1.611	27	1.727	31	1.823
54	39	1.542	44	1.727	23	1.764
55	45	1.485	57	1.727	47	1.764
56	35	1.428	56	1.636	56	1.764
57	6	1.257	49	1.500	49	1.588
58	49	1.257	45	1.454	45	1.411
59	23	1.057	23	1.363	57	1.294

respondents. In the first one-third ratings, community recreation center and school setting respondents agreed with rank order of competency statement 12, "Application of personal commitment to the use of therapeutic recreation activities and modalities in the care and treatment of special populations." Among all the statements, item 12 was ranked 19. In the second one-third rank order, competency statement 58 was ranked 36 in importance by nursing home and school practitioners. The bottom third of the rank order revealed more agreements among different setting respondents than the top two-thirds. Competency statement 56, "Application of the ability to write and implement schedules for therapeutic recreation programs," ranked 56 by community recreation center and school setting practitioners. Competency statement 49, "Knowledge of management and production of a T.V. program in relation to therapeutic recreation services," and statement 45, "Knowledge of mechanical and electrical engineering which is useful in designing and developing various media equipment which may be used for recreation programming," were ranked 57 and 58, respectively, by nursing home and school setting respondents. Competency statement 23, "Comprehension of hypnosis, psychoanalysis, and dream theories that interpret problems of human growth and personality development," received the rank order of 59 from nursing home and community recreation center respondents. School setting

practitioners consistently gave each competency statement higher rating values than practitioners of other settings. Table 12 shows the mean values for competency statements in each setting to be greater for school practitioners, followed by community recreation center and nursing home practitioners. The reason for differences in importance placed on various competency statements and the higher values revealed among the school setting practitioners is not tenable. However, the educational levels among the practitioners may account for the salient values of competency statements by school practitioners; 29 percent of the total who returned the survey forms held master's degrees, whereas only 18 and 11 percent, respectively, from community recreation centers and nursing homes indicated the attainment of a master's degree (see Table 17).

Table 13 shows a comparison between the number of male and female respondents employed in nursing homes, community recreation centers, and schools who took part in the survey. Thirty (86%) of the nursing home respondents were females compared to 5 (86%) males. Community recreation center respondents were 8 males (73%) compared to 3 (27%) females. School settings had 17 respondents, 13 (76%) females compared to 4 (24%) males.

Fifty-five percent of the total respondents were employed in nursing homes, 17 percent employed in community recreation centers, and 27 percent employed in schools.

Table 13

Distribution of Male and Female Respondents Employed in Nursing Homes, Community Recreation Centers, and Schools

	Nursing Homes		Community Recreation Centers		Schools	
	N	%	N	%	N	%
Male	5	14	8	73	4	24
Female	30	86	3	27	13	76
Total	35		11		17	

Analysis of the information obtained in Table 14 indicates that female therapeutic recreation and activity leaders tend to be more favorably employed in nursing homes and school settings. The 73 percent response of males employed in community recreation centers shows a greater propensity for men in this type of recreational setting.

Table 14

Age Range and Average Age of Responsents in Nursing Homes, Community Recreation Centers, and School Settings

	Nursing Homes	Community Recreation Centers	Schools
	Age	Age	Age
Oldest Respondent	73	40	52
Youngest Respondent	23	26	22
Average Age	48	33	37

The 55 percent responses coming from nursing homes compared to 27 percent in schools and 17 percent in community recreation centers give indication for greater emphasis in developing therapeutic recreation competency-based modules to meet the expected performances in nursing homes, especially for prospective female recreation leaders.

The data in Table 14 show that the average age among recreation leaders is greater in nursing homes than in the other settings surveyed. The oldest practitioner indicated by nursing home respondents is 73 years old. School respondents indicated the age of 52 to be the highest among the group. Community recreation center respondents gave the age of 40 as the highest in the group. The youngest practitioner, age 22, was employed in the school setting. The average ages reported were 48, 33, and 37 for nursing homes, community recreation centers, and school respondents, respectively.

The data collected in Table 14 may be interpreted to mean that younger therapeutic recreation leaders are needed in nursing homes in view of the high age level. It also implies that school personnel are on the average older than community recreation center personnel. This could reflect the probability of greater job vacancies in nursing homes and schools in the near future.

Table 15 shows the levels of respondents' registration with the National Therapeutic Recreation Society (NTRS) as of December 20, 1977. Since individual names were not required on the questionnaire forms, there were no attempts to check the validity of the respondents' affiliations. However, the information given does provide some inferences as to the professional affiliation of the respondents. Forty-six percent, or 16 of the 35 respondents in nursing homes, reported no affiliation with the NTRS. Fourteen of the respondents, or 40 percent, reported being registered as therapeutic recreation leaders, 4, or 11 percent, registered as therapeutic recreation specialists, 1, or 3 percent, indicated therapeutic recreation technician registration. No master therapeutic recreation specialists or therapeutic recreation assistants were reported.

Respondents in community recreation centers indicated that 10 (11%) were not registered with the NTRS. One (9%) was listed as a therapeutic recreation assistant.

The respondents in school settings indicated that 8 of the 17 (47%) were not affiliated with the NTRS. Five (29%) were listed as therapeutic recreation leaders, and 3 (18%) were registered as therapeutic recreation technicians. One (6%) of the 17 was listed as a therapeutic recreation assistant. The master therapeutic recreation specialist was not listed in any of the three settings.

Table 15

Respondents' Level of Affiliation with the National Therapeutic Recreation Society

	Nursing Homes		Community Recreation Centers		Schools		Total	
	N	%	N	%	N	%	N	%
No Affiliation with NTRS	16	46	10	91	8	47	34	55
Therapeutic Recreation Assistant	0	0	1	9	1	6	2	3
Therapeutic Recreation Leader	14	40	0	0	5	29	19	30
Therapeutic Recreation Technician	1	3	0	0	3	18	4	6
Therapeutic Recreation Specialist	4	11	0	0	0	0	4	6
Master Therapeutic Recreation Specialist	0	0	0	0	0	0	0	0
Total	35		11		17		63	100

In Table 16 the major patient/client population with whom the respondents work in the three therapeutic settings surveyed indicates that 30 percent of the population consists of stroke patients. Twenty-two percent of the total are patients/clients with arthritis, 20 percent are lower-extremity amputees, 17 percent have muscular dystrophy, and 11 percent have cerebral palsy.

The nursing home personnel reported 76 of 105 patients/clients (72%) of the total selected disabilities. Twenty (26%) have arthritis, 8 (11%) cerebral palsy, 12 (16%) are lower-extremity amputees, 12 (16%) have muscular dystrophy, and 24 (32%) have had a form of cardiovascular attack.

Orthopedically handicapped persons appeared to be in less numbers in community recreation settings than in nursing homes and school settings. Eight percent of the patients/clients, or 9 of 105, were listed as being served in the community recreation centers surveyed; of these 3 were cerebral palsy clients, 4 were lower-extremity amputees, and 2 were muscular dystrophy patients. No indication of arthritic or stroke patients/clients was reported.

School setting respondents indicated rendering services to 20 of the 105 patients/clients in the survey, or 19 percent. Three (15%) of the schools' 20 orthopedically handicapped clients were affected by

Table 16

Major Client/Patient Population Respondents' Work
Within Therapeutic Recreation Settings

Client/Patient Classification	Nursing Homes		Community Recreation Centers		Schools		Total		Rank
	N	%	N	%	N	%	N	%	
Arthritis	20	26	0	0	3	15	23	22	2
Cerebral Palsy	8	11	3	33	1	5	12	11	5
Lower-Extremity Amputation	12	16	4	45	5	25	21	20	3
Muscular Dystrophy	12	16	2	22	4	20	18	17	4
Cardiovascular Attack (Stroke)	24	32	0	0	7	35	31	30	1
Total	76		9		20		105	100	

arthritis, 1 (5%) had cerebral palsy, 5 (25%) were lower-extremity amputees, 4 (20%) had muscular dystrophy, and 7 (35%) had residual effects of cardiovascular attacks.

A close examination of Table 16 gives profound implications to a preparatory program for therapeutic recreation practitioners who envision working in similar settings as those surveyed. It appears that greater preparations are needed in the area of therapeutic recreation leadership to work with arthritic patients in nursing homes. Seemingly, lower-extremity amputees and muscular dystrophy patients/clients are third in order as to population density in the settings surveyed. Students going into these settings can expect a patient/client population closely, if not entirely, related to classifications in Table 16.

The degrees of professional preparation are outlined in Table 17 showing the highest academic degree attained by recreation and activity leaders working in nursing homes, community centers, and school settings of the surveyed population. All of the respondents finished high school; one activity leader in the nursing home setting reported having finished only high school. Among this same group, 30 of the 35 (85%) reported having a bachelor's degree. Four (11%) reported the master's degree level of attainment.

In the community recreation center settings, 9 of the 11 respondents (82%) have the bachelor's degree. Two

Table 17

Degrees of Respondents' Professional Preparation

	Nursing Home Respondents		Community Recreation Center Respondents		Public School Respondents	
	N	%	N	%	N	%
Less Than High School Diploma	0	0	0	0	0	0
High School Diploma	1	3	0	0	0	0
Associate Degree	0	0	0	0	0	0
Bachelor's Degree	30	86	9	82	12	71
Master's Degree	4	11	2	18	5	29
Doctor's Degree	0	0	0	0	0	0
Total	35		11		17	

(18%) indicated their attainment of the master's degree. There were no indications of attainments on other educational levels among the respondents of community recreation centers.

The educational levels among the respondents in school settings showed that 12 of the 17 respondents (71%) indicated achievement of the bachelor's degree, and 5 (29%) achieved the master's degree.

A comparison of the data in Table 14 concerning the age of the respondents with their educational levels gives indication that a small percentage of respondents had formal training during their professional preparation in therapeutic recreation.

Table 18 shows the rank order and mean values for the nine areas of the survey instrument in which the competency statements were categorized. Competency area 1, "Orientation to Therapeutic Recreation," was ranked number 1 in priority as being the most important in constructing competency-based modules in therapeutic recreation for the orthopedically handicapped. Competency areas 2, "Agencies, Institutions, and Teamwork," 3, "Human Growth and Development," and 4, "Disabling Conditions," were ranked in order, respectively, with mean values of 2.097, 2.072, and 1.996. Competency area 7, "Activity Skills," was ranked number 5 with a mean value of 1.985; area 9, "Program Planning and Development," was ranked 6; area 6, "Group

Table 18

Rank Order and Mean Values for Nine Competency Areas

Rank Order	Competency Area	Mean Value
1	Orientation to Therapeutic Recreation	2.143
2	Agencies, Institutions, and Teamwork	2.097
3	Human Growth and Devleopment	2.072
4	Disabling Conditions	1.996
5	Activity Skills	1.985
6	Program Planning and Development	1.978
7	Group Leadership	1.964
8	Communications	1.924
9	Activity Analysis and Adaptation	1.799

Leadership," was ranked 7; area 5, "Communications," was ranked 8, and rank 9 was "Activity Analysis and Adaptation," competency area 8, with a 1.799 mean value. Competency 8, according to mean value, was considered to be least important as the basis for curriculum construction.

One postulation of the writer was that there would be more patients/clients with arthritic disabilities than cerebral palsy, lower-extremity amputations, muscular dystrophy, and strokes in the selected settings of this

study. In Table 16 the respondents indicated arthritic patients/clients to be 22 percent of the total patient/client population surveyed. This population was second in number to cardiovascular attacks (strokes), which was 30 percent of the total population. Lower-extremity amputations ranked third, followed by muscular dystrophy as fourth, and cerebral palsy as fifth.

Since 56 percent of the returned questionnaires came from nursing homes, the writer recognizes the relationship between the kind of services rendered in these settings and the types of patients/clients usually attracted to such facilities. It is, therefore, not unusual for data on a nursing home population to be skewed toward cardiovascular patients.

As stated elsewhere in this study, institutions concerned with undergraduate preparation of therapeutic recreation personnel should gear their programs toward greater competency of their therapeutic recreation leaders who envision working with stroke and arthritic patients/clients in therapeutic settings.

Due to the recent emphasis on mainstreaming the handicapped into normal school populations, a second hypothesis of the writer was that more muscular dystrophy students would be identified in normal school settings than cerebral palsy students since these two disabling diseases have crippling effects on school age children. The data

collected from this survey indicated a very low percentage of muscular dystrophy and cerebral palsy clients in the normal school setting. However, the writer's basic assumption was valid in that 20 percent of the schools' selected orthopedic population surveyed showed that muscular dystrophy was more prevalent in that setting than cerebral palsy (see Table 16).

Another basic assumption was that 70 percent of the respondents in the settings surveyed would rate the area of "Activity Skills" as having top priority in the overall consideration as the basis for curriculum development in therapeutic recreation modules for the orthopedically handicapped. Table 18 shows that competency area 7, "Activity Skills," has a rank order of 5 with a mean value of 1.985 or 7.3 percent lower than the top-ranked competency area, "Orientation to Therapeutic Recreation." The responses of the practitioners clearly indicate that area 1 should receive more emphasis in program development in therapeutic recreation, field experience I, for orthopedically handicapped patients/clients.

As a fourth basic assumption, the writer postulated that 70 percent of the therpeutic activity leaders would have had no formal undergraduate college training in therapeutic recreation skills. The survey instrument failed to provide specific information to validate this assumption. However, the information presented in Table 17 reveals

pertinent data from which rational deductions can be made as to the extent of formal undergraduate preparation obtained by the respondents in therapeutic recreation. The average ages as shown are 48, 33, and 37, respectively, for nursing home, community recreation center, and school practitioners. The average practitioner in nursing homes finished undergraduate school 26 years prior to December, 1977; community recreation center respondents, 11 years ago; and school setting practitioners, 15 years ago. At the present time there is no record of colleges or universities in North Carolina (the area of this study's results) offering an undergraduate program in therapeutic recreation. According to the American Alliance of Health, Physical Education and Recreation Guidelines to Professional Preparation in Adapted Physical Education, Therapeutic Recreation and Corrective Physical Education,[1] the University of North Carolina at Chapel Hill is the only in-state institution offering a degree in therapeutic recreation on the master's level. Table 16 further enlightens one of the professional preparation and respondent's levels of affiliation with the National

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[1]American Alliance for Health, Physical Education and Recreation, Professional Preparation in Adapted Physical Education, Therapeutic Recreation and Corrective Therapy (Washington, D.C.: Physical Education and Recreation for the Handicapped Information and Research Utilization Center (IRUC), 1976), pp. 73-78.

Therapeutic Recreation Society. Based on the data shown in the aforementioned tables, it can be said with a fair degree of accuracy that 70 percent or more of the respondents did not receive a formal undergraduate education in therapeutic recreation.

Responses from seven professionals, associated with the Allied Health Profession, concerning the adequacy of the developed modules to attain the bahvioral objectives of the course have been tabulated and presented in Table 19. The mean value for each evaluative criterion is presented. The findings, as reported by the respondents, indicate a total mean value of 2.46 (of a possible 4.00) for the nine modules. This denotes that the total learning package (student manual) met the approval of the respondents as an adequate teacher-made, learning guide for the intended purpose of affording learning experiences for the student in field experience I of therapeutic recreation.

Further computation of the data received from the professional respondents was made to determine the degree of adequacy of each module as a separate guide. On a rating scale of 4 = excellent, 3 = good, 2 = fair, 1 = poor, and 0 = not present or applicable to the study, the total mean values, as shown in Table 20, indicate that each module was given a rating of 3 plus, which is good. The mean for the sum of all mean values is shown to be 3.47. This relates

Table 19

Mean Values of Module Format as Evaluated by Seven Professionals

4 = excellent, 3 = good, 2 = fair, 1 = poor, and 0 = not present	Mean Values
Purpose of the Module (Rationale)	
1. Is the topic of the module clearly stated?	3.69
2. Is the reason for studying the module clearly explained?	3.34
3. Is the language simple and clear?	3.37
4. Are the behavioral objectives educationally significant?	3.45
5. Is each behavioral objective stated in measurable (observable) terms?	3.24
6. Is each behavioral objective limited enough to be attained during a brief learning unit?	3.37
7. Is each behavioral objective relevant to a more general (terminal) course objective?	3.63
Prequisites	
8. If prerequisites are stated, are they logical requirements which should precede the stated terminal objectives of this module?	3.52
9. Can participants logically be expected to have attained prerequisites prior to beginning this module?	3.67
Learning Activities	
10. Are the directions for procedures clearly stated?	3.47

Table 19 (continued)

4 = excellent, 3 = good, 2 = fair, 1 = poor, and 0 = not present	Mean Values
11. Do the learning activities provide alternate procedures for achieving the behavioral objectives?	3.66
12. Are activities appropriate to individual learner readiness and background?	3.42
13. Is there a variety of types and levels of learning materials?	3.44
Post-Assessment	
14. Are the directions clearly stated?	3.39
15. Do the test items call for behaviors identical to the action terms in the behavioral objectives or learning activities?	3.31
16. Has a reasonable standard of mastery been set?	3.56
Remediation	
17. Do the learning activities provide alternate procedures for achieving the instructional objectives after the initial attempt?	3.61
Resource Materials	
18. Do the materials and activities contribute to achievement of the behavioral objectives?	3.33
19. Have materials and activities been provided for the student who learns best by visual means? By oral-aural means? By physical means?	3.50
20. Is there sufficient range of difficulty in the materials and activities listed?	3.40
Mean value for sum of all mean values	3.46

Table 20

Mean Values for Each Module as Rated by Seven Professionals

4 = excellent, 3 = good, 2 = fair, 1 = poor, and 0 = not present	
Module	Mean Value
1. Ethical Standards of the Therapeutic Recreation Profession	3.23
2. Team Approach and the Role of Therapeutic Recreation Within the Team	3.41
3. Biological Growth and Development and the Structure and Function of the Human Body	3.58
4. Symptoms that Characterize Biological and Psychological Dysfunction	3.60
5. Basic Communication: Theories and Their Application to the Communication Process	3.51
6. Different Leadership Approaches and Techniques	3.41
7. Practices in First Aid and Safety Procedures for Selected Orthopedic Disabilities	3.49
8. Activities to Meet the Needs of the Therapeutic Recreation Patient/Clinet	3.48
9. Organizational Factors and Resources Required for a Therapeutic Recreation Program	3.56
Mean value for sum of all mean values	3.47

very closely to the mean value of 3.46 for the module format as itemized in Table 19.

The findings from the results of the twelve students' evaluation of the modules are presented in Table 21. The mean value from the sum of each section of the check list shows similar results to those obtained from the evaluation of the seven professionals. Other than section 2, "behavioral objectives," with a mean value of 2.94, all other sectional mean values were computed in the 3 range of the modular rating scale. It can be concluded that the students viewed the modules as being adequate for the intended purposes. However, the 2.94 rating of the behavioral objectives gives indication for improvement in this section of the modules.

INTRODUCTION TO STUDENT MANUAL

The competency-based contract module approach to teaching recreation leadership described in this study is a developmental effort to improve the preparation of therapeutic recreation leaders through field experiences. The writer has combined the basic elements of the competency-based approach with contract and modular approaches to fashion a unique format of instruction in which class attendance is not required but structured in the modules as learning resources; the time to complete a module is left up to the student, yet a proficiency level is

Table 21

Mean Values of Module Format as Evaluated by Twelve Students

Module Format	Mean Values for All Modules
1. Rational Statement	3.22
2. Behavioral Objectives	2.94
3. Prerequisites	3.05
4. Learning Activities	3.30
5. Post-Assessment	3.44
6. Remediation	3.00
7. Resource Materials	3.07
Mean value for sum of all mean values	3.14

set which indicates an efficient self-pace approach to attaining the contracted level of mastery before the semester ends. Each module has several alternatives whereby the student may attain the module's behavioral objectives; each module provides remedial activities for the student who fails to attain the contracted level of proficiency; each module is a phase of the total educational process in that the summative evaluation takes into account facets of all prescribed modules. A final grade is assigned based on a combined sum of modular contract points and course

summative evaluation. The approach does not portend an alternative to current procedures of instruction; however, it is worthy of consideration. Should this approach prove vulnerable to criticism which results in improvement, so much the better. Should the approach fail to survive both criticism and evaluation over time, at least this attempt to improve the preparation of therapeutic recreation leaders will have been expressed and tried.

A detailed description and rationale for each module are located in the student manual which follows.

Four objective tests were developed for each of the following modules: 1, 2, 3, and 5. These samples may be used as guides for the development of tests for the other modules of the manual.

STUDENT MANUAL

FIELD EXPERIENCE I

COMPETENCY-BASED MODULES IN THERAPEUTIC RECREATION

For

SELECTED ORTHOPEDIC DISABILITIES

RECREATION 281

FIELD EXPERIENCE I IN THERAPEUTIC RECREATION

2 Hours Credit

Classroom:

Human Performance Laboratory

Time:

9:30-10:50 a.m.

Tuesday and Thursday

Instructor:

W. M. Spann

PURPOSE OF MANUAL

This manual was designed to:

1. Provide an overview of the form and contents of the course Therapeutic Recreation for the Handicapped.

2. Clarify the following questions a student may have concerning the course:

   a. What should a student be able to do upon completion of the course?

   b. What will a student have to do in order to perform the learning activities after being provided with instruction?

   c. What knowledge, skills, and understanding are expected of a student to attain successful the behavioral objectives of the course?

   d. What is the rationale for engaging in a module?

   e. What specific learnings should be attained upon completion of a module?

   f. Under what conditions will performance of the learning activities take place?

This manual may be used as a guide to help the student learn and perform according to his personal ability,

available time, needs and interest. Properly used, it will become something like a road map, a tool or device which will help the learner to observe and indicate his progress.

INTRODUCTION

Therapeutic recreation specialists have become fully accepted members of rehabilitation teams and have gained true professional status with other disciplines. It is essential, therefore, for recreation specialists to have a good understanding of themselves and be able to explain to others why recreational activities are offered in conjunction with care and treatment programs.

As part of the introductory phase to therapeutic recreation, a meaningful field experience is an invaluable means of gaining first-hand information about the profession, according to many practitioners and administrators. It also helps to prepare the beginning student to meet adequately the responsibilities he will encounter in advanced courses of the program.

This course has been organized into nine (9) modules with a competency-based approach designed to help each student gain mastery of the subject matter. A student may contract the amount of work he finds necessary to attain the expected level of competency. Based on a point system for each module, a letter grade of A, B, C, D, or F will be assigned upon completion of the course.

Module 1 is designed to expose the student to a variety of learning experiences that will enable him to attain knowledge of the ethical standards of the therapeutic recreation profession and how they are applied in different therapeutic settings.

Module 2 is designed to afford the student a reason for a "team approach" and the role of therapeutic recreation within the team.

Module 3 provides specific learning activities to make the student aware of the importance of normal biological growth and development as well as the structure of the human body as the basis for administering a program of therapeutic recreation.

Module 4 is designed to provide the student with knowledge of basic communication theories and their application to the communication process with specific reference to common medical terms used by members of the rehabilitation team.

Module 5 presents experiences for the student to investigate and gain an understanding of the symptoms that characterize biological and psychological dysfunction, with special reference to symptoms of rheumatoid arthritis, cerebral palsy, lower-extremity amputation, muscular dystrophy and cardiovascular arrest (stroke).

Module 6 provides learning experiences for the student to gain knowledge of various leadership approaches and techniques used in administering therapeutic recreation services.

Module 7 aims to provide experiences that would acquaint the student with basic first aid and safety techniques as related to the safety and care of patients with rheumatoid arthritis, cerebral palsy, lower-extremity amputation, muscular dystrophy and stroke.

Module 8 is designed to afford experiences for the student to understand how special activities are used in meeting the needs of the therapeutic recreation patient/client.

Module 9 contains learning activities that will enhance the competency of the student in understanding organizational factors and resources required for a therapeutic recreation program.

COURSE DESCRIPTION

Recreation 281: Field Experience I in Therapeutic Recreation

During the sophomore year the student observes individuals with selected orthopedic disabilities, leadership techniques, and operation of agencies which serve the orthopedically handicapped. The course is competency based

and requires all students to attain an 85 percent minimum level of proficiency and mastery of the selected modules of the course. The student is expected to assume responsibility for a major portion of his learning experiences by contracting for and completing the necessary learning tasks in each module. Course credit: 2 semester hours.

INSTRUCTIONAL GOALS

Based upon the functions of therapeutic recreation in the process of rehabilitating the handicapped, this course aims to provide:

1. An overview of the therapeutic recreation profession.

2. An understanding of therapeutic recreation agencies, institutions and teamwork among the various disciplines working in different settings.

3. Knowledge of human growth and development as related to administering a program of therapeutic recreation.

4. An understanding of various disabling conditions.

5. Knowledge of basic communication theories as related to therapeutic recreation leadership.

6. Knowledge of various leadership approaches in therapeutic recreation.

7. Knowledge of first aid and safety procedures as related to various therapeutic activity skills.

8. Experiences for the student to understand the utilization of specific activities in meeting the needs of patients and clients.

9. Experiences to enhance comprehension of program planning and development.

BEHAVIORAL OBJECTIVES

An analysis of the goals for this course indicates that the student who successfully completes the modules with an 85 percent level of proficiency or better will be able to:

1. Understand the application of ethical standards of the therapeutic recreation profession.

2. Understand the rationale for a "team approach" and the role of therapeutic recreation within the team.

3. Identify the normal biological growth and development as well as the structure and function of the human body.

4. Understand the symptoms that characterize biological and psychological dysfunction.

5. Identify the basic communication theories and their application to the communication process in administering therapeutic recreation.

6. Recall to memory by writing a specified number of different leadership approaches and techniques used by the therapeutic recreation leader.

7. Identify, at a minimum level of acceptance, basic first aid and safety procedures that are related to therapeutic recreation service.

8. Show evidence of understanding the importance of utilizing specific activities to meet the needs of the therapeutic recreation patient/client.

9. Exemplify an understanding of organizational structures and resources required for program planning and development in therapeutic recreation.

PREREQUISITES

1. Successful completion of not less than three semesters of undergraduate study.

2. Successful completion of or be currently enrolled in the following courses or related competencies of (a) general biology, (b) human anatomy, and (c) human physiology.

3. Student must have a cumulative grade point average of 1.5 or better.

4. Student must have access to personal transportation in order to visit local therapeutic settings and agencies.

SEQUENCE OF INSTRUCTION

Being officially enrolled in the course, the student will:

1. Attend the first three (3) class meetings for orientation.

2. Receive a manual for the course.

3. Receive a schedule for date and time each module is to be completed and submitted to instructor.

4. Select learning activities that will ensure at least an 85 percent level of proficiency upon completion.

5. Sign contract form for each learning activity selected.

6. Submit completed learning activities to instructor for evaluation on or before scheduled date due.

7. Arrange personal conference with instructor to reevaluate completed work or to assign remedial activities for unsuccessful completion of a module.

EVALUATION

1. The student will be expected to perform at or above the level of minimum proficiency as stated for each module.

2. The student level of attainment will be assessed by a posttest for each module, mastery of the behavioral objectives by attaining at least a minimum level of proficiency on the learning activities, or a combination of both procedures.

3. The student will be administered a one hundred-(100) item objective test as a final examination in assessing the level of competency for the course.

4. The student will receive a letter grade of A, B, C, D or F compared to the number of contract points accrued from successful completion of moudlar learning activities and the final examination (see evaluation chart for outline of point system and grades).

COMPONENT: Recreation 281: Field Experience I in Therapeutic Recreation

MODULE 1: Ethical Standards of the Therapeutic Recreation Profession

RATIONALE:

The ethics or moral principles as related to therapeutic recreation encompass a multitude of factors. Professional ethics involve every aspect of recreation leadership from the respect for one's colleagues to the discussion of individual client's/patient's problems with non-professionals. A knowledge of professional ethics for therapeutic recreation leaders is tantamount to a code of conduct and should seriously be considered. The therapeutic recreationist must learn that among other things he should conduct himself in a manner that he himself would prefer to be treated. Hence, the purpose of this module is to acquaint the therapeutic recreation student with the ethical standards of the therapeutic recreation profession.

BEHAVIORAL OBJECTIVES:

Upon completion of the activities contained in this module the student will be able to:

1. Give a written definition of the term "ethics" as related to therapeutic recreation.

2. List a minimum of fifteen (15) ethical practices therapeutic recreation leaders should observe in their relationships with clients/patients and colleagues.

3. Describe three (3) cases of ethical or unethical practices observed during one week of field experience at a nursing home, community center, or school. Write a brief description of each case and tell why you consider each situation to be ethical or unethical. Submit to instructor as scheduled.

PREREQUISITE:

The student must be enrolled in Recreation 281 and have access to personal transportation to make off-campus visitations.

STUDENT'S OPTIONS:

The student may select any of the following activities that will help him to attain the behavioral objectives of this module and accrue the necessary points to satisfy the post-assessment proficiency level.

In the event the level of attainment and proficiency is not met during the student's initial efforts, provisions have been made for remedial activities to make up any deficits (see remediation of this module for instructions).

LEARNING ACTIVITIES:

Contract Values:

5 points: 1. The student will attend class on the date "Orientation to Therapeutic Recreation" is scheduled. After participating in the discussion and other class activities, he will summarize the lecture and discussion by listing five (5) main concepts of ethics in therapeutic recreation. Submit to instructor as scheduled.

5 points: 2. The student will listen to lecture tape on "Effective Therapeutic Recreation Leadership." Upon completion, list a minimum of ten (10) traits of an effective therapeutic recreation leader as discussed on the tape.

Resource material: #13

Location: University library audio-visual room.

10 points: 3. The student will complete the attached check list on ethical therapeutic recreationist activities according to directions given. Evaluate the practitioner as being a desirable or undesirable person

with whom to work. Discuss reasons for your decision.

Resource materials: 1:36-40; #2; 3:197-208; 4:158-160; 5:171-173

Location: University library (R)

5 points: 4. The student will view the film "Cast no Shadows" and list ten (10) values of recreation for the physically handicapped.

Resource material: #10

Location: University library A-V room

5 points: 5. The student will view the transparencies "Leadership" and list ten (10) aspects of effective leadership. Submit to instructor as scheduled.

Resource materials: #6, 11

Location: University library (Reserved)

5 points: 6. The student will view video-tape "Concepts of Therapeutic Recreation." In preparation for the panel discussion, what seems to be the direction therapeutic recreation is headed? Give a brief discussion and submit to instructor as scheduled.

Resource material: #12

Location: University library A-V room

5 points: 7. The student will read "A Philosophy of Recreation" in the hospital setting and list the ten (10) main points discussed.
Resource material: #8
Location: University library (R)

10 points: 8. The student will read "Professional Ethics" by G. S. Insley. In the case of Mr. Dodge, evaluate his professional attitude. Do you think he was justified in his actions? If so, why? If not, why? Submit to instructor as scheduled.
Resource material: 4:158-171
Location: University library (R)

5 points: 9. The student will read "The Meaning of Therapeutic Recreation" and write a summary of the articles consisting of not more than one typewritten page and submit to instructor as scheduled.
Resource material: #7
Location: University library (R)

5 points: 10. The student will read "Ethical Issues and Dilemmas" and list five (5) ethical aspects of a satisfying personal life style based on the issues of this article. Submit to instructor as scheduled.

POST-ASSESSMENT:

Successful completion of the activities of the module with a minimum of 85 percent accuracy or 51 of the total (60) number of points for this module will be a partial fulfillment of the requirements. The student must also pass the comprehensive test for the module with a minimum of 75 percent accuracy. A thirty-five- (35) item objective test will be administered before the next module is contracted.

REMEDIATION:

In the event the levels of attainment and proficiency are not met during the student's initial attempt, he will engage in such remediation activities as deemed necessary after consulting with the instructor during a personal conference.

RESOURCE MATERIALS

Books:

1. Brightbill, Charles and Meyer, Harold D. Community Recreation: A Guide to Its Organization. 2d ed. Englewood Cliffs: Prentice-Hall, Inc., 1964. P. 36.

2. Deininger, Whit. Ethical Issues and Dilemmas. San Jose, California: Lansford Publishing Company, 1973.

3. Frye, V., and Peters, M. Therapeutic Recreation: Its Theory, Philosophy and Practice. Philadelphia: Stackpole Books, 1972. Pp. 197-208.

4. Insley, Gerald S. Practical Guideline for the Teaching of Physical Education. California: Addison-Wesley Publishing Company, 1973. P. 158.

5. Zeigler, Earle F. Administration of Physical Education and Athletics, The Case Approach. Englewood Cliffs: 1959. P. 171.

Periodicals and Publications:

6. American Association for Leisure and Recreation. What Recreation Research Says to the Recreation Practitioner. UPDATE (April, 1975).

7. Martin, Alexander. "A Philosophy of Recreation, in Hospital Setting," Bulletin No. 30, Raleigh, N.C., The North Carolina Commission, 1962. Pp. 5, 6, 7, 8, 10, 14.

9. Torres, Eloisa M. "Children Who are Different Need Teachers Who are Different," Educational Leadership, 31 (April, 1974):611-612.

Film:

10. "Cast no Shadow," The Recreation Center for the Handicapped, Inc., Professional Arts, Inc., University of Illinois, Champaign, Illinois, 1974. Color: 27 minutes.

Transparencies:

11. "Leadership," San Jose, California: Lansford Publishing Company, 1974. (10 transparencies)

Video Tape:

12. Berryman, D. et al. "Concepts of Therapeutic Recreation," Panel Discussion. Time: 40 minutes.

Audio Cassette:

13. "Effective Therapeutic Recreation Leadership." 45 minutes.

A CHECK LIST FOR ETHICAL THERAPEUTIC RECREATIONIST ACTIVITIES

Directions: After having visited a nursing home, community center or school and having observed the recreation therapist for a minimum of twelve (12) hours, use the following check list to determine his compliance with ethical standards of the therapeutic recreation profession.

Ethical Standards	Check one column for each standard			
The Recreation Therapist:	4 Always	3 Usually	2 Occasionally	1 Never
1. Sees each patient/client as an individual				
2. Shows patience with pateint/ client				
3. Shows a genuine desire to help others				
4. Realizes his professional and personal limitations				
5. Is able to handle sensitive situations when they arise				
6. Is able to express himself (give direction, express sentiments, discuss situation with colleagues)				
7. Is able to establish good relationships with others				
8. Is able to work within the administrative organization				
9. Exemplifies understanding of where his job ends and others begin				
10. Is conscientious, imaginative, friendly, concerned and firm				
11. Exemplifies a good sense of humor				

FINAL EXAMINATION

Module 1

Module 1

Test

Title: Ethical Standards of the Therapeutic Recreation Profession

Part I: Corrected True-False Items

Directions: If the statement is true, encircle the "T"; if false, encircle the "F" and correct the statement by drawing a line through the incorrect word(s) and write the appropriate ones above the ones crossed out. Do not change the underlined words.

Values: True statements = 2 points
False statements corrected = 3 points

T F 1. Ethics attempt to answer the question: What is the highest standard of behavior each person should strive to attain?

T F 2. Therapeutic recreation leaders can accept responsibility for treatment if prescribed by the head nurse.

T F 3. The therapeutic recreation leader is obligated to the "rehabilitation team" first, and then to the patient/client.

T F 4. A member of the therapeutic recreation profession should hold any information coming to his attention regarding a patient/client and consider it "privileged communication."

T F 5. The therapeutic recreation leader should treat equally all personnel, including custodian and clerical help.

T F 6. The therapeutic recreation leader should give excuses for his shortcomings and make every effort to improve himself.

T F 7. When professional "know how" fails the therapeutic recreator should resort to flattery and politics.

T F 8. The therapeutic recreator should become an active member of the American Corrective Therapy Association (ACTA) before joining any other professional organization.

T F 9. Professionalism is synonymous with "blind allegiance."

T F 10. The therapeutic recreator should be loyal to his superiors even if they are wrong.

Part II: Multiple Choice Items:

Direction: Write at the left the letter indicating the one best answer.

____ 11. It is important that recreation leaders possess which of the following qualities:

A. Dependability
B. Resourcefulness
C. A personality conducive for interaction with other leaders, patients/clients
D. Sound judgment
E. All of the above

____ 12. One of the major problems in regard to personnel in therapeutic recreation has been the:

A. Quality of preparation
B. Limited number of preparing institutions
C. Lack of enthusiasm
D. Constant curriculum revisions
E. All of the above

____ 13. Of the following, which is a specific qualification for therapeutic recreators:

A. Aptitude in the foundational sciences
B. Satisfactory health
C. A degree from an approved college or university that prepares therapeutic recreators
D. Ability to communicate properly
E. All of the above

____ 14. All of the following are qualities that a therapeutic recreator should possess with the exception of:

A. Sense of humor
B. Autocratic methodology
C. Counseling ability
D. Professional ethics
E. Enjoyment in working with people

____ 15. In order for the beginning therapeutic recreator to be effective, he must:

A. Demonstrate the skills himself
B. Spend a great deal of time implementing games and exercises
C. Be able to recognize his own shortcomings in therapeutic recreation and try to correct them
D. Utilize traditional approaches of administering exercises
E. All of the above

____ 16. The therapeutic recreator should show interest in the profession by:

A. Joining professional organizations
B. Attending professional conventions
C. Being familiar with the literature and recent developments in the field
D. A and B
E. All of the above

____ 17. All of the following are leadership competencies that a recreation leader should strive to develop with the exception of:

A. Enthusiasm
B. Understanding the problems involved in therapeutic recreation leadership
C. Realization that his responsibility does not extend beyond the confines of the therapeutic setting
D. Patience
E. A genuine interest in the handicapped

____ 18. The therapeutic recreator's first responsibility is to the:

A. Department
B. Patient/client
C. Profession
D. Agency (nursing home, recreation department, school)
E. Community

____ 19. Therapeutic recreators must have:

A. A sound philosophy of therapeutic recreation
B. An excellent background in both general and therapeutic recreation
C. An interest in being professionally active
D. A and C
E. All of the above

____ 20. The trend in therapeutic recreation today is toward:

A. Interdisciplinary team approaches
B. Work in exercise physiology
C. Relation of recreation to psychological development
D. Relation of therapeutic recreation to sociological development
E. All of the above

Part III: Completion

Directon: Fill in the blank with the correct word(s).

21. The therapeutic recreator should see each patient as an _____.

22. The therapeutic recreator should be able to _____ himself and give direction and discuss situation with colleagues.

23. The therapeutic recreator should realize his _____ and _____ limitations.

24. The therapeutic recreator is able to handle _____ situations as they arise.

25. The therapeutic recreator should exemplify a good _____ of _____.

26. The therapeutic recreator is conscientious, imaginative, friendly, concerned and _____.

27. The therapeutic recreator is able to work within the _____ _____.

28. The therapeutic recreator is able to establish_____ _____ with othrs.

29. The therapeutic recreator understands where his job _____ and others' _____.

30. The therapeutic recreator shows a genuine desire to _____ _____.

Part IV: Definitions:

Direction: Identify each of the following abbreviations by writing out the full title of each.

31. NPRA

32. ACTA

33. NTRA

34. AAHPER

35. IRUC

COMPONENT: Recreation 281: Field Experience I in Therapeutic Recreation

MODULE 2: Team Approach and the Role of Therapeutic Recreation within the Team

RATIONALE:

The roles and functions of therapeutic recreation specialists are extremely complex and varied. They may have goals and methods that vary widely, according to the setting in which they are employed and the patients/clients they are serving. Since the late 1950's the functional role of the therapeutic recreation specialist has become more clearly defined. In order to meet the total needs of the disabled many specialists, or disciplines, have combined their services and function as a team. This team functions within an agency where care is given to either acutely or chronically ill persons. The recreation therapist has become an important member of most institutions' rehabilitation team. It is, therefore, the purpose of this module to acquaint the prospective therapeutic recreation student with an understanding and knowledge of the "team approach" and the role of therapeutic recreation within the team.

BEHAVIORAL OBJECTIVES:

Upon completion of the activities contained in this module the student will be able to:

1. Describe in writing the "team approach" in the rehabilitation of disabled persons.

2. Explain in writing the role of therapeutic recreation within the rehabilitation team.

3. Identify the members of a rehabilitation team and write a brief description of each functional role within the team.

4. Construct a list of five (5) official and five (5) non-official agencies that assist institutions in the rehabilitation process.

PREREQUISITE:

The student must be enrolled in Recreation 281 and have access to personal transportation to make off-campus visitations.

STUDENT'S OPTIONS:

The student may select any of the following activities that will help him to attain the behavioral objectives of this module and accrue the necessary points to satisfy the post-assessment proficiency level.

In the event the level of attainment and proficiency is not met during the student's initial efforts, provisions have been made for remedial activities to make up any deficits (see remediation of this module for instructions).

LEARNING ACTIVITIES:

Contract Values:

10 points: 1. The student will attend class on the day the lecture "The Rationale for a 'Team Approach' and the Role of Therapeutic Recreation within the Team" is scheduled. In view of the major concepts expressed by the lecturer, the student will write a paper, not to exceed two typewritten pages, reflecting the lecturer's viewpoints and his personal analysis of the subject. Resource materials: 1:119-121; 3:132-133; 4:39-44; 5:1240-1273; 15:5-7; 14:176.

10 points: 2. The student will outline a list of fifteen (15) functions that a recreation therapist could be asked to do after conferring with the physician of the rehabilitation team concerning an arthritic patient in a nursing home. Submit to instructor as scheduled. Resource materials: 4:39-44; 8:115-117; 13:106-108; 10:187-189.

10 points: 3. The student will discuss in writing, not to exceed two (2) typewritten pages, the ways in which the therapeutic recreation specialist could assist the psychiatrist in

the rehabilitation of a below-the-knee amputee. Submit as scheduled.

Resource materials: 1:119-121; 4:39-44; 7:114-118; 8:117; 14:176.

Location: University library (R)

5 points: 4. The student will write a brief description, not to exceed two typewritten pages, of the functions and role of each of the following members of the rehabilitation team:

(a) Physician

(b) Nurse

(c) Social worker

(d) Psychologist

(e) Vocational counselor

(f) Occupational therapist

(g) Physical therapist

(h) Corrective therapist

(i) Speech therapist

(j) Educational therapist

Submit to instructor as scheduled.

Resource materials: 1:119-121; 4:39-44; 7:114-118; 11:198-202; 2:51-52

Location: University library (R)

10 points: 5. The student will discuss in two (2) typewritten pages or less the therapeutic

recreationist interpreting his program to the community and particularly to the medical and professional personnel in allied disciplines. Submit to instructor as scheduled.

Resource materials: 4:39-44; 10:178-188

Location: University library (R)

10 points: 6. The student will explain, in not more than two (2) typewritten pages the rationale for having a non-public agency assume major functions in a rehabilitation institution. What are the advantages and weaknesses of such an administrative approach? Submit to instructor as scheduled.

Resource material: 4:39-44

Location: University library (R)

15 points: 7. The student will read Chapter 1, "Therapeutic Recreation Service, Past and Present" by Richard Kraus, and answer questions #2 and #3 at the end of the chapter. Submit.

Resource material: 7:114-118

15 points: 8. The student will read Chapter 2, "The Rationale for Therapeutic Recreation

Service" by Richard Kraus, and answer questions #1, #2, and #3 at the end of the chapter.

Resource materials: 1:119-121; 3:119-121; 7:114-118; 8:22-41

Location: University library (R)

10 points: 9. The student will visit a nursing home and, after having observed and discussed a patient's medical record with a member of the rehabilitation team, will explain in writing the significance of the following elements to the efficiency of the therapeutic recreation leader's performing as a member of the rehabilitation team:

(a) Basic data

(b) Titled and numbered initial plan

(c) Titled and numbered progress notes, doctor's orders, and problem list

Submit to instructor as scheduled.

Resource materials: 1:119-121; 3:132-133; 7:114-118

Location: University library (R)

10 points: 10. The student will write a brief report indicating the necessity of having a physician's written permission for a person

with the following conditions to participate in any type of active exercise:

(a) Stroke patients

(b) Muscular dystrophy

(c) Lower-limb amputation

(d) Arthritis

(e) Cerebral palsy

Submit to instructor as scheduled.

Resource materials: 3:132-133; 8:115-123; 15:539-546, 558-560, 649-668, 133-135

Location: University library (R)

10 points: 11. The student will view in class the video tape "The Team Approach and the Therapeutic Recreation Specialist" and complete form "A" (evaluation of film).

Resource materials: 15:5-7; #16

Location: University library (R)

10 points: 12. The student will view the video tape "The Interdisciplinary Approach and the Treatment Process" and complete form "A" (film evaluation form). Submit to instructor as scheduled.

Note: Video tape can be viewed in audio-visual room of the library during open hours.

Resource material: 15:5-7

Location: University library (R)

POST-ASSESSMENT:

Successful completion of the activities of this module with a minimum of 85 percent accuracy or 97 of the total (115) number of points for this module will be a partial fulfillment of the requirements. The student must also pass the comprehensive test for the module with a minimum of 75 percent accuracy. A thirty-five-item objective test will be administered before the next module is contracted.

REMEDIATION:

In the event the levels of attainment and proficiency are not met during the student's initial attempt, he will engage in such remedial activities as deemed necessary after consulting with the instructor during a personal conference.

RESOURCE MATERIALS

Books:

1. Adams, Ronald C. et al. Games, Sports and Exercises for the Physically Handicapped. 2d ed. Philadelphia: Lea and Febiger, 1975.

2. American College of Sports Medicine. Guidelines for Graded Exercise Testing and Exercise Prescription. Philadelphia: Lea and Febiger, 1975.

3. Avedon, Elliott M. Therapeutic Recreation Service: An Applied Behavioral Science Approach. Englewood Cliffs: Prentice-Hall, Inc., 1974.

4. Bachner, John P., and Cornelius, Elizabeth S. Activities Coordinator's Guide: A Handbook for Activities Coordinator in Long-Term Care Facilities. Washington, D.C.: Department of Health, Education, and Welfare, Health Resources Administration, 1975.

5. Beland, I. L. Clinical Nursing, Pathophysiological and Psychosocial Approaches. New York: The Macmillan Company, 1966.

6. Davis, John E. Clinical Applications of Recreational Therapy. Springfield, Illinois: Charles C. Thomas, Publisher, 1972.

7. Frye, Virginia, and Peters, Martha. Therapeutic Recreation: Its Theory, Philosophy and Practice. Harrisburg, Pa.: The Stackpole Company, 1972.

8. Kraus, Richard. Therapeutic Recreation Service: Principles and Practices. Philadelphia: W. B. Saunders Company, 1973.

9. _____. Recreation Today: Program Planning and Leadership. New York: Appleton-Century-Crofts, 1966.

10. O'Morrow, Gerald S. Therapeutic Recreation: A Helping Profession. Reston, Virginia: Prentice-Hall Company, 1976.

11. Shrivers, Jay S., and Fait, Hollis F. Therapeutic and Adapted Recreational Services. Philadelphia: Lea and Febiger, 1975.

12. Tillman, Albert. The Program Book for Recreation Professionals. Los Angeles: National Press Books, 1973.

Articles:

13. Littlefield, Steven R. "So You're a Recreation Therapist," Therapeutic Recreation Journal, 9, No. 3 (Third Quarter, 1975):106-108.

14. Lowman, Charles. "Corrective Physical Education in Relation to Orthopedics," The Physical Educator, 33 (December, 1976):176.

15. Krusen, Frank H. et al. Handbook of Physical Medicine and Rehabilitation. Philadelphia: W. B. Saunders Company, 1971.

Form:

16. Film Evaluation Form

FINAL EXAMINATION

Module 2

Module 2

Test

Title: Team Approach and the Role of Therapeutic Recreation Within the Team

Part I: Completion

Direction: Complete the following statements by filling in the correct term(s).

All items are valued at 2 points each.

1. The basic purpose of each specialist on the clinical team is _____ of the patient/client.

2. List the members of the multidisciplinary team

   a. _____

   b. _____

   c. _____

   d. _____

   e. _____

   f. _____

   g. _____

   h. _____

   i. _____

   j. _____

3. Which member of the multidisciplinary team is qualified to make a diagnosis? _____

4. Which member of the multidisciplinary team is qualified to make a prognosis? _____

5. In medical settings where a therapeutic recreator is not employed, what other allied therapist may be found directing a therapeutic recreation? _____

6. The recreation therapist should have competence in the use of the following modalities: _____, _____, _____, and _____.

7. Leisure-time activities are but one facet of recreation for the handicapped person. Of greater importance is the tangible physical improvement in his abilities provided by _____, _____, and selected activities.

8. It is the responsibility of the _____ to make therapeutic services available, as well as attractive, to the medical staff.

9. The public acceptance of the therapeutic recreation program is based upon what condition of the treated person? _____

10. What aspects of a patient's medical chart are of particular interest to the therapeutic recreator? _____, _____, and _____.

11. List three functions of the therapeutic recreator as a member of the multidisciplinary team in providing special services for the following orthopedic disabilities.

    a. CVA

    b. C.P.

    c. M.D.

    d. AK

    e. Arthritis

COMPONENT: Recreation 281: Field Experience I in Therapeutic Recreation

MODULE 3: Biological Growth and Development and the Structure and Function of the Human Body

RATIONALE:

The therapeutic recreation specialist is interested in rendering high quality service to special population members, no matter what their problems or disabilities may be. To utilize the therapeutic recreation process and to develop goal-directed recreative experiences, the specialist must have knowledge of theories from the biological, emotional, and social and behavioral sciences. He must have a strong grasp of the physical structure of the human body to understand its best utilization in recreational activities. The human being represents a unified whole, each part being necessary to the successful functioning of every other part. It is, therefore, the purpose of this module to acquaint the student with a basic understanding of normal biological growth and development as well as the structure of the human body.

BEHAVIORAL OBJECTIVES:

Upon completion of the activities contained in this module the student will be able to:

1. Describe the structure of the systems of the human body.

2. Identify the role of the various systems (skeletal, muscular, circulatory, respiratory, nervous, digestive, excretory, and endocrine) as they are specifically related to movement.

3. Identify and utilize the particular patterns of physical growth and development in determining appropriate and competitive and cooperative movement experiences at different age and skill levels.

4. Explain why it is necessary for the therapeutic recreation specialist to be knowledgeable of and have the ability to interpret therapeutic recreation from a biological point of view.

PREREQUISITE:

The student must be enrolled in Recreation 281 and must have successfully passed Biology 211: Introduction to General Biology.

STUDENT'S OPTIONS:

The student may select any of the following activities that will help him to attain the behavioral objectives of this module and accrue the necessary points to satisfy the post-assessment proficiency level.

In the event the level of attainment and proficiency is not met during the student's initial efforts, provisions

have been made for remedial activities to make up any deficits (see remediation of this module for specific instructions).

LEARNING ACTIVITIES:

Contract Values:

10 points: 1. The student will attend class as scheduled for this module; after listening to the lecture and participating in class discussion, he will write a one (1) type-written page analysis of the concepts discussed concerning normal growth and development. Submit to instructor as scheduled.

Resource materials: 2:217-243; 6:215-241; 8:36-60; 9:20-26; 10:43-74; 11:Chapters 1, 2, and 3.

Location: University library (R)

10 points: 2. The student will read Chapter 12, "Influence of Activity on Growth," in Edington's and Edgerton's book, The Biology of Physical Activity. Upon completion the student will answer the following questions and submit to instructor as scheduled:

(a) What is growth, hyperplasia, and hypertrophy? Explain each.

(b) How does exercise influence normal growth of bones?

(c) What injuries can be harmful to growth?

(d) How do muscle stretch and exercise induce muscle hypertrophy?

(e) How does exercise affect tendons and ligaments?

Resource materials: 6:215-241; 4:39-74; 5:35-39; 7:64-194

Location: University library (R)

10 points: 3. The student will view the slides on anatomy of the skeletal, muscular, and nervous systems in the human body and complete the following activities:

(a) List the functions of the skeletal system.

(b) Describe the development of bones and discuss the differences between vertical growth and maturation.

(c) Describe the role of calcium in the skeletal system.

(d) List the various classes of bones and give three (3) examples of each.

(e) Describe the characteristics of each of the three different types of muscular tissue (skeletal, smooth, and cardiac).

(f) Discuss the anatomic basis for naming muscles.

(g) Label the muscles indicated in chart #4 (hand-out #6).

(h) Name the twelve (12) cranial nerves. Which are sensory, which are motor, and which are mixed?

(i) Give a brief description of the autonomic nervous system.

(j) Name the three (3) types of neurons according to structure and the three (3) types according to function.

Resource materials: A-V #13; #7; 12:241-293

Location: University library (R) and audio-visual aid room

10 points: 4. The student will read "Muscular Activity Stimulates Growth and Development" by Davis, Logan, and McKinney; upon completion he will write a paper, not to exceed two (2) typewritten pages, explaining why it is necessary for the therapeutic recreation specialist to be able to interpret therapeutic recreation from the biological point of view. Submit to instructor as scheduled.

Resource materials: 5:35-39; 6:215-241; 9:20-26; 10:43-74; 12:241-293, 483-498.

Location: University library (R)

10 points: 5. The student will read Chapter 16, "Growth and Development," in Updyke's book, Principles of Modern PhysicalEducation, Health and Recreation, and

(a) Identify the various patterns of physical growth.

(b) For each pattern of growth, list three (3) appropriate competitive and three (3) cooperative movement experiences for boys and girls at different age and skill levels.

Resource materials: 12:241-293, 483-498; 6:215-241; 3:75-102; 2:217-243

POST-ASSESSMENT:

Successful completion of the activities of this module with a minimum of 85 percent accuracy or 42 of the total (50) number of points for this module will be a partial fulfillment of the requirements. The student must also pass the comprehensive test for the module with a minimum of 75 percent accuracy. A fifty- (50) item objective test will be administered before the next module is contracted.

REMEDIATION:

In the event the levels of attainment and proficiency are not met during the student's initial attempt, he will engage in such remedial activities as deemed necessary after consulting with the instructor during a personal conference.

RESOURCE MATERIALS

Books:

1. Brown, Camille, and Cassidy, Rosalind. Theory in Physical Education: A Guide to Program Change. Philadelphia: Lea and Febiger, 1963.

2. Bucher, Charles A. Foundations of Physical Education. 7th ed. Saint Louis: The C. V. Mosby Company, 1975.

3. Bookwalter, Karl W., and VanderZwaag, Harold J. Foundations and Principles of Physical Education. Philadelphia: W. B. Saunders Company, 1969.

4. Clayton, Robert D. Essentials of Physiology of Muscular Exercise. Minneapolis: Burgess Publishing Company, 1968.

5. Davis, Elwood C. et al. Biophysical Values of Muscular Activity. 2d ed. Dubuque: Wm. C. Brown Company, 1965.

6. Edington, D. W., and Edgerton, V. R. The Biology of Physical Activity. Boston: Houghton Mifflin Company, 1976.

7. Jacob, Stanley W., and Francone, C. A. Structure and Function in Man. Philadelphia: W. B. Saunders Company, 1970.

8. Kelly, Ellen D. Adapted and Corrective Physical Education. 4th ed. New York: The Ronald Press Company, 1965.

9. Schurr, Evelyn. Movement Experience for Children: Curriculum and Methods for Elementary School Physical Education. New York: Appleton-Century-Crofts, 1967.

10. Sears, Robert R., and Feldman, Shirley S. The Seven Ages of Man. Los Altos, California: William Kaufmann, Inc., 1973.

11. Tanner, J. M. Growth at Adolescence. Oxford: Blackwell Scientific Publications, 1962.

12. Updyke, Wynn F., and Johnson, Perry B. Principles of Modern Physical Education, Health and Recreation. New York: Holt, Rinehart and Winston, Inc., 1970.

Audio-visual Aids:

13. Slides: "Anatomy of the Human Body."

FINAL EXAMINATION

Module 3

Module 3

Test

Title: Biological Growth and Development and the Structure of the Human Body

Part I: Multiple Choice Items

Direction: Write at the left the letter indicating the one best answer.

____ 1. Which of the following structures is not a part of the skeletal system?

A. Humerus
B. Esophagus
C. Ulnar
D. Calcaneus
E. Sternum

____ 2. The growth of long bones takes place

A. at the suture line
B. at the epiphyseal line
C. only at the ends next to the articular cartilage
D. by deposition of bone in the medullary cavity

____ 3. The functions of the skeletal system include all of the following except

A. Support of the body
B. Protection of delicate structures
C. Movement
D. Hemopoiesis
F. All of the preceding

____ 4. Which of the following is not a property of skeletal muscles?

A. Irritibility
B. Elasticity
C. Contractility
D. Conductivity
E. Productivity

____ 5. All of the following structures are parts of the circulatory system except the

A. Heart
B. Lungs
C. Capillaries
D. Liver
E. Veins

____ 6. The respiratory system consists of

A. The nose
B. The trachea
C. The lungs
D. All of the preceding
E. None of the preceding

____ 7. Which of the following is not a function of the urinary system?

A. Supply blood to the bladder
B. Helps to regulate body sugar
C. Helps to eliminate toxins from the body
D. Reabsorption of water
E. All of the preceding
F. None of the preceding

____ 8. All of the following are parts of the endocrine system except the

A. Thyroid gland
B. Ovaries
C. Testes
D. Pancreas
E. Liver

____ 9. When a muscle is not used, it

A. Hypertrophies
B. Atrophies
C. Increases in size
D. Both A and C
E. Both B and C

____ 10. Most normal children have developed their perceptual mechanism to a rather refined degree by the age of

A. Three
B. Five
C. Seven
D. Nine
E. Fifteen

____ 11. Recent health statistics show that young people of today are

A. Taller than their parents
B. Shorter than their parents
C. Approximately the same size as their parents
D. Both taller and heavier than their parents
E. None of the above

____ 12. Physical fitness

A. Is affected by mental factors
B. Implies soundness of the body's organs
C. Is concerned only with muscular strength
D. A and B
E. All of the above

____ 13. The "law of use" is best described as:

A. That which is used develops, and that which does not atrophies
B. The state of contraction of a muscle group
C. The intake of oxygen into the respiratory system
D. The development of quick reflexes in the lower back
E. None of the above

____ 14. Research shows that the pulse rate of a trained individual

A. Is higher than that of the untrained individual
B. Is lower than that of the untrained individual
C. Returns to normal more quickly after exercise than the rate of the untrained individual
D. B and C
E. A and C

____ 15. Which of the following represents a component of physical fitness?

A. Balance
B. Cardiovascular-respiratory endurance
C. Coordination
D. Muscular power
E. All of the above

____ 16. The effect of training on the muscular system results in:

A. A reduction in the number of capillaries
B. The thinning of the connective tissue
C. Smaller muscle fibers
D. A gain of endurance
E. None of the above

____ 17. Jogging is

A. A combination of walking and running
B. A sustained type of exercise that is noncompetitive
C. Not recommended for anyone over the age of 50
D. A and B
E. All of the above

____ 18. The rate of wear and tear caused by life can be best described by the term

A. Metabolism
B. Stress
C. Endurance
D. Agility
E. None of the above

____ 19. Training for a particular sport:

A. Should be specifically geared to that sport
B. Need only utilize general training techniques
C. Should be no different than training for any other sport
D. None of the above
E. All of the above

____ 20. Compared to the untrained person, the trained individual:

A. Breathes faster
B. Absorbs oxygen from air in greater amounts
C. Has shallow diaphragmatic breathing
D. Takes in larger amounts of air
E. None of the above

Part II: Corrected True-False Items

Directions: If the statement is true, encircle the "T"; if false, encircle the "F" and correct the statement by drawing a line through the incorrect word(s) and writing the right ones above the one(s) crossed out. Do not change the underlined word(s).
Values: True statements = 2 points
False statements corrected = 3 points.

T F 21. Skeletal muscle aids in seeing, hearing and speaking.

T F 22. Muscles can contract in the absence of oxygen

T F 23. Homeostasis refers to an inflammatory condition in man.

T F 24. Veins carry blood to the heart.

T F 25. The master endocrine gland is known as the superrenal.

Part III: Master List

Direction: Below are eight of the nine systems of the human body; identify each of the test items that follow this list as being a function or part of one of the listed systems by placing the letter of the system on the line beside the correct function or structure. A letter may be used more than once.

A. Skeletal

B. Muscular

C. Nervous

D. Circulatory

E. Respiratory

F. Digestive

G. Urinary

H. Endocrine

____ 26. Wolf's Law reflects its growth pattern

____ 27. The key word to this system is movement and contraction

____ 28. Twelve pairs

____ 29. Cerebellum

____ 30. Embolus

____ 31. Metabolism

____ 32. Ureters

____ 33. Glands control the rate and type of growth of the organism.

Part IV. Matching Items

Directions: Match the terms on the left with the statements on the right that best identify the physical growth pattern or physical deviation of an individual. Place the letter beside the correct item on the left.

A. Motivation

B. Handicapped

C. Scioliosis

____ 34. Round shoulders, body imbalanced

____ 35. An atypical child

____ 36. The key to all learning

D. Lordosis	____ 37.	Curvature of the spine, the most serious postural defect
E. Kyphosis	____ 38.	Perceiving the body in space, knowing the difference between up-down, big-little, left-right
F. Directionality		

Part V. Completion

Direction: Fill in the blank in the right column with the correct response for each encircled number in the statement in the left column.

A. The mechanical functions performed by the skeletal system are: (39) (40)(41)	39.	_____
	40.	_____
B. The skeletal system consists of five types of bones according to shape; they are: (42)(43)(44)(45) (46)	41.	_____
	42.	_____
	43.	_____
C. A better name for skeletal muscle would be (47)	44.	_____
D. The three types of neurons according to structure are: (48) (49)(50)	45.	_____
	46.	_____
	47.	_____
	48.	_____
	49.	_____
	50.	_____

COMPONENT: Recreation 281: Field Experience I in Therapeutic Recreation

MODULE 4: Symptoms that Characterize Biological and Phychological Dysfunction

RATIONALE:

The therapeutic recreation specialist serves as an integral member of the multidisciplinary team in institutions for rehabilitation of the sick and disabled. In order to contribute to the total effort of rehabilitating patients, the therapeutic recreation specialist must be able to recognize normal and abnormal symptoms patients/clients manifest during his involvement with them. Such information can mean the difference between recovery or death of a patient, as well as success or failure in an individual or team approach to restore the patient to a normal state of health. Accurate information coming from the therapeutic recreation leader can lead to early treatment and prevent permanent disability.

It is, therefore, important that the therapeutic recreation leader understands the symptoms that characterize biological and psychological malfunctions of the human body. It is the purpose of this module to provide theoretical and practical experiences for the student to understand the symptoms that are related to the following selected

orthopedic dysfunctions: arthritis, cerebral palsy, lower-extremity amputation, muscular dystrophy, and stroke.

BEHAVIORAL OBJECTIVES:

Upon completion of activities contained in this module the student will be able to:

1. Construct a list of common symptoms that indicate body dysfunctions and give a brief explanation of each.

2. List the physical and behavioral patterns of an adult with rheumatoid arthritis.

3. List the physical and behavioral patterns of a child with cerebral palsy.

4. Identify those symptoms that necessitate lower-extremity amputations and give an example of each.

5. List those physical and psychological symptoms that characterize muscular dystrophy.

6. Describe the physical and psychological symptoms associated with stroke patients.

LEARNING OPTIONS:

The student may select any of the following activities that will help him to attain the behavioral objectives of this module and accrue the necessary contract points for post-assessment.

In addition, the student is required to take a comprehensive posttest upon completion of this module. A minimum of 75 percent accuracy is required for passing.

In the event the level of attainment and proficiency is not met during the student's initial efforts, provisions are made for remedial activities to make up any deficits (see remediation of this module for instructions).

LEARNING ACTIVITIES:

Contract Values:

10 points: 1. The student will read "Medical Self Help Training Manual No. 9" and describe the common symptoms of biological dysfunctions in the human body. Submit to instructor as scheduled.

Resource material: "Medical Self Help Training Manual No. 9"

Location: University learning resource center (U-LRC)

10 points: 2. The student will identify the physical symptoms of rheumatoid arthritis by listing each. Physical deformities must be accompanied by drawings.

Resource materials: 1:78-80; 2:44-67; 6:67-107

Location: U-LRC

10 points: 3. The student will view the film "Plight of the Cerebral Palsied" and identify the major symptoms which characterize the disease by listing the manner in which symptoms are manifested.
Resource material: Film, "Plight of the Cerebral Palsied"
Location: U-LRC

10 points: 4. The student will write a paper, not to exceed two (2) typewritten pages, describing the following conditions and probable causes that necessitate amputations:
(a) Poor blood supply
(b) Infection of an extremity
(c) Discoloration of an extremity
Resource materials: 1:107-144; 1:21-26; 3:103-144
Location: U-LRC

10 points: 5. After reading Orthopedics for Undergraduates, the student will write out the answer to the following questions:
(a) What are the symptoms of pseudo-hypertropic muscular dystrophy?
(b) What are the differences between the symptoms of facio-scapulo-humeral

muscular dystrophy and peroneal muscular dystrophy?

Submit to instructor as scheduled.

Resource materials: 1:72-78; 2:125-127; 3:589-591

Location: U-LRC

10 points: 6. The student will view slides on "Rehabilitation of the Stroke Hemiplegia Patient" and list the physical symptoms related to strokes.

Resource materials: Slides, 26 ea., color; 1:85-90; 3:521-551

Location: U-LRC

10 points: 7. The student will visit a nursing home; after having observed several stroke patients, select one and complete the stroke evaluation form. Submit to instructor as scheduled.

Resource materials: Any nursing home on approved list; stroke patient evaluation form

Location: See Appendix G; see hand-out #4

10 points: 8. The student will view the film "The Stroke Victim" and describe the five (5) physical

symptoms of a stroke patient as indicated in the film. Submit to instructor as scheduled.

Resource material: Film, 26 minutes, color

Location: U-LRC

15 points: 9. The student will attend three class sessions as scheduled concerning the etiology of selected orthopedic disabilities and their implications to programming in therapeutic recreation. Submit to instructor a list of symptoms related to the discussed orthopedic disabilities. Five (5) points for each class session attended.

POST-ASSESSMENT:

Successful completion of the activities of this module will satisfy post-assessment requirements. A minimum of 85 percent accuracy or 81 of the total number of contract points for this module is considered satisfactory.

The student is also required to take a comprehensive test upon completion of this module. A minimum of 75 percent accuracy is required for passing.

REMEDIATION:

In the event the level of attainment and proficiency is not met during the student's initial attempt to complete

the module, he will engage in such remedial activities as deemed necessary after consulting with the instructor during a personal conference.

RESOURCE MATERIALS

Books:

1. Adams, R. C. et al. Games, Sports and Exercises for the Physically Handicapped. Philadelphia: Lea and Febiger, 1972.

2. Crabbe, W. A. Orthopedics for Undergraduates. Philadelphia: Lea and Febiger, 1968. Pp. 44-64.

3. Krusen et al. Handbook of Physical Medicine and Rehabilitation. Philadelphia: W. B. Saunders Co., 1971.

4. Lawton, Edith B. Activities of Daily Living for Physical Rehabilitation. New York: McGraw-Hill Book Co., Inc., 1963. Pp. 140-245.

5. Licht, S. Therapeutic Exercise. New Haven: Elizabeth Licht Co., 1958.

6. McDaniel, Lucy. Selected Orthopedic Disabilities, a Programmed Text for Allied Health Service Trainees. Thorofare, New Jersey: Charles B. Black, Inc., 1973.

7. Williard, Helen S., and Spackman, Clare S. Occupational Therapy. 3rd ed. Philadelphia: J. B. Lippincott Co., 1954.

Films:

1. "Rehabilitation of the Stroke Hemiplegia Patient."
   Time: 26 minutes.
   Color.
   Location: University Library, A-V room.

2. "The Plight of the Cerebral Palsied."
   Time: 30 minutes.
   Color.
   Location: University Library, A-V room.

COMPONENT: Recreation 281: Field Experience I in Therapeutic Recreation

MODULE 5: Basic Communication: Theories and Their Application to the Communication Process

RATIONALE:

The therapeutic recreation leader must be able to communicate in the language that is common to members of the allied health field, particularly in hospital and similar settings having medically oriented rehabilitation teams. Guinn, in his manual Basic Terminology for Therapeutic Recreation and Other Action Therapies, made the following statement:

> "Beetles can't talk to butterflies." These words have become a central focus in approaches to therapy in education. Some of the most common themes in classroom focus on "effective communication," "speaking the same language," and "getting where clients are." Therapeutic recreation has long purported to offer purposeful, treatment-oriented, and therapeutic activities designed to support rehabilitation. Activity therapies have often worked with various professionals from medicine, psychiatry, psychology, social work, and others. However, too often students find their way into various jobs in treatment facilities unarmed with even the most basic medical and psychiatric vocabulary, not only to discover that the "beetle position" is most uncomfortable in a room filled with "butterflies."[1]

If therapeutic recreation therapists are to hold their own on treatment teams and in rehabilitation settings,

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[1]Scout L. Gunn, Basic Terminology for Therapeutic Recreation and Other Action Therapies (Champaign, Ill.: Stipes Publishing Co., 1975), p. 11.

they must both understand and "speak the language." It is the purpose of this module to give the student a knowledge of the basic communication theories and most commonly used terms used by practitioners in the rehabilitation process.

BEHAVIORAL OBJECTIVES:

Upon completion of the activities contained in this module the student will be able to:

1. Identify correctly the basic communication theories by constructing a written list of each along with their implication to therapeutic recreation.

2. List and define ten (10) terms frequently used in reference to each of the following conditions: (a) arthritis, (b) cerebral palsy, (c) lower-extremity amputation, (d) muscular dystrophy, and (e) stroke.

3. Identify correctly fifty (50) general medical terms by writing the definition for each.

4. Identify correctly twenty-five (25) symbols used in record keeping and charting during the process of treating patients.

STUDENT'S OPTIONS:

The student may select any of the following activities that will help him to attain the behavioral objectives of this module and accrue the necessary points to satisfy the post-assessment proficiency level. In

addition, the student is required to take a comprehensive posttest upon completion of this module. A minimum of 75 percent accuracy is required for passing.

In the event the level of attainment and proficiency is not met during the student's initial efforts, provisions are made for remedial activities to make up any deficits (see remediation of this module for instructions.)

LEARNING ACTIVITIES:

Contract Values:

10 points: 1. The student will attend class on the introduction to the module "Basic Communication Theories" and synthesize at least five (5) general communication theories after listening to the lecture and discussions. List general theories and submit to instructor as scheduled.
Resource material: Class lecture and discussions; date to be announced
Location: Human Performance Laboratory

10 points: 2. The student will glean the book, Therapeutic Communication by Ruesch, and discuss in writing the therapeutic theory of communication. Do not exceed two typewritten pages.
Resource material: 3:18--225

Location: University learning resource Center (U-LRC)

15 points: 3. Given a list of fifty (50) commonly used medical terms, the student will accurately match 90 percent with the correct definitions.

Resource material: 2:1-14

Location: University library (Reserved)

45 points: 4. The student will perform the following activities with a 90 percent accuracy.

(a) Give a brief definition for the following terms that are associated with arthritis:

(1) Arthro-
(2) Rheumatism
(3) Still's disease
(4) Ankylosos
(5) Osteoarthritis
(6) Synovial joint
(7) Atrophy

(b) Give a brief definition for the following terms associated with cerebral palsy:

(1) Cerebral
(2) Palsy
(3) Hyptonic
(4) Dystonic
(5) Spasticity
(6) Athethosis
(7) Rigidity
(8) Ataxia
(9) Chorea
(10) Tremor

(c) Give a brief definition for the following terms associated with amputations:

(1) Cosmesis
(2) Elective amputation
(3) Traumatic amputation
(4) Open amputation
(5) Closed amputation
(6) AK amputation
(7) BK amputation
(8) Hemipelvectomy
(9) Prosthesis
(10) Stump
(11) Phantom pain

(d) Give a brief definition for the following terms associated with muscular dystrophy:

(1) Dystrophy
(2) Pseudo-hypertrophic
(3) Facio-scapulo-humeral
(4) Juvenile
(5) Duchanne
(6) Amytonia cogenita
(7) Chariot-Marie tooth disease

(e) Give a brief definition of the terms listed commonly associated with strokes:

(1) CVA
(2) Monoplegia
(3) Diplegia
(4) Hemiplegia
(5) Quadriplegia
(6) Paraplegia
(7) Thrombosis
(8) Embolism
(9) Dysarthria
(10) Aphasia

Resource materials: 2:359-365, 366-395; 3:52; 4:133-143

10 points: 5. Given a list of fifty (50) symbols used in record keeping and charting during the rehabilitation process, the student will supply the meaning for each with a 95 percent accuracy. Submit to instructor as scheduled.

Resource material: 1:73-77

Location: University library (R)

10 points: 6. The student will view the transparencies "Communication Games" and synthesize a minimum of five (5) principles involved in effective communication.

Resource material: #9

Location: U-LRC

10 points: 7. The student will attend class on the showing of the film "Avoiding Communication Breakdown" and construct a list of ten (10) signs of defective communication after viewing the film. Submit to instructor as scheduled.

Resource material: #8

Location: U-LRC

10 points: 8. The student will read pages 209-218 in the book Toward a Behavioral Theory of Communication in Modern Systems Research for

the Behavioral Scientist and submit to the instructor, in writing, five (5) theories of communication.

Resource material: 1:209-218

Location: University library (R)

POST-ASSESSMENT:

Successful completion of the activities of this module with a minimum of 85 percent accuracy or 93 of the total (110) number of points for this module will be a partial fulfillment of the requirements. The student must also pass the comprehensive test for the module with a minimum of 75 percent accuracy. A fifty- (50) item objective test will be administered before the next module is contracted.

REMEDIATION:

In the event the level of attainment and proficiency is not met during the student's initial attempt, he will engage in such remedial activities as deemed necessary after consulting with the instructor during a personal conference.

RESOURCE MATERIALS

Books:

1. Ackoff, Richard. Toward a Behavioral Theory of Communication in Modern Systems Research for the Behavioral Scientist. Chicago: W. Bukley, Aldine Press, 1968. Pp. 209-218.

2. Araheim, Daniel D., Auxter, David, and Crowe, Walter C. Principles and Methods of Adapted Physical Education. 2d ed. St. Louis: C. V. Mosby Co., 1973. Pp. 359-395.

3. Gunn, Scout L. Basic Terminology for Therapeutic Recreation and Other Action Therapies. Champaign, Illinois: Stipes Publishing Company, 1975. Pp. 52, 73-77.

4. Krusen et al. Handbook of Physical Medicine and Rehabilitation. Philadelphia: W. B. Saunders Co., Inc., 1963. Pp. 542-547.

5. O'Rourke, T. J. A Basic Course in Manual Communication. Silver Springs, Md.: National Association of the Blind, 1970.

6. Ruesch, Jurgen. Therapeutic Communication. New York: W. W. Norton and Company, Inc., 1961.

Audio-Tape:

7. "Non-Verbal Communication," by Earnst Beier and James Gill. Psychology Today.

Film:

8. "Avoiding Communication Breakdown."
24 minutes.
Color.

Transparencies:

9. "Communication Games." Lansford Publishing Co. San Jose, California.

10. "Non-Verbal Communication." Lansford Publishing Co. San Jose, California.

FINAL EXAMINATION

Module 5

Module 5

Test

Title: Basic Communication: Theories and Their Application to the Communication Process

Part I: Short Answers

Direction: Give a brief answer for each of the following:

1. List five basic theories of communication having implications to therapeutic recreation.

   a. _____

   b. _____

   c. _____

   d. _____

   e. _____

2. Give a brief definition for each of the following terms associated with arthritis

   a. Arthro

   b. Still's disease

   c. Rheumatism

   d. Osteoarthritis

   e. Ankylosis

3. Give a brief definition for each of the following terms associated with cerebral palsy:

   a. Hyptonic

   b. Dystonic

   c. Athethosis

d. Ataxia

e. Chorea

4. Give a brief definition for each of the following terms associated with amputations:

a. Cosmesis

b. Prosthesis

c. Phantom pain

d. Hemipelvectomy

e. BK amputation

5. Give a brief definition for each of the following terms associated with muscular dystrophy:

a. Dystrophy

b. Pseudohypertrophic

c. Facioscapulohumeral

d. Amytonia congenita

e. Chariot-Marie tooth disease

6. Give a brief definition for each of the following terms associated with cardiovascular attacks:

a. Monoplegia

b. Hemiplegia

c. Quadriplegia

d. Dysarthria

e. Aphasia

Part II: Matching Items

Directions: Match the terms in the left column with the statements on the right. Place the letter beside the correct item on the left.

1.

A.	ADL	____ 1.	Above elbow
B.	AE	____ 2.	Below knee
C.	AMA	____ 3.	Activities of daily living
D.	BE	____ 4.	Against medical advice
E.	AK	____ 5.	Above knee
F.	PRE		

2.

A.	B.I.D.	____ 1.	Four times daily
B.	Q.D.	____ 2.	Three times daily
C.	T.I.D.	____ 3.	Every day
D.	MHB	____ 4.	Twice daily
E.	BK	____ 5.	As necessary
F.	PRN		

3.

A.	PRE	____ 1.	Cardiovascular Accident
B.	CVA	____ 2.	Electromyograph
C.	EMG	____ 3.	Electroencephalogram
D.	EEG	____ 4.	Electrocardiogram
E.	EKG	____ 5.	Progressive Resistive Exercise
F.	Fx		

COMPONENT: Recreation 281: Field Experience I in Therapeutic Recreation

MODULE 6: Different Leadership Approaches and Techniques

RATIONALE:

During the process of working with individuals and groups the therapeutic recreation leader is responsible for utilizing the most effective techniques and best approaches to meet the needs of patients/clients in the particular setting. There are several points of view as to the traits of a successful leader. The ones most frequently referred to are intelligence, courage, warmth and enthusiasm, sensitivity, energy, professional drive, and responsibility. However, it is of little significance for a leader to be endowed with these or other qualities if they are not exemplified congruously. The manner in which these traits are manifested by the recreation leader in conducting a recreation program is often called "technique." It is an established procedure of many institutions to have the prospective therapeutic recreation leader knowledgeable of a variety of techniques and approaches toward effective leadership prior to field experience II. This module aims to acquaint the student with various traditional and contemporary leadership approaches and techniques.

BEHAVIORAL OBJECTIVES:

Upon completion of the activities in this module the student will be able to:

1. Write an explicit definition for each of the traditional theories of play: (a) Surplus-energy Theory, (b) Recreation Theory, (c) Instinct-practice Theory, (d) Recapitulation Theory, and (e) Catharsis Theory. Submit to instructor as scheduled.

2. List and explain the four "Universal Wishes" of man as coined by W. I. Thomas.

3. Compare the differences between the theory of situational leadership and functional leadership by writing a brief analysis of each.

4. Give a brief written example of the following therapeutic recreation leadership techniques: (a) controller, (b) director, (c) instigator, (d) stimulator, (e) educator, (f) adviser, (g) observer, and (h) enabler.

PREREQUISITES:

The student must be enrolled in Recreation 281 and have access to personal transportation to make off-campus visitations.

STUDENT'S OPTIONS:

The student may select any of the following activities that will help him to attain the behavioral

objectives of this module and accrue the necessary points to satisfy the post-assessment proficiency level. In addition, the student is required to take a comprehensive posttest upon completion of this module. A minimum of 75 percent accuracy is required for passing.

In the event the level of attainment and proficiency is not met during the student's initial efforts, provisions have been made for remedial activities to make up any deficits (see remediation of this module for instructions).

LEARNING ACTIVITIES:

Contract Values:

15 points: 1. The student will attend class on the date the module "Leadership Approaches and Techniques in Therapeutic Recreation" is scheduled. The student will submit in detail an account for the values of different leadership techniques and approaches discussed during the class period. Submit to instructor as scheduled. Resource material: Class meeting (lecture and discussions)

10 points: 2. The student will view the transparencies "Leadership" and write a paper not to exceed two (2) typewritten pages telling why

effective leadership in one setting or situation may be ineffective in another.
Resource material: #12
Location: U-LRC

10 points: 3. The student will view the transparencies "Group Dynamics" and submit a written report to the instructor with an outline indicating five (5) major concepts by which group behavior is conceptually understood.
Resource material: #13
Location: U-LRC

10 points: 4. The student will list and give a definition for each of the traditional theories of play. Submit to instructor as scheduled.
Resource material: 4:80, 132-148
Location: University library (R)

10 points: 5. The student will compare the differences between functional leadership and situational leadership by writing a brief analysis of each.
Resource material: 3:55-56.
Location: University library (R)

15 points: 6. The student will give a brief written example for each of the following techniques:

(a) Controller

(b) Instigator

(c) Director

(d) Stimulator

(e) Educator

(f) Adviser

(g) Observer

(h) Enabler

Resource material: 1:156-160

Location: University library (R)

25 points: 7. The student will select five (5) of the following resources and write a paper, not to exceed two (2) typewritten pages, reflecting a minimum of five concepts of leadership expressed or implied in the materials.

(a) Leadership Training in Camping for the Handicapped

Resource material: #2

(b) Differential Use of Program Activities in Child Treatment Groups

Resource material: #12

(c) Motivation in Physical Education and Recreation for Emotionally Handicapped Children

Resource material: #10

(d) Humanistic Health and Physical Education

Resource material: #7

(e) Competency Needs of Special Education of Crippled and Other Impaired

Resource material: #5

(f) A Linear Approach for Delivering Individualized Therapeutic Recreation Services

Resource material: #6

(g) Integrating Pre-service Education and Professional Functioning

Resource material: 8:40-46

(h) Therapeutic Recreation and Group Activities

Resource material: #9

Location: University library (R)

30 points: 8. The student will visit a local nursing home and identify a minimum of five (5) leadership approaches and techniques being used by therapeutic recreation leaders while directing activities for each of the following kinds of patients:

(a) Arthritic

(b) Cerebral palsy

(c) AK amputation

(d) BK amputation

(e) Muscular dystrophy

(f) Cardiovascular attack (stroke)

POST-ASSESSMENT:

Successful completion of the activities of this module with a minimum of 85 percent accuracy or 106 of the total (125) number of points for this module will be a partial fulfillment of the requirements. The student must also pass the comprehensive test for the module with a minimum of 75 percent accuracy. A fifty- (50) item objective test will be administered before the next module is contracted.

REMEDIATION:

In the event the level of attainment and proficiency is not met during the student's initial attempt, he will engage in such remedial activities as deemed necessary after consulting with the instructor during a personal conference.

RESOURCE MATERIALS

Books:

1. Avedon, Elliott M. Therapeutic Recreation Serivce: An Applied Behavioral Science Approach. Englewood Cliffs: Prentice-Hall, Inc., 1974. Pp. 156-160.

2. Godfrey, Barbara B. Leadership Training in Camping for the Handicapped. University of Southern California, 1958. P. 296.

3. Kraus, Richard, and Bates, Barbara. Recreation Leadership and Supervision: Guidelines for Professional Development. Philadelphia: W. B. Saunders Company, 1975.

4. Mitchell, Elmer D., and Mason, Bernard S. The Theory of Play. New York: A. S. Barnes and Company, 1948. Pp. 80, 132-148.

Articles:

5. Dykes, Mary K. "Competency Needs of Special Educators of Crippled and Other Health Impaired," Journal of Special Education, 9 (Winter, 1975):367-374.

6. Compton, David. "A Linear Approach for Delivering Individualized Therapeutic Recreation Services," Journal of Health, Physical Education and Recreation, 26 (January, 1976).

7. Johnson, Warren R. "Clinical and Humanistic Health and Physical Education," Academic Therapy Quarterly, 10 (Summer, 1975).

8. Robb, Gary. "Integrating Pre-Service Education and Professional Functioning," Therapeutic Recreation Journal, 7, No. 2 (Second Quarter, 1973):40-46.

9. Rober, Martha. "Therapeutic Recreation and Group Activities," Intercom., 27, No. 3 (Summer, 1975): 1-2.

10. Waggoner, Bernice. "Motivation in Physical Education and Recreation for Emotionally Handicapped Children," Journal of Health, Physical Education and Recreation, 44 (March, 1973):73-76.

11. Walls, Willie J. "Suggestions for Teaching Disadvantaged and Handicapped," The Agricultural Education Magazine, 47 (May, 1975):261-263.

12. Whitaker, James K. "Differential Use of Program Activities in Child Treatment Groups," Child Welfare, 55 (July/August, 1976):459-467.

Transparencies:

13. "Group Dynamics." Lansford Publishing Company. San Jose, California. (10 transparencies)

14. "Leadership." Lansford Publishing Company. San Jose, California. (10 transparencies)

COMPONENT: Recreation 281: Field Experience I in Therapeutic Recreation

MODULE 7: Practices in First Aid and Safety Procedures for Selected Orthopedic Disabilities

RATIONALE:

It is important to take every precaution possible to prevent accidents and to provide first aid treatment for those unexpected and unavoidable mishaps that often occur in exercise programs. Every therapeutic recreation leader who works in specialized areas should and is expected to know first aid procedures. In any event everything should be done to make the injured person comfortable and to reassure the injured until services of a physician can be secured. The therapeutic recreator is also held responsible for providing a safe environment for his patients/clients.

When considering the human factors that exist among individuals with certain impaired physical disabilities, the recreationist must recognize that many conditions may exist which diminish these clients'/patients' ability to cope with an emergency or to sense the early warnings of an accident in the making. This module aims to provide experiences for the student who is embarking upon a career in therapeutic recreation to gain knowledge of safety precautions and safety and first aid practices for clients/patients with the following selected orthopedic disabilities: rheumatoid

arthritis, cerebral palsy, lower-extremity amputations, muscular dystrophy, and strokes.

BEHAVIORAL OBJECTIVES:

Upon successful completion of the selected activities in this module the student will be able to:

1. Construct a list of general safety precautions that a therapeutic recreation leader should have knowledge of and employ in a program of rehabilitating the handicapped.

2. Construct a list of general first aid principles that may be used by a therapeutic recreation leader in administering a therapeutic recreation program.

3. Construct a list of safety precautions the therapeutic recreationist should be knowledgeable of while working with the following types of disabilities: rheumatoid arthritis, cerebral palsy, lower-extremity amputations, muscular dystrophy, and strokes.

4. Construct a list of first aid procedures specifically related to the following disabilities: rheumatoid arthritis, cerebral palsy, lower-extremity amputations, muscular dystrophy, and strokes.

PREREQUISITES:

The student must be enrolled in Recreation 281 and have access to personal transportation to make off-campus visitations.

STUDENT'S OPTIONS:

The student may select any of the following activities that will help him to attain the behavioral objectives of this module and accrue the necessary points to satisfy the post-assessment proficiency level. In addition, the student is required to take a comprehensive posttest upon completion of this module. A minimum of 75 percent accuracy is required for passing.

In the event the level of attainment and proficiency is not met during the initial student efforts, provisions have been made for remedial activities to make up any deficits (see remediation of this module for instructions).

LEARNING ACTIVITIES:

Contract Values:

15 points: 1. The student will attend class on the date "First Aid and Safety Practices" is scheduled. After listening to a lecture and discussion on the subject, the student will write a summary of the class activities with specific reference to five or more major concepts of safety and first aid practices in therapeutic recreation. Submit to instructor as scheduled.

10 points: 2. The student will read pages 498-504 in Bucher's Administration of Health, Physical Education Programs, Including Athletics and list the safety code as stated for physical education teachers.
Resource material: #6

10 points: 3. The student will read pages 164-181 in Fait's book Adapted Physical Education and make a list of ten (10) things the recreation leader would take into consideration when adapting games and activities for patients with cerebral palsy.
Resource material: 9:164-181

10 points: 4. The student will read pages 183-201 in Fait's book Adapted Physical Education and compare similar findings to those found in Updyke's Principles of Modern Physical Education, Health and Recreation on safety precautions for stroke and muscular dystrophy patients/clients. What are the similarities? What are the differences, if any? List and submit to instructor as scheduled.
Resource material: 6:498-504

15 points: 5. The student will view the film "General Directions for Giving First Aid" and

complete the enclosed film evaluation form.

Resource material: #15

10 points: 6. The student will construct a list of five (5) first aid and five (5) safety practices a therapeutic recreation leader should be knowledgeable of while working with the following orthopedic disabilities: rheumatoid arthritis, cerebral palsy, lower-extremity amputations, muscular dystrophy, and cardiovascular attacks.

Resource materials: 14:230-233, 311-312, 519-522; 1:21, 38, 74, 79, 85, 86

10 points: 7. The student will visit a therapeutic setting where the following patients/clients can be observed in action with a therapeutic recreation leader and list at five (5) safety precautionary measures that have been established to protect the program's recipients. Give a brief account as to the effectiveness of each.

Patients: rheumatoid arthritis, cerebral palsy, lower-extremity amputations, muscular dystrophy, and strokes.

Resource material: Local therapeutic settings

Locations: See approved list in Appendix

10 points: 8. The student will view film on safety measures for the cardiovascular arrested patients and complete film evaluation form. Major concepts of safety for stroke victims should be stressed.

Resource material: Film, "Heart Attack and Effects"

Location: U-LRC

15 points: 9. The student will prepare a chart that will specify at least three (3) specific precautionary measures a therapeutic recreation leader should take to prevent or minimize the chances of injury to the following types of clients/patients: rheumatoid arthritis, cerebral palsy, lower-extremity amputation, muscular dystrophy, and stroke.

Resource material: 1:21, 38, 74, 79, 85, 86

10 points: 10. The student will discuss, in not less than two (2) typewritten pages, specific ways a knowledge of general first aid techniques

could aid the following clients/patients: rheumatoid arthritis, cerebral palsy, muscular dystrophy, lower-extremity amputation, and stroke.
Resource materials: 2:11-37, 10:9-47

POST-ASSESSMENT:

Successful completion of the activities of this module with a minimum of 85 percent accuracy or 97 of the total (115) number of points for this module will be a partial fulfillment of the requirements. The student must also pass the comprehensive test for the module with a minimum of 75 percent accuracy. A fifty- (50) item objective test will be administered before the next module is contracted.

REMEDIATION:

In the event the level of attainment and proficiency is not met during the student's initial attempt, he will engage in such remedial activities as deemed necessary after consulting with the instructor during a personal conference.

RESOURCE MATERIALS

Books:

1. Adams, Ronald C. et al. Games, Sports, and Exercises for the Physically Handicapped. 2d ed. Philadelphia: Lea & Febiger, 1975. Pp. 21, 38, 74, 79, 85, 86.

2. American Red Cross. Advanced First Aid and Emergency Care. Garden City, New York: Doubleday & Company, 1973. Pp. 17-23.

3. Arnheim, Daniel D. et al. Principles and Methods of Adapted Physical Education. St. Louis: The C. V. Mosby Company, 1973. Pp. 359, 365, 370.

4. Brennan, William T., and Ludwig, D. J. First Aid and Emergency Care, Guide to Problems and Practices. 3rd ed. Dubuque, Iowa: Wm. C. Brown Company, Publisher, 1976. Pp. 169, 174.

5. Brunner, Nancy A. Orthopedic Nursing: A Programmed Approach. Saint Louis: The C. V. Mosby Company, 1970. Pp. 158-173.

6. Bucher, Charles A. Administration of Health and Physical Education Programs, Including Athletics. Saint Louis: The C. V. Mosby Company, 1975. Pp. 498-504.

7. Cole, Warren H., and Puestow, C. B. First Aid Diagnosis and Management. 6th ed. New York: Appleton-Century-Crofts. Pp. 3, 4-16.

8. Crabbe, W. A. Orthopedics for Undergraduates. Philadelphia: Lea & Febiger, 1968. Pp. 44, 50, 108-114.

9. Fait, Hollis F. Adapted Physical Education. Philadelphia: W. B. Saunders Company, 1960. Pp. 164-181, 183-201.

10. Hafen, Brent Q. First Aid: Contemporary Practices and Principles. Minneapolis: Burgess Publishing Company, 1972. Pp. 9-19.

11. Henderson, John. Emergency Medical Guide. 3rd ed. New York: McGraw-Hill Book Company, 1973. Pp. 1, 36, 61.

12. Kirk, Robert H. First Aid and Emergency Care: Guide to Understanding and Action. Dubuque, Iowa: Kendall/Hunt Publishing Company, 1973. Pp. 15, 135.

13. McDaniel, Lucy V. Selected Orthopedic Disabilities: A Programmed Text for Allied Health Service Trainees. Thorofare, New Jersey: Charles B. Slack, Inc., Publishers, 1973. Pp. 65, 107.

14. Updyke, Wynn F., and Johnson, Perry B. Principles of Modern Physical Education, Health and Recreation. New York: Holt, Rinehart and Winston, Inc., 1970. Pp. 230-233, 311-312, 314, 519-522.

Form:

15. Film Preview Form. See Appendix F.

COMPONENT: Recreation 281: Field Experience I in Therapeutic Recreation

MODULE 8: Activities to Meet the Needs of the Therapeutic Recreation Patient/Client

RATIONALE:

The therapeutic recreation leader should be knowledgeable of the types of activities that can be used to meet the physical, emotional, social, and intellectual needs of special populations. This module purports to provide learning activities that will introduce the student to a variety of recreational activities that could be used therapeutically in meeting the needs of special population patients/clients. Special references are made to therapeutic recreational activities for the following types of disabilities: rheumatoid arthritis, cerebral palsy, lower-extremity amputations, muscular dystrophy, and cardiovascular attacks (strokes).

BEHAVIORAL OBJECTIVES:

Upon successful completion of the activities contained in this module the student will be able to:

1. Classify activities in relation to the specification of abilities and skills grouped by behavioral domain.

2. Outline the basic goals of therapeutic recreational service.

3. Make a comparison between the participation goals in therapeutic recreation for the ill and handicapped and the general recreation goals for a standard program.

4. Identify the general activity areas for special populations.

5. Construct a list of therapeutic recreation activity values.

6. Construct a list of therapeutic activities with specific benefits to rheumatoid arthritis, cerebral palsy, lower-extremity amputations, muscular dystrophy, and cardiovascular attacks (strokes).

PREREQUISITES:

The student must be enrolled in Recreation 281 and have access to personal transportation to make off-campus visitations.

STUDENT'S OPTIONS:

The student may select any of the following activities that will help him to attain the behavioral objectives of this module and accrue the necessary points to satisfy the post-assessment proficiency level.

In the event the level of attainment and proficiency is not met during the student's initial efforts, provisions have been made for remedial activities to make up any deficits (see remediation of this module for instructions).

LEARNING ACTIVITIES:

Contract Values:

10 points: 1. The student will attend class on the date and at the time the subject "Utilization of Specific Activities to Meet the Needs of Therapeutic Recreation Clients/Patients" is scheduled. After listening to the lecture and discussion, the student will write a report, not to exceed two (2) typewritten pages, discussing the use of the cognitive, affective, and sensory-motor in classifying therapeutic recreation activities for patients/clients. Submit to instructor as scheduled.

Resource material: 2:209-214

Location: University library (R)

20 points: 2. The student will list three (3) recreational activities for each of the following categories:

(a) Activities that require predominantly cognitive skills

(b) Activities that require predominantly affective skills

(c) Activities that require predominantly cognitive skills but also rely upon affective abilities

(d) Activities that require predominantly affective skills but also rely upon cognitive abilities

(e) Activities that require predominantly sensory-motor abilities

(f) Activities that require predominantly sensory-motor abilities but also rely upon cognitive abilities

(g) Activities that require predominantly sensory-motor skills but also rely upon affective abilities

(h) Activities that require predominantly cognitive abilities but also rely upon sensory-motor abilities

(i) Activities that require predominantly affective abilities but also rely upon sensory-motor abilities

(j) Activities in which apparently no one behavioral domain is predominant

Resource materials: 1:21, 38, 74, 79, 85, 86, 2:182-198, 205-214

Location: University library (R)

10 points: 3. The student will outline the basic goals of the therapeutic recreation service as viewed by Kraus and Avedon. Compare the two points

of view by indicating the agreements and disagreements, if any. Submit to instructor as scheduled.

Resource materials: 2:31; 4:3-4

Location: University library (R)

10 points: 4. The student will explain the objectives of therapeutic recreational activities in institutional settings with:

(a) Psychiatric patients

(b) Cardiac or pulmonary disease patients

(c) Physical trauma patients

How do the objectives in these settings differ from clients with no serious limitations living in the community? Submit to instructor as scheduled.

Resource material: 4:4

Location: University library (R)

10 points: 5. The student will list the thirteen (13) activity areas for therapeutic recreation, according to O'Morrow, and name three (3) types of activities for each area.

Resource material: 8:142-147

10 points: 6. The student will list the ten (10) values of activities and list five (5) activities for each value.

Resource materials: 8:147-152; 2:182-198

15 points: 7. The student will construct a chart, as shown in resource material #14, and complete one for each of the following orthopedic disabilities: rheumatoid arthritis, cerebral palsy, lower-extremity amputations, muscular dystrophy, cardiovascular attacks (strokes).
Resource materials: 1:21, 38, 74, 79, 85, 86; 2:182-198, 209-214; 3:24; 6:69-238; 4:128-138; 8:147-152; 9:242-250; 10:85-215
Location: University library (R)

10 points: 8. The student will view the film "Cast No Shadow" and submit a typewritten report on the value of recreation to individual development. List the types of disabilities recognized in the film.
Resource material: #11
Location: U-LRC

10 points: 9. The student will view the film "Parolympics" and submit a typewritten report explaining the values of different activities shown.
Resource material: #12
Location: U-LRC

10 points: 10. The student will view the video tape "Wheelchair Athletics" and submit a typewritten report explaining the

classifications, rules, and regulations along with benefits which accrue to the participants.

Resource material: #13

Location: U-LRC

20 points: 11. The student will visit three different rehabilitation centers and:

(a) List the different types of activities provided for the rheumatoid arthritic patients/clients, cerebral palsy patients/clients, lower-extremity amputation patients/clients, muscular dystrophy patient/clients, and cardio-vascular attack patients/clients

(b) Discuss the goals of the program with the therapeutic recreation leader and list the value(s) for each prescribed activity

(c) Classify each activity as to its predominant and associate domains

Resource materials: 1-13

POST-ASSESSMENT:

Successful completion of the activities of this module with a minimum of 85 percent accuracy or 114 of the total (135) number of points for this module will be a partial fulfillment of the requirements. The student must also pass the comprehensive test for the module with a minimum of 75 percent accuracy. A fifty- (50) item objective test will be administered before the next module is contracted.

REMEDIATION:

In the event the level of attainment and proficiency is not met during the student's initial attempt, he will engage in such remedial activities as deemed necessary after consulting with the instructor during a personal conference.

RESOURCE MATERIALS

Books:

1. Adams, Ronald C. et al. Games, Sports, and Exercises for the Physically Handicapped. 2d ed. Philadelphia: Lea and Febiger, 1975.

2. Avedon, Elliott M. Therapeutic Recreation Service: An Applied Behavioral Science Approach. Englewood Cliffs: Prentice-Hall, Inc., 1974.

3. Davis, John E. Clinical Applications of Recreational Therapy. Springfield, Illinois: Charles C. Thomas, Publisher, 1952.

4. Kraus, Richard. Therapeutic Recreation Service: Principles and Practices. Philadelphia: W. B. Saunders Company, 1973.

5. Kraus, Richard, and Bates, Barbara. Recreation Leadership and Supervision: Guidelines for Professional Development. Philadelphia: W. B. Saunders Company, 1975.

6. Kraus, Richard. Recreation Today: Program Planning and Leadership. New York: Appleton-Century-Crofts, 1966.

7. Meyer, Harold D., and Brightbill, Charles K. Community Recreation: A Guide to Its Organization. 3rd ed. Englewood Cliffs: Prentice-Hall, Inc., 1964.

8. O'Morrow, Gerald S. Therapeutic Recreation: A Helping Profession. Reston, Virginia: Prentice-Hall Company, 1976.

9. Shrivers, Jay S., and Fait, Hollis F. Therapeutic and Adapted Recreational Services. Philadelphia: Lea and Febiger, 1975.

10. Tillman, Albert. The Program Book for Recreation Professionals. Los Angeles: National Press Books, 1973.

Films:

11. "Cast No Shadow." The Recreation Center for the Handicapped, Inc., Professional Arts, Inc.
27 minutes.
Color.

12. "Parolympics, Heidelberg 1972." National Wheelchair Athletic Association.
15 minutes.
Color.

Video Tape:

13. "Wheelchair Athletics." (1-1½" R-R)(2-3/4" cassette).
38 minutes.
Color.
University of Illinois, 1974.

DISABILITY ACTIVITY CLASSIFICATION

Form C

CONDITION	ACTIVITY GOAL(S)	ACTIVITY VALUE(S)	DOMAINS		
			COGNITIVE	EFFECTIVE	SENSORY-MOTOR

COMPONENT: Recreation 281: Field Experience I in Therapeutic Recreation

MODULE 9: Organizational Factors and Resources Required for a Therapeutic Recreation Program

RATIONALE:

Current literature and research findings in therapeutic recreation list knowledge of program planning and development among the essential competencies recreation leaders should have. It is also realized by experienced practitioners that the recreator must have some resources on which to call for assistance providing recreation services. These include both human resources and physical resources.

In organizing a therapeutic recreation program for the ill and disabled it is extremely important that the recreator fully understand the problems before activities are selected and initiated. Therapeutic recreational activity is remedial, and all remedial activity must be medically prescribed. Different patients have different needs, interests, and abilities. Each will have to be treated as an individual so that activity involvement satisfies the personal requirements.

This module aims to provide the student with direct and vicarious experiences that will enhance his knowledge of various factors and resources that have direct bearings on organizing and developing a therapeutic recreation program

for the orthopedically handicapped, especially patients/clients with rheumatoid arthritis, cerebral palsy, lower-extremity amputations, muscular dystrophy, and cardiovascular attacks.

BEHAVIORAL OBJECTIVES:

Upon successful completion of the learning activities contained in this module the student will be able to:

1. Construct a list of several guidelines which can be applied to therapeutic recreation programming for the general population of the ill and disabled.

2. Identify various resources the therapeutic recreationist can call on for assistance in providing recreation services for the ill and disabled.

3. Construct a list of factors having direct influence on the feasibility and effectiveness of a therapeutic recreation program.

4. Interpret in writing the influencing factors of the five levels of recreational programming for physically handicapped patients/clients.

5. Identify the reaction program plan, investigation program plan, and creative program plan and explain why each is a factor to be considered in programming for the physically handicapped.

6. Identify and explain those specific factors that would influence the feasibility and effectiveness of a therapeutic recreation program for the following patients/clients: rheumatoid arthritis, cerebral palsy, lower-extremity amputation, muscular dystrophy, and stroke.

PREREQUISITES:

The student must be enrolled in Recreation 281 and have access to personal transportation to make off-campus visitations.

STUDENT'S OPTIONS:

The student may select any of the following activities that will help him to attain the behavioral objectives of this module and accrue the necessary points to satisfy the post-assessment proficiency level.

In the event the level of attainment and proficiency is not met during the student's initial efforts, provisions have been made for remedial activities to make up any deficits (see remediation of this module for instructions).

LEARNING ACTIVITIES:

Contract Values:

15 points: 1. The student will attend class as scheduled for lecture and discussion of the topic "Organizational Factors and Resources

Required for a Therapeutic Recreation Program." After participating in class activities the student will write a report, not to exceed two (2) typewritten pages, explaining the needs for program planning in therapeutic recreation and the importance of resources other than the recreation leader.

10 points: 2. The student will construct a list of guidelines, a minimum of fifteen (15), which can be applied to therapeutic recreation programming for the general population of the ill and disabled.

Resource materials: 3:165; 6:175-181; 5:246-254, 342-344

Location: University library (R)

10 points: 3. The student will identify fifteen (15) resources the therapeutic recreationist can call on for assistance in providing recreation services for the physically handicapped by listing each and describing its major function.

Resource materials: 2:106-114; 3:167-178; #9, 10, 11, 12, 13

Location: University library (R)

10 points: 4. The student will construct a list of major limiting factors, a minimum of ten (10), having direct influence on the feasibility and effectiveness of a therapeutic recreation program for orthopedically disabled patients in a nursing home. Consider the unique features of a nursing home as compared to community centers.

Resource materials: 7:241-252; 8:58-65

Location: University library (R)

10 points: 5. Interpret in writing the influencing factors of the five levels of recreational programming for the physically handicapped as viewed by Kraus.

Resource material: 5:342-344

Location: University library (R)

10 points: 6. The student will identify in writing the recreation program plan, investigation program plan, and creative program plan and explain why each is a factor to be considered in developing a therapeutic recreation program for the physically handicapped.

Resource materials: 7:241-252; 8:57-58

Location: University library (R)

20 points: 7. The student will list and explain those factors, a minimum of five (5) each, that are specifically related to patients/ clients with rheumatoid arthritis, cerebral palsy, lower-extremity amputations, muscular dystrophy, and cardiovascular attacks (strokes).

Resource materials: 1:21, 38, 74, 79, 85, 86; 2:59, 87, 199, 200, 232; 7:215-234, 241-252

Location: University library (R)

POST-ASSESSMENT:

Successful completion of the activities of this module with a minimum of 85 percent accuracy or 55 of the total (65) number of points for this module will be a partial fulfillment of the requirements. The student must also pass the comprehensive test for the module with a minimum of 75 percent accuracy. A fifty- (50) item objective test will be administered before the next module is contracted.

REMEDIATION:

In the event the level of attainment and proficiency is not met during the student's initial attempt, he will

engage in such remedial activities as deemed necessary after consulting with the instructor during a personal conference.

RESOURCE MATERIALS

Books:

1. Adams, Ronald C. et al. Games, Sports, and Exercises for the Physically Handicapped. 2d ed. Philadelphia: Lea and Febiger, 1975.

2. Avedon, Elliott M. Therapeutic Recreation Service: An Applied Behavioral Science Approach. Englewood Cliffs: Prentice-Hall, Inc., 1974.

3. Frye, Virginia, and Peters, Martha. Therapeutic Recreation: Its Theory, Philosophy and Practice. Harrisburg, Pa.: The Stackpole Company, 1972.

4. Kraus, Richard. Therapeutic Recreation Service: Principles and Practices. Philadelphia: W. B. Saunders Company, 1973.

5. _____. Recreation Today: Program Planning and Leadership. New York: Appleton-Century-Crofts, 1966.

6. O'Morrow, Gerald S. Therapeutic Recreation: A Helping Profession. Reston, Virginia: Prentice-Hall Company, 1976.

7. Shrivers, Jay S., and Fait, Hollis F. Therapeutic and Adapted Recreational Services. Philadelphia: Lea Febiger, 1975.

8. Tillman, Albert. The Program Book for Recreation Book for Recreation Professionals. Los Angeles: National Press Books, 1973.

Organizations Interested in Persons with Handicapped Conditions:

9. American National Red Cross
17th and D Streets, N.W., Washington, D.C. 20006
(202) 737-8300

10. National Association of the Physically Handicapped, Inc.
    6473 Grandville Avenue, Detroit, Michigan 48228
    (313) 271-0160

11. National Congress of Organizations of the Physically Handicapped, Inc.
    7611 Oakland Avenue, Minneapolis, Minnesota 55423
    (612) 861-2162

12. The National Easter Seal Society for Crippled Children and Adults
    2023 West Ogden Avenue, Chicago, Illinois 60612
    (312) 243-8400

13. National Therapeutic Recreation Society
    National Recreation and Park Association
    1601 North Kent Street, Arlington, Virginia 22209
    (703) 525-0606

CONTRACT POINT SYSTEM AND EVALUATION CHART FOR MODULES 1 THROUGH 9

CONTRACT POINT SYSTEM AND EVALUATION CHART

ACTIVITY Types	POINTS Maximum	Minimum	GRADES
Required			
A. Comprehensive Examinations:			1292 & up = A
			1181-1291 = B
Module 1	60	51	
Module 2	115	97	1042-1180 = C
Module 3	50	42	
Module 4	95	81	903-1041 = D
Module 5	110	93	
Module 6	125	106	902- = F
Module 7	115	97	
Module 8	135	114	
Module 9	65	55	
Total:	870	736	
B. LEARNING ACTIVITIES			
Module 1	35	26	
Module 2	35	26	
Module 3	50	37	
Module 4	50	37	
Module 5	50	37	
Module 6	50	37	
Module 7	50	37	
Module 8	50	37	
Module 9	50	37	
Total:	420	311	
C. FINAL EXAMINATION	100	85	

Chapter 5

SUMMARY, FINDINGS, CONCLUSIONS, AND RECOMMENDATIONS

SUMMARY

The purpose of this study was to identify the most essential competencies needed by the prospective recreation leader who will be working with selected orthopedically handicapped individuals (arthritis, cerebral palsy, lower-extremity amputation, muscular dystrophy, and stroke) during professional preparation in field experiences I, II, and III.

A secondary purpose of the study was to develop contractual modules for the most essential competency in each of the nine areas of field experience I. Data accrued from field experiences II and III were analyzed as to mean and standard deviation values for each competency statement and placed in table form for future use as a basis for the development of modules for advanced field experiences.

Concomitant information of the survey which was used to test the basic assumptions of the study consisted of the respondents' ages, levels of educational preparation, levels

of affiliation with the National Therapeutic Recreation Society, employment status, and the major client/patient population in the settings surveyed having arthritis, cerebral palsy, lower-extremity amputation, muscular dystrophy and strokes.

Analysis of the data resulted in several normative and descriptive frequency distribution tables consisting of fifty-nine competency statements and eight questions designed to ascertain personal information on either the respondent or his duties.

The nine modules that were developed for field experience I were based on the most essential competencies in each of the nine competency areas of the questionnaire. The format for these modules was structured in a student manual form consisting of an introduction, purpose of the manual, educational goals, prerequisites for the course (field experience I), system of evaluation, process of remediation, and internal structure of the modules. Each module consists of learning activities in which the student contracts for a varied number of points in order to meet specified levels of proficiencies. Each learning activity was structured on various levels of learning hierarchies, mainly knowledge, comprehension, and application. Students are provided with several options to achieve the behavioral objectives of a module. Resource materials and their locations are listed at the end of each learning activity.

These learning aids consist of printed materials, films, video tapes, audio tapes, transparencies, slides, film strips, and names and places of individuals and therapeutic settings where information may be obtained. Formal class attendance is optional, but a minimal sum of contract points is set to encourage students to attend a reasonable number of class sessions and participate in the designed activities. In the event a student is unsuccessful in attaining the minimum level of proficiency for a module at the end of the contract period, he is required to engage in agreed-upon remedial learning activities to remove the identified deficiencies. In addition to obtaining a minimal level of proficiency (85% of possible points for a module), the student must also pass a comprehensive test with a 75 percent degree of proficiency based on the behavioral objectives and learning activities of the module. These criteria must be met before the contract is issued for a succeeding module. Upon successful completion of all modules, the student receives a letter grade based on his cumulative contract points as indicated in the contract evaluation chart.

FINDINGS

The following findings were revealed from this study:

Hierarchy of competencies. The statistical procedures used in this study produced an array of discrete data from which a heirarchy of competencies was identified for field experiences I, II, and III. The mean value for each competency (59), ranging from the most essential, competency 4, "Applications of ethical standards of the therapeutic recreation profession, mean value of 2.412, to the least essential, competency 49, "Knowledge of management and production of a T.V. program in relation to therapeutic recreation services," mean value of 1.245.

Consensus of most important competency in each competency area. Based on the respondents' professional and empirical experiences, the following competencies were identified as priorities for modular development:

1. Competency 4, "Application of ethical standard of the therapeutic recreation profession."

2. Competency 14, "Comprehension of the rationale for a 'team approach' and the role of therapeutic recreation within the team."

3. Competency 21, "Knowledge of normal biological growth and development and the structure and function of the human body."

4. Competency 28, "Comprehension of the symptoms that characterize biological and psychological dysfunction."

5. Competency 32, "Knowledge of basic communication theories and their application to the communication process."

6. Competency 38, "Knowledge of various leadership approaches and techniques."

7. Competency 43, "Knowledge of first aid and safety procedures and practices."

8. Competency 48, "Application of ability to utilize specific activities to meet the needs of the therapeutic recreation patient/client."

9. Competency 53, "Comprehension of organizational factors and resources required for a therapeutic recreation program."

Feasibility of modular development. In view of the information emanated from a review of the literature and the data which identified the most essential competencies, nine competency-based contract modules were developed and appraised by seven professional Allied Health administrators, consultants, and twelve students to be adequate for the purposes for which they were developed.

Adequacy of module behavioral objectives. As a result of the data collected from seven professionals and twelve students in the Allied Health area, the check list used showed that the behavioral objective item received a favorable rating from the seven professionals. A mean value of 3.66 was recorded. However, the consensus of the twelve students gave this item only a fair rating with a mean value of 2.94.

Percentages of selected orthopedic disabilities for various therapeutic recreation settings.

1. The highest percentage (55%) of therapeutic recreation leaders are employed in nursing homes.

2. Stroke patients are in the majority among the orthopedic population surveyed. Seventy-seven percent were located in nursing homes, and 23 percent in public schools of this study.

3. Twenty-two percent of the orthopedic disability population surveyed were arthritic patients/clients. Twenty-six percent were located in nursing homes.

4. A very low number of cerebral palsy patients/clients were identified by the respondents of the 67 settings surveyed; of the 105 patients/clients who reported, only 12 had cerebral palsy.

5. Muscular dystrophy and lower-extremity patients/clients were 16 percent each in the nursing home population, 45 and 22, respectively, in the community recreation center population, and 25 and 20 percent, respectively, in the public school settings.

Demographic data of the respondents. Female therapeutic recreation and activity leaders tend to be more favorably employed in nursing homes and school settings than men (see Table 13).

Men had a higher rate of employment in community recreation centers than women (see Table 13).

The age levels among nursing home respondents were higher than among community recreation center and public school respondents (see Table 14).

Fifty-five percent of the respondents indicated no affiliation with the National Therapeutic Recreation Society (see Table 15).

Eighty percent of the respondents had attained at least the bachelor's degree. Thirty (47%) were employed in nursing homes, 14 percent in community recreation centers, and 19 percent in public schools. Eleven percent of the nursing home respondents, 18 percent of the community recreation center respondents, and 29 percent of the public school respondents have master's degrees. The doctor's degree was not indicated by respondents in any of the three settings.

CONCLUSIONS

Based on the findings in this study, the following conclusions appear warranted.

Hierarchy of competencies. The competencies identified to be "essential," "important," "desirable," and "not important" were the avowed opinions of the respondents. In many instances the mean values which determined the rank order of the competencies were very close. This leads to the conclusion that the differences in importance between competencies ranked 1, 2, and 3 may be insignificant.

Feasibility of modular development. Based on the information received from the twelve students as results of the check list evaluation of the nine modules, it can be concluded that the module's feasibility of being acceptable to students as learning alternatives and functional in facilitating acquisition of the module's behavioral objectives are reasonably good. The premise for this deduction is predicated on the favorable mean values computed from the students' modular evaluation.

The seven professionals who viewed and evaluated the modules seemingly were in accord with the students' conceptualization of the module's significance as alternative teaching/learning techniques in field experience I of therapeutic recreation for the orthopedically handicapped. The mean values for most of the module's components were gratifyingly acceptable.

Adequacy of module behavioral objectives. In view of the findings in this study, the behavioral objectives warrant improvement in order to be comparable with the other components of the module's more favorable evaluations.

Percentages of selected orthopedic disabilities in various therapeutic recreation settings. A large percentage of the nursing home population are patients with strokes.

Second to cardiovascular attacks, patients with arthritis comprise the nursing home population.

Individuals with muscular dystrophy are found in larger numbers in nursing homes than in community recreation centers and school settings.

Cerebral palsy patients/clients are fewer in nursing homes, community recreation centers, and school settings than anticipated. Since no responses were received from two cerebral palsy settings to which questionnaire forms were sent and two unusable forms received from another, it can be concluded that the responses received are not reliable as to the number of cerebral palsy patients/clients in the area surveyed.

Demographic data of the respondents. Nursing homes tend to employ more women as therapeutic recreation leaders than men.

More men are employed in community recreation centers as activity leaders than women.

More older men and women are found employed in nursing homes as therapeutic recreation leaders than in community recreation centers and public schools.

More than half of the respondents are not affiliated with the National Therapeutic Recreation Society;. therefore, they are not expected to be knowledgeable of the latest innovations in therapeutic recreation leadership.

The majority of respondents had obtained the bachelor's degree, but compared to the time of attainments

there are indications of low probabilities that only a few, if any, received special training in therapeutic recreation.

In view of the paucity of this sampled population, it may be concluded that the above demographic findings could be evasive as a valid basis for student assignments. However, they warrant consideration in program development.

RECOMMENDATIONS

The program developer at the institution for which this study was intended (Shaw University) should give serious consideration to competency area 1 (Orientation to Therapeutic Recreation) and competency 14 (Application of Ethical Standards of the Therapeutic Recreation Profession), for it is of grave importance to the patient/client that the therapeutic recreation leader be a person of ethical character, knowing "what" to do, "how" to do it, "when" to do it, and can give justifiable reasons for "why" it was done in a particular way.

The program developer should give serious consideration to the theoretical and practical implications of all identified competencies in this study when structuring a comprehensive program in therapeutic recreation leadership.

To give more validity to the adequacy of the modules as developed in this study, they should be implemented and modified to meet the empirical needs of the practitioners.

Behavioral objectives should be constructed with greater relevancy to the specific needs of the practitioners once the modules have been field tested.

The college supervisor of field experience in therapeutic recreation should apprise the student of major types of orthopedic handicapped patients/clients in the population of nursing homes, community recreation centers, schools, and other therapeutic settings in which the student may be assigned. The student should be specifically prepared to meet the recreational needs of the large number of stroke and arthritic patients in nursing homes, the recreational needs of amputees, muscular dystrophy and cerebral palsy patients/clients in community recreation centers and schools.

The writer suggests the following implications for additional study in this area of curriculum development.

The developed modules should be field tested and a comparative study be made with other methods in use to provide professional experience for field experience in therapeutic recreation.

Competency-based contract modules for field experiences II and III should be undertaken and field tested before full implementation.

A study involving a larger population of orthopedically handicapped patients/clients should be made

to determine the overall competencies needed by the student during his field experiences.

APPENDIXES

APPENDIX A

LETTER OF PERMISSION

UNIVERSITY OF MARYLAND
Division of Human and Community Resources
COLLEGE OF PHYSICAL EDUCATION, RECREATION, AND HEALTH
College Park 20742

Department of Recreation

Phone: 301 - 454-2930
5621, 5622

Mr. William Spann
Post Office Box 4821
Middle Tennessee State University
Murfreesboro, Tennessee 37132

Dear Mr. Spann:

As per our recent telephone conversation, this letter is to inform you that the "competency survey questionnaire form" to which you refer in your letter of October 21, 1977, was produced under a grant from the Bureau of Education for the Handicapped, U.S., Office of Education and is, therefore, public domain. In accordance with Federal Copyright Laws, you are free to use the form in question as long as appropriate credits are given to the authors.

Sincerely,

/s/ Jerry Kelley

Jerry D. Kelley
Project Director

P.S. Please keep me informed of the progress of your study.

JDK:pb

APPENDIX B

SURVEY INSTRUMENT

COMPETENCY QUESTIONNAIRE

Please circle one answer for each question. Each question has three columns for job entry to: (a) field experience I, (b) field experience II, (c) field experience III.

If a competency is ESSENTIAL (E) for job entry to a field experience, circle 4

If a competency is IMPORTANT (I) for job entry to a field experience, circle 3

If a competency is DESIRABLE (D) for job entry to a field experience, circle 2

If a competency is NOT IMPORTANT (NI) for job entry to a field experience, circle .. 1

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
(The following thirteen competency statements are concerned with: ORIENTATION TO THERAPEUTIC RECREATION.)												
1. Comprenension of basic philosophical foundations and theories of play	4	3	2	1	4	3	2	1	4	3	2	1

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
2. Application of basic therapeutic recreation concepts and philosophies	4	3	2	1	4	3	2	1	4	3	2	1
3. Objective application of self in relationship to client regardless of socio-cultural factors and disabling conditions	4	3	2	1	4	3	2	1	4	3	2	1
4. Application of ethical standards of the therapeutic recreation profession	4	3	2	1	4	3	2	1	4	3	2	1
5. Knowledge of the history, and development of human ecology ...	4	3	2	1	4	3	2	1	4	3	2	1
6. Recognition of the value of professional societies, associations and organizations related to the therapeutic recreation field	4	3	2	1	4	3	2	1	4	3	2	1

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
7. Application of basic therapeutic recreation principles which are most effective in meeting client's needs	4	3	2	1	4	3	2	1	4	3	2	1
8. Ability to apply continuum concept to therapeutic recreation in relation to client progress	4	3	2	1	4	3	2	1	4	3	2	1
9. Comprehension of differentiation between process and service as it relates to therepeutic recreation	4	3	2	1	4	3	2	1	4	3	2	1
10. Comprehension of the therapeutic recreation process as it relates to specific client needs and to the setting in which the client is situated	4	3	2	1	4	3	2	1	4	3	2	1

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
11. Application of rehabilitation techniques in relationship to socio-recreational functioning	4	3	2	1	4	3	2	1	4	3	2	1
12. Application of personal commitment to the use of therapeutic recreation activities as modalities in the care and treatment of special populations	4	3	2	1	4	3	2	1	4	3	2	1
13. Application of self as a therapeutic agent in relationship to client symptomology	4	3	2	1	4	3	2	1	4	3	2	1

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
(The following seven competency statements are related to the areas of: AGENCIES, INSTITUTIONS, AND TEAMWORK.)												
14. Comprehension of the rationale for a "team approach" and the role of therapeutic recreation within the team ...	4	3	2	1	4	3	2	1	4	3	2	1
15. Application of the ability to relate the role of therapeutic recreation to client/ patient, colleagues, community groups and the public at large	4	3	2	1	4	3	2	1	4	3	2	1
16. Comprehension of the differentiation between therapeutic recreation, activity therapy and other allied health professions	4	3	2	1	4	3	2	1	4	3	2	1

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
17. Comprehension of role/ function of human delivery systems and their interrelation-ships with social science	4	3	2	1	4	3	2	1	4	3	2	1
18. Application of the ability to make proper contributions to staff conferences and other job related meetings	4	3	2	1	4	3	2	1	4	3	2	1
19. Knowledge of extra-mural (community) resources that may be utilized for providing services for the potential therapeutic recrea-tion client/patient	4	3	2	1	4	3	2	1	4	3	2	1
20. Application of skills as a therapeutic recrea-tion resource person for program and activity ideas	4	3	2	1	4	3	2	1	4	3	2	1

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
(The following five competency statements are related to: HUMAN GROWTH AND DEVELOPMENT.)												
21. Knowledge of normal biological growth and development and the structure and function of the human body	4	3	2	1	4	3	2	1	4	3	2	1
22. Knowledge of personality development and normal psychological functioning	4	3	2	1	4	3	2	1	4	3	2	1
23. Comprehension of hypnosis, psychoanalysis and dream theories that interpret problems of human growth and personality development	4	3	2	1	4	3	2	1	4	3	2	1

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
24. Knowledge of socio-cultural factors influencing human growth and devlopment	4	3	2	1	4	3	2	1	4	3	2	1
25. Knowledge of learning and adaptive processes in relationship to normal growth and development	4	3	2	1	4	3	2	1	4	3	2	1
(The following six competency statements are concerned with: DISABLING CONDITIONS.)												
26. Comprehension of the etiology of biological and psycho-social dysfunction	4	3	2	1	4	3	2	1	4	3	2	1
27. Under professional supervision, application of the knowledge of the etiology of biological and psycho-social dysfunction in relationship to client assessment	4	3	2	1	4	3	2	1	4	3	2	1

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
28. Comprehension of the symptoms that characterize biological and psycho-social dysfunction	4	3	2	1	4	3	2	1	4	3	2	1
29. Comprehension of social-cultural morphological theories that explain some aspects of abnormal behavior	4	3	2	1	4	3	2	1	4	3	2	1
30. Under supervision, application of client assessment data in stating treatment objectives	4	3	2	1	4	3	2	1	4	3	2	1
31. Application of client assessment data in provision of therapeutic recreation services	4	3	2	1	4	3	2	1	4	3	2	1
(The following five competency statements deal with the area of: COMMUNICATION.)												

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
32. Knowledge of basic communication theories and their application to the communication process	4	3	2	1	4	3	2	1	4	3	2	1
33. Application of various techniques of communication in therapeutic recreation	4	3	2	1	4	3	2	1	4	3	2	1
34. Application of dynamics of communication and interaction with clients	4	3	2	1	4	3	2	1	4	3	2	1
35. Knowledge of basic historical linguistic theories that underlie contemporary communications	4	3	2	1	4	3	2	1	4	3	2	1
36. The application of communication skills resulting from occupational expectations	4	3	2	1	4	3	2	1	4	3	2	1

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
(The following five competency statements are about: GROUP LEADERSHIP.)												
37. Knowledge of the nature of groups and group process	4	3	2	1	4	3	2	1	4	3	2	1
38. Knowledge of various leadership approaches and techniques	4	3	2	1	4	3	2	1	4	3	2	1
39. Application of principles and practices of professional personnel recruitment, development, supervision and evaluation	4	3	2	1	4	3	2	1	4	3	2	1
40. Application of various leadership styles and methods	4	3	2	1	4	3	2	1	4	3	2	1

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
41. Comprehension of personal leadership style as it effects individual and group behavior	4	3	2	1	4	3	2	1	4	3	2	1
(The following five competency statements are related to the area of: ACTIVITY SKILL.)												
42. Application of basic techniques and skills required for participation in various therapeutic activities	4	3	2	1	4	3	2	1	4	3	2	1
43. Knowledge of first aid and safety procedures and practices	4	3	2	1	4	3	2	1	4	3	2	1
44. Application of leadership skills in activities to be included in the therapeutic recreation program	4	3	2	1	4	3	2	1	4	3	2	1

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
45. Knowledge of mechanical and electric engineering which is useful in designing and developing various media equipment which may be used for recreation programming	4	3	2	1	4	3	2	1	4	3	2	1
46. Application of skills required to prepare, adapt, operate and maintain equipment, supplies, and other materials utilized for therapeutic recreation programming	4	3	2	1	4	3	2	1	4	3	2	1
(The next four competency statements are concerned with the areas of: ACTIVITY ANALYSIS AND ADAPTATION.)												

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
47. Knowledge of the inherent characteristicts and functional differentiation of activities as applied to selection for client/patient participation	4	3	2	1	4	3	2	1	4	3	2	1
48. Application of ability to utilize specific activities, to meet the needs of the therapeutic recreation patient/ client	4	3	2	1	4	3	2	1	4	3	2	1
49. Knowledge of management and production of a T.V. program in relation to therapeutic recreation services	4	3	2	1	4	3	2	1	4	3	2	1

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
50. Application of the ability to select, adapt and modify activities for maximizing participation and attainment of objectives	4	3	2	1	4	3	2	1	4	3	2	1
(The following nine competency statements are related to the areas of: PROGRAM PLANNING AND DEVELOPMENT.)												
51. Application of program planning principles and client assessment data in the provision of comprehensive therapeutic recreation programs	4	3	2	1	4	3	2	1	4	3	2	1
52. Comprehension of the need for client/ patient involvement in activity selection and program development	4	3	2	1	4	3	2	1	4	3	2	1

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
53. Comprehension of organizational factors and resources required for a therapeutic recreation program	4	3	2	1	4	3	2	1	4	3	2	1
54. Flexibility in application of new and emerging procedures, practices and approaches applicable to client/patient programming	4	3	2	1	4	3	2	1	4	3	2	1
55. Application of organizational skills which include gathering information and resources	4	3	2	1	4	3	2	1	4	3	2	1
56. Application of the ability to write and implement schedules for therapeutic recreation programs	4	3	2	1	4	3	2	1	4	3	2	1

	Field Experience I				Field Experience II				Field Experience III			
	E	I	D	NI	E	I	D	NI	E	I	D	NI
57. Application of knowledge of when and how to initiate and terminate treatment intervention, in relationship to individual patient pathology	4	3	2	1	4	3	2	1	4	3	2	1
58. Application of the knowledge of recreation facilities and areas including care and use of equipment and supplies related to them	4	3	2	1	4	3	2	1	4	3	2	1
59. Application of evaluation criteria and processes as related to client assessment data and on-going therapeutic recreation programs	4	3	2	1	4	3	2	1	4	3	2	1

Finally, we would like to have some general information about you to permit us to group your answers with those of other respondents.

60. What is your sex? Female 1

Male 2

61. In what year were you born? ..... 19____

62. What is your highest degree? ..... High School Diploma 1

Associate Degree 2

Bachelor's Degree 3

Master's Degree 4

Doctorate 5

63. At which level are you registered in National Therapeutic Recreation Society? ..... Assistant 1

Technician (Leader) 2

Worker 3

Specialist 4

Master Specialist 5

64. Are you currently employed? ..... Yes 1

No (Skip to Question 68) ... 2

65. What is your job title? ..... _____

66. What is the major client population that you work with? ..... Arthritis 1

Cerebral Palsy 2

Lower Extremity Amputees ... 3

Muscular Dystrophy 4

Stroke 5

Other (Please specify)

_____

67. Please describe briefly the nature of your job _____

_____

68. Thank you for completing the questionnaire. Please return it in the enclosed postpaid envelope. Thank you again.

APPENDIX C

DATA FOR COMPETENCY AREAS 1 THROUGH 9

Competency Area 1: Orientation to Therapeutic Recreation

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
1. Comprehension of basic philosophical foundations and theories of play	63	143	2.269	3	1	1.184	8	3
2. Application of basic therapeutic recreation concepts and philosophies	63	126	2.000	2	2	1.038	27	12
3. Objective application of self in relationship to client regardless of soci-cultural factors and disabling conditions	63	140	2.206	2	2	.978	12	4
*4. Application of ethical standards of the therapeutic recreation profession	63	152	2.412	3	2	1.063	1	1
5. Knowledge of the history and development of human ecology	63	125	1.984	2	2	.701	38	13

*Based on the mean, the most essential competency in Area 1.

Competency Area 1 (continued)

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
6. Recognition of the value of professional societies, associations, and organizations related to the therapeutic recreation field	63	132	2.095	2	2	.749	20	8
7. Application of basic therapeutic recreation principles which are most effective in meeting clients' needs	63	131	2.079	2	2	.719	25	9
8. Ability to apply continuum concept to therapeutic recreation in relation to client progress	63	131	2.079	2	2	.719	26	10
9. Comprehension of differentiation between process and service as it relates to therapeutic recreation	63	137	2.174	2	2	.900	15	5
10. Comprehension of the therapeutic recreation process as it relates to specific client needs and to the setting in which the client is situated	63	144	2.285	2	2	.824	6	2

Competency Area 1 (continued)

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
11. Application of rehabilitation techniques in relationship to socio-recreational functioning	63	144	2.142	2	2	.851	17	6
12. Application of personal commitment to the use of therapeutic recreation activities as modalities in the care and treatment of special populations	63	134	2.126	2	2	.899	18	7
13. Application of self as a therapeutic agent in relationship to client smyptomology	63	127	2.015	2	2	.889	35	11

Competency Area 2: Agencies, Institutions and Teamwork

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
*14. Comprehension of the rationale for a "team approach" and the role of therapeutic recreation within the team	63	146	2.317	2	2	.905	3	1
15. Application of the ability to relate the role of therapeutic recreation to client/ patient, colleagues, community groups, and the public at large	63	137	2.174	2	2	.767	13	3
16. Comprehension of the differentiation between therapeutic recreation, activity therapy, and other allied professions	63	180	2.285	2	2	.824	7	2
17. Comprehension of role/ function of human delivery systems and their interrelationships with social science	63	128	2.031	2	2	.775	33	5

*Based on the mean, the most essential competency in Area 2.

Competency Area 2 (continued)

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
18. Application of the ability to make proper contributions to staff conferences and other job-related meetings	63	115	1.825	2	2	.793	48	6
19. Knowledge of extramural (community) resources that may be utilized for providing services for the potential therapeutic recreation client/patient	63	130	2.063	2	2	.731	31	4
20. Application of skills as a therapeutic recreation resource person for program and activity ideas	63	125	1.984	2	2	.786	40	5

Competency Area 3: Human Growth and Development

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
*21. Knowledge of normal biological growth and development and the structure and function of the human body	63	145	2.301	2	2	.986	4	1
22. Knowledge of personality development and normal psychological functioning	63	144	2.285	2	2	.743	5	2
23. Comprehension of hypnosis, psychoanalysis, and dream theories that interpret problems of human growth and personality development	63	93	1.476	2	1	.686	57	5
24. Knowledge of sociocultural factors influencing human growth and development	63	130	2.063	2	2	.613	30	4

*Based on the mean, the most essential competency in Area 3.

Competency Area 3 (continued)

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
25. Knowledge of learning and adaptive processes in relationship to normal growth and development	63	141	2.238	2	2	.683	9	3

Competency Area 4: Disabling Conditions

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
26. Comprehension of the etiology of biological and psycho-social dysfunction	63	127	2.015	2	2	.806	34	3
27. Under professional supervision, application of the knowledge of the etiology of biological and psycho-social dysfunction in relationship to client assessment	63	118	1.873	2	2	.826	47	6
*28. Comprehension of the symptoms that characterize biological and psycho-social dysfunction	63	131	2.079	2	2	.802	25	1
29. Comprehension of social-cultural morphological theories that explain some aspects of abnormal behavior	63	121	2.078	2	2	.841	29	2

*Based on the mean, the most essential competency in Area 4.

Competency Area 4 (continued)

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
30. Under supervision, application of client assessment data in stating treatment objectives	63	124	1.968	2	2	.775	44	5
31. Application of client assessment data in provision of therapeutic recreation services	63	124	1.967	2	2	.775	44	5

Competency ARea 5: Communication

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
*32. Knowledge of basic communication theories and their application to the communication process	63	132	2.095	2	2	.817	21	1
33. Application of various techniques of communication in therapeutic recreation	63	121	1.920	2	1	.930	46	3
34. Application of dynamics of communication and interaction with clients	63	132	2.095	2	2	.849	23	2
35. Knowledge of basic historical linguistic theories that underlie contemporary communications	63	108	1.718	2	1	.874	56	5
36. The application of communication skills resulting from occupational expectations	63	113	1.793	2	2	.759	51	4

*Based on the mean, the most essential competency in Area 5.

Competency Area 6: Group Leadership

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
37. Knowledge of the nature of groups and the group process	63	132	2.095	2	2	.683	24	2
*38. Knowledge of various leadership approaches and techniques	63	137	2.174	2	2	.807	14	1
39. Applications of principles and practices professional personnel recruitment, development, supervision, and evaluation	63	109	1.730	2	1	.839	55	5
40. Application of various leadership styles and methods	63	110	1.746	2	2	.665	53	4
41. Comprehension of personal leadership style as it affects individual and group behavior	63	131	2.079	2	2	.782	27	3

*Based on the mean, the most essential competency in Area 6.

Competency Area 7: Activity Skill

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
42. Application of basic techniques and skills required for participation in various therapeutic activities	63	141	2.238	2	2	.903	10	2
*43. Knowledge of first aid and safety procedures and practices	63	146	2.317	2	2	.887	2	1
44. Application of leadership skills in activities to be included in the therapeutic recreation program	63	130	2.063	2	2	.906	32	3
45. Knowledge of mechanical and electrical engineering useful in designing and developing various media equipment which may be used for recreation programming	63	92	1.460	2	1	.529	58	5

*Based on the mean, the most essential competency in Area 7.

Competency Area 7 (continued)

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
46. Application of skills required to prepare, adapt, operate, and maintain equipment, supplies, and other materials utilized for therapeutic recreation programming	63	114	1.809	2	2	.731	50	4

Competency Area 8: Activity Analysis and Adaptation

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
47. Knowledge of the inherent characteristics and functional differentiation of activities as applied to selection for client/patient participation	63	114	1.810	2	2	.813	49	3
*48. Application of ability to utilize specific activities to meet the needs of the therapeutic recreation patient/client	63	135	2.142	2	2	.686	16	1
49. Knowledge of management and production of a TV program in relation to therapeutic recreation services	63	78	1.245	2	1	.579	59	4
50. Application of the ability to select, adapt, and modify activities for maximizing participation and attainment of objectives	63	126	2.000	2	2	.796	36	2

*Based on the mean, the most essential competency in Area 8.

Competency Area 9: Program Planning and Development

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
51. Application of program planning principles and client assessment data in the provision of comprehensive therapeutic recreation programs	63	124	1.968	2	2	.775	43	6
52. Comprehension of the need for client/ patient involvement in activity selection and program development	63	133	2.111	2	2	.715	19	2
*53. Comprehension of organizational factors and resources required for a therapeutic recreation program	63	140	2.222	2	2	.765	11	1
54. Flexibility in application of new and emerging procedures, practices, and approaches applicable to client/ patient programming	63	125	1.984	2	2	.766	39	4

*Based on the mean, the most essential competency in Area 9.

Competency Area 9 (continued)

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
55. Application of organizational skills which include gathering information and resources	63	132	2.095	2	2	.830	22	3
56. Application of the ability to write and implement schedules for therapeutic recreation programs	63	112	1.777	2	1	.805	52	8
57. Application of knowledge of when and how to initiate and terminate treatment intervention, in relationship to individual patient pathology	63	109	1.730	2	2	.694	54	9
58. Application of the knowledge of recreation facilities and areas including care and use of equipment and supplies related to them	63	123	1.952	2	2	.862	45	7

Competency Area 9 (continued)

Competency	N	ΣV	$\bar{X}$	Mdn	Mde	S.D.	RAOI	RWA
59. Application of evaluation criteria and process as related to client assessment data and on-going therapeutic recreation programs	63	124	1.971	2	2	.741	41	5

Interpretation of Symbols and Abbreviations in Competency Areas 1 Through 9

N = Total number of therapeutic recreation leaders and activity directors presently employed in nursing homes, community recreation centers, and schools who returned usable survey forms.

ΣV = Sum of competency values for field experience I as evaluated by nursing home, community center, and school practitioners.

Example:

A. Nursing home practitioners' evaluation of field experience I, competency 1:

	Item Value	Responses	Sum of Values
Essential	4	7	28
Important	3	6	18
Desirable	2	8	16
Not Important	1	15	15
		Total	77

B. Community recreation center practitioners' evaluation of field experience I, competency 1:

Essential	4	2	8
Important	3	6	18
Desirable	2	2	4
Not Important	1	1	1
		Total	31

C. School practitioners' evaluation of competency 1, field experience I:

	Item Value	Responses	Sum of Values
Essential	4	5	20
Important	3	1	3
Desirable	2	2	4
Not Important	1	9	9
		Total	36

Sum of competency values (ΣV) = 143

$\bar{X}$ = The mean (average value for competency values

Mdn = Median value for competency values

Mde = Mode for competency values

S.D. = Standard deviation for competency values

RAOI = Rank among other competencies' items

RWA = Rank of a competency within one of the nine areas:

Area 1: Orientation to therapeutic recreation

Area 2: Agencies, Institutions, and Teamwork

Area 3: Human Growth and Development

Area 4: Disabling Conditions

Area 5: Communication

Area 6: Group Leadership

Area 7: Activity Skill

Area 8: Activity Analysis and Adaptation

Area 9: Program Planning and Development

APPENDIX D

PROFESSIONAL RESPONDENTS OF MODULE EVALUATION

PROFESSIONAL RESPONDENTS OF MODULE EVALUATION

Mr. Randall Anthony
Director Therapeutic Recreation
Veterans Administration
Murfreesboro, Tennessee 37130

Dr. Lavonia Allison
Director, N.C. Health Manpower Development Program
University of North Carolina--Chapel Hill
Chapel Hill, North Carolina 27514

Dr. Ronald Brown
Adaptive Physical Education
North Carolina Central University
Durham, North Carolina 27705

Dr. Claude Flythe
Athletic Director
Department of Health, Physical Education, Recreation and Athletics
Virginia State College
Petersburg, Virginia

Mrs. Ruth Miles
Consultant/Nursing Homes and Immediate Care Facilities
Department of Human Resources
1330 St. Mary's Street
Raleigh, North Carolina

Dr. Roy D. Moore
Director of Health, Physical Education and Recreation
A & T State University
Greenboro, North Carolina 27420

Dr. Randolph Tobias
Director of Teacher Education
Winston-Salem State University
Winston-Salem, North Carolina 27106

APPENDIX E

CHECK LIST FOR EVALUATING TEACHER-MADE MODULES

CHECK LIST FOR EVALUATING TEACHER-MADE MODULES

Directions: Enter a score of 0 to 4 next to the corresponding criterion in order to quantify your qualitative judgment of each module (1-9). Use the scores as follow:

4 = excellent

3 = good

2 = fair

1 = poor (but adequate for student use and feedback)

0 = not present (or not acceptable for student trial)

	Modules								
	1	2	3	4	5	6	7	8	9
Purpose of the Module (Rationale)									
1. Is the topic of the module clearly states?									
2. Is the reason for studying the module clearly explained?									
3. Is the language simple and clear?									

	Modules								
	1	2	3	4	5	6	7	8	9
Behavioral Objectives									
4. Are the behavioral objectives educationally significant?									
5. Is each behavioral objective stated in measurable (observable) terms?									
6. Is each behavioral objective limited enough to be attained during a brief learning unit?									
7. Is each behavioral objective relevant to a more general (terminal) course objective?									
Prerequisites									
8. If prerequisites are stated, are they logical requirements which should precede the stated terminal objectives of this module?									
9. Can participants logically be expected to have attained prerequisites prior to beginning this module?									

	Modules								
	1	2	3	4	5	6	7	8	9
Learning Activities									
10. Are the directions for procedures clearly stated?									
11. Do the learning activities provide alternate procedures for achieving the behavioral objectives?									
12. Are activities appropriate to individual learner readiness and background?									
13. Is there a variety of types and levels of learning materials?									
Post-Assessment									
14. Are the directions clearly stated?									
15. Do the test items call for behaviors identical to the action terms in the behavioral objectives?									
16. Has a reasonable standard of mastery been set?									

	Modules								
	1	2	3	4	5	6	7	8	9
Remediation									
17. Do the learning activities provide alternating procedures for achieving the instructional objectives after the initial attempt?									
Resource Materials									
18. Do the materials and activities contribute to achievement of the behavioral objectives?									
19. Have materials and activities been provided for the student who learns best by visual means? By oral-aural means? By physical means?									
20. Is there sufficient range of difficulty in the materials and activities listed?									

APPENDIX F

FILM REVIEW FORM

FILM REVIEW FORM

NAME:_____MODULE #_____

TITLE OF FILM:_____

Major points stressed in film:

1.

2.

3.

4.

5.

What did you like best about the film? Discuss.

What did you like least about the film? Discuss.

Please rate this film in terms of the following factors:

Check One	(1)	(2)	(3)	(4)	(5)
A. Content in Relation to Title	( )	( )	( )	( )	( )
B. Effectiveness	( )	( )	( )	( )	( )
C. Quality of Presentation	( )	( )	( )	( )	( )

1 = Excellent 3 = Satisfactory 5 = Very Poor

2 = Good 4 = Poor

APPENDIX G

NURSING HOMES

NURSING HOMES

1. Glenwood Hills, I.C.F.
   Mr. Darrel C. Watson, Adm.
   3910 Blue Ridge Road
   Raleigh, N.C. 27612

2. Health Care Center of Raleigh, Inc.
   Mr. Arthur T. Brooks, Adm.
   3000 Holston Lane
   Raleigh, N.C. 27610
   N-IC. 125
   (919) 828-3904

3. Hillhaven Convalescent Center
   Mrs. Rae McMillan, Adm.
   616 Wade Avenue
   Raleigh, N.C. 27605
   N-Sc. 116; N-IC. 58
   (919) 828-6251

4. Hillhaven Sunnybrook Convalescent Center
   Mr. Gary Witts, Adm.
   25 Sunnybrook Road
   Raleigh, N.C. 27610
   N-SC. 61; N-IC. 65
   (919) 828-0747

5. Knoolwood Manor, I.C.F.
   Mrs. Rachel A. Brantley, Adm.
   4809 North Boulevard
   Raleigh, N.C. 27604
   N-IC. 108
   (919) 876-4613

6. Mayview Convalescent Home, Inc.
   Mr. Travis H. Tomlinson, Adm.
   513 East Whitaker Mill Road
   Raleigh, N.C. 27608
   N-SC. 139; HA. 6
   (919) 828-2348

7. Kinton Nursing Home
   Mrs. Ruth C. Kinton, Adm.
   415 Sunset Drive, P.O. Box 528
   Fuquay-Varina, N.C. 27526
   N-IC. 49; HA. 31
   (919) 552-5188 or 552-5609

APPENDIX H

FIELD EXPERIENCE II DATA

Mean Values and Standard Deviations for
Field Experience II Competencies

Competency	$\bar{X}$	S.D.
1	3.523	.587
2	3.650	.567
3	3.492	.663
4	3.650	.539
5	3.349	.693
6	3.428	.609
7	3.777	.415
8	3.650	.508
9	3.365	.598
10	3.603	.550
11	3.523	.638
12	3.698	.492
13	3.523	.559
14	3.619	.547
15	3.666	.503
16	3.460	.662
17	3.317	.708
18	3.492	.559
19	3.682	.529
20	3.777	.415
21	3.634	.513
22	3.634	.513

Mean Values and Standard Deviations for
Field Experience II Competencies
(continued)

Competency	$\bar{X}$	S.D.
23	2.793	.817
24	3.539	.612
25	3.539	.686
26	3.428	.659
27	3.507	.613
28	3.587	.553
29	3.412	.633
30	3.634	.543
31	3.746	.470
32	3.619	.575
33	3.444	.557
34	3.507	.687
35	2.930	.940
36	3.444	.792
37	3.730	.510
38	3.656	.536
39	3.380	.602
40	3.507	.709
41	3.682	.586
42	3.841	.365
43	3.682	.498
44	3.523	.499

Mean Values and Standard Deviations for
Field Experience II Competencies
(continued)

Competency	$\bar{X}$	S.D.
45	2.761	.937
46	3.476	.613
47	3.714	.485
48	3.761	.425
49	2.428	1.034
50	3.793	.404
51	3.746	.435
52	3.523	.587
53	3.634	.571
54	3.619	.517
55	3.492	.559
56	3.539	.586
57	3.634	.598
58	3.619	.517
59	3.650	.476

APPENDIX I

FIELD EXPERIENCE III DATA

Mean Values and Standard Deviations for
Field Experience III Competencies

Competency	$\bar{X}$	S.D.
1	2.952	.764
2	2.904	.635
3	3.031	.616
4	3.222	.677
5	2.677	.594
6	2.765	.655
7	3.015	.723
8	2.95	.602
9	2.887	.720
10	3.098	.592
11	2.968	.621
12	3.047	.628
13	2.936	.634
14	3.026	.634
15	3.110	.598
16	3.031	.641
17	2.761	.609
18	2.888	.620
19	3.031	.562
20	2.968	.562
21	3.079	.649
22	3.095	.494

Mean Values and Standard Deviations for
Field Experience III Competencies
(continued)

Competency	$\bar{X}$	S.D.
23	2.365	.696
24	2.936	.587
25	3.015	.604
26	2.825	.724
27	2.857	.709
28	2.873	.701
29	2.873	.678
30	2.888	.645
31	2.968	.689
32	2.968	.616
33	2.841	.647
34	2.952	.699
35	2.428	.791
36	2.714	.705
37	3.000	.563
38	2.920	.327
39	2.825	.630
40	2.492	.753
41	2.936	.663
42	3.095	.583
43	3.142	.587
44	2.920	.624

Mean Values and Standard Deviations for
Field Experience III Competencies
(continued)

Competency	$\bar{X}$	S.D.
45	2.158	.820
46	2.761	.583
47	2.873	.577
48	3.047	.575
49	1.952	.915
50	3.031	.616
51	3.031	.562
52	2.952	.676
53	3.047	.602
54	2.968	.590
55	2.873	.654
56	2.761	.683
57	2.746	.641
58	2.968	.616
59	3.000	.534

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