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DAMER, LINDA KAY

A STUDY OF ATTITUDES OF SELECTED PUBLIC  
SCHOOL MUSIC TEACHERS TOWARD THE INTEGRATION  
OF HANDICAPPED STUDENTS INTO MUSIC CLASSES.

THE UNIVERSITY OF NORTH CAROLINA AT  
GREENSBORO, ED.D., 1979

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A STUDY OF ATTITUDES OF SELECTED PUBLIC SCHOOL  
MUSIC TEACHERS TOWARD THE INTEGRATION  
OF HANDICAPPED STUDENTS INTO  
MUSIC CLASSES

by

Linda Kay Damer

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Approved by

Walter L. Latham  
Dissertation Adviser

APPROVAL PAGE

This dissertation has been approved by the following committee  
of the Faculty of the Graduate School at the University of North  
Carolina at Greensboro.

Dissertation  
Adviser

Walter R. Wehner

Committee Members

James W. Shubin

William Almon

Ann R. Small

Bahad Cox

Fritz Menger

May 4, 1979

Date of Acceptance by Committee

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Public Law 94-142, Education of the Handicapped Act, mandates that handicapped students be educated, to the maximum extent possible, in the regular classroom with children who are not handicapped. Because of the association of music with therapy, it seems probable that the music classroom will be one area in which handicapped children will be placed with nonhandicapped children.

A review of the literature reveals that many educators believe that successful implementation of mainstreaming handicapped children into regular classes may be dependent upon the attitudes of the teacher. The purposes of this study were, first, to assess the attitudes of selected North Carolina public school music educators toward mentally and physically handicapped students, and second, to determine their willingness to have these students mainstreamed or integrated into their music classes. The research questions investigated were: (1) Are there differences in attitudes expressed by the music educators as a function of age, sex, years of teaching experience, educational level, previous experience with handicapped students, course work and training in areas of exceptionality, or area of teaching responsibility? (2) Is strength of opinion related to years of teaching experience, previous experience with handicapped students, or with course work and training in areas of exceptionality? (3) Are teachers from any one area of teaching responsibility more willing to accept handicapped students into their music classes or performance groups?

Subjects for the study were public school music teachers in the Greensboro, North Carolina city school system, the Guilford County, North Carolina school system, and the Burlington, North Carolina city school system.

The attitudinal instrument, Attitudes Toward Handicapped Students (ATHS), developed by the researcher, contained 36 statements concerning physically handicapped and mentally retarded students. Through factor analysis twelve factors were identified. Factor scores were computed for each respondent. These scores served as the expressed attitudes for each subject. Biographical information and data concerning each respondent's experience with handicapped persons were gathered via the Personal Questionnaire. Analysis of variance procedures were employed to investigate the first research question. Although there were some statistically significant associations, there was no general trend which could be interpreted as any of the identified variables contributing systematically to the expressed attitudes toward handicapped students. There were no significant correlations between the factor scores and experience with handicapped persons.

Correlation procedures were used to investigate the second research question. No significant correlations were found between strength of opinion and years of teaching experience, previous experience with handicapped students, or course work and training in areas of exceptionality.

Descriptive data were examined in order to answer research question 3. Elementary general music teachers were the most willing to have handicapped students mainstreamed into their classrooms. The junior high general music teachers were next. Both junior high and secondary instrumental teachers

were more open to mainstreaming handicapped students into their performance groups than were junior high and secondary choral teachers. Ninety-one percent of the respondents expressed the belief that physically handicapped students should be mainstreamed into music classes. Sixty-eight percent indicated that mentally retarded students should be mainstreamed into music classes. The responding music teachers generally expressed accepting attitudes toward handicapped students as measured by the ATHS.

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CHAPTER I  
INTRODUCTION

The public education of children with special needs has become a prominent educational issue with the passage of the federal Education of the Handicapped Act (Public Law 94-142). The act became effective October 1, 1977. The state educational institutions were expected to comply fully with the provisions of the act by September 1, 1978.

Definition of Terms

Handicapped. The term includes students who are blind, partially blind, deaf, partially deaf, orthopedically impaired, spastic, speech/language impaired, learning disabled, and those who have other health impairments. The term also includes mentally retarded students who are significantly below average in general intellectual functioning with deficits in adaptive behavior which are manifested during the developmental period and which adversely affect a child's educational performance (Federal Register, 1977, p. 42478).

Mainstreaming. Mainstreaming is the placement of or integration of students who have identified special needs into an educational setting with nonhandicapped students.

Individualized Education Program (IEP). The IEP is a written statement for a handicapped child which includes (1) a statement of the child's present level of educational performance, (2) a statement of annual goals, including short-term instructional objectives, (3) a statement of special education and related services to be provided the child and

the extent to which the child will participate in regular education programs, (4) projected date for initiation of services and the anticipated duration of the services, and (5) appropriate evaluative procedures (Federal Register, 1977, p. 42491).

#### Educational Setting for Handicapped Students

One aspect of Public Law 94-142 which seems to be of great concern to public school teachers is the educational setting for handicapped children. The act provides that "all handicapped children have the right to a free appropriate public education" (Federal Register, p. 42481). The act further sets forth that each state educational agency shall insure:

(1) That to the maximum extent appropriate, handicapped children, including children in public or private institutions or other care facilities, are educated with children who are not handicapped, and

(2) That special classes, separate schooling or other removal of handicapped children from the regular educational environment occurs only when the nature or severity of the handicap is such that education in regular classes with the use of supplementary aids and services cannot be achieved satisfactorily. (p. 42497)

Paragraph 121a.551 suggests that the state educational agency must make available a continuum of alternative placements to meet the needs of handicapped children for special education and related services. These alternative placements must include regular classes, special classes, special schools, home instruction, and instruction in hospitals and institutions. In addition, there must be provision for supplementary services, such as resource rooms or itinerant instruction, to be provided in conjunction with regular class placement.

Provisions for the educational placement of the handicapped child mandate that:

- (a) Each handicapped child's educational placement:
  - (1) Is determined at least annually,
  - (2) Is based on his or her individualized education program (IEP), and
  - (3) Is as close as possible to the child's home;
- (b) The various alternative placements included under §121a.551 are available to the extent necessary to implement the individualized education program for each handicapped child;
- (c) Unless a handicapped child's individualized education program requires some other arrangement, the child is educated in the school which he or she would attend if not handicapped; and
- (d) In selecting the least restrictive environment, consideration is given to any potential harmful effect on the child or on the quality of service which he or she needs. (p. 42497)

The Federal Register includes extrastatutory comments which are pertinent to this issue. The analysis of the regulations for Section 504 of the Rehabilitation Act of 1973 states:

1. With respect to determining proper placements, the analysis states: ". . . it should be stressed that, where a handicapped child is so disruptive in a regular classroom that the education of other students is significantly impaired, the needs of the handicapped child cannot be met in that environment. Therefore regular placement would not be appropriate to his or her needs. . . ."
2. With respect to placing a handicapped child in an alternative setting, the analysis states that among the factors to be considered in placing a child is the need to place the child as close to home as possible. Recipients are required to take this factor into account in making placement decisions. (p. 42497)

The federal act further mandates that for nonacademic and extra-curricular services and activities, including meals and recess periods, "each handicapped child participates with nonhandicapped children in those services to the maximum extent appropriate to the needs of that child" (p. 42497).

The U.S. Office of Education attempted to seek public participation in the development of regulations to implement the federal act. In response to comments concerning the "least restrictive setting," a House Committee response stated:

The Committee urges that where possible and where most beneficial to the child, special educational services be provided in a classroom situation. An optimal situation, of course, would be one in which the child is placed in a regular classroom. The Committee recognizes that this is not always the most beneficial place of instruction.

When it is clear that, because of the nature of or severity of a child's handicap, the child must be educated in a setting other than the regular class, it is appropriate to implement such a placement. (p. 42513)

The interpretation and implementation of the statutes which outline the educational setting for handicapped children is of concern to public school teachers. What will be the level of handicap severity which a child can have to be mainstreamed into the regular classroom setting? What will be the nature of the support services which will help the teacher adequately educate the handicapped child without detracting from the educational setting for the nonhandicapped children in the classroom? Will the teacher have the personal teaching skills needed to deal effectively with a wide range of handicaps?

Public school music teachers will be affected by these statutes. The Federal Register specifically mentions music in two places. In paragraph 121a.13 the related services which must be provided are suggested. Although music is not mentioned in this list, the Senate Report No. 94-168, p. 12 (1975) states:

The list of related services is not exhaustive and may include other developmental, corrective, or supportive services (such as artistic and cultural programs, and art, music, and dance therapy), if they are required to assist a handicapped child to benefit from special education. (p. 42480)

Paragraph 121a.305, Program Options, provides that each public agency shall take steps to insure that its handicapped children have available to them a variety of educational programs and services available to nonhandicapped children in the area served by the agency, including art, music, industrial arts, consumer and homemaking education, and vocational education. (p. 42489)

In another section of the Senate Report on Public Law 94-142, the arts are singled out for inclusion:

The use of the arts as a teaching tool for the handicapped has long been recognized as a viable, effective way not only of teaching special skills, but also of reaching youngsters who had otherwise been unteachable. The Committee envisions that programs under this bill could well include an arts component and, indeed, urges that local educational agencies include the arts in programs for the handicapped funded under this Act. Such a program could cover both appreciation of the arts by the handicapped youngster, and the utilization of the arts as a teaching tool per se. (p. 42488)

### Music and Therapy

Music educators have for many years recognized the ability of music to reach students who are outside the range of normalcy. Cruickshank (1955) stresses that handicapped children must first be treated as children, considering their normative growth and development (p. vii). Dreikurs (1952) affirms that each child has the right to be understood as a unique individual and not to be compared to any other. In group music experiences, differences in children become shallow and insignificant. Dreikurs asserts: "No exceptional child can remain exceptional, irrespective of his individual ability or deficiency which outside of this [music] experience distinguishes him from others" (p. 46). "All children," states Gaston (1958),

handicapped and well, have similar emotional needs, although in the handicapped the expression of these may be distorted. The intelligent use of music with the handicapped will be enhanced because of these similar needs. Music, as a modality, will help to accomplish the necessary gratification of them. (p. 296)

Gaston suggests a number of reasons why music can be effectively used with handicapped children. Music can be a nonverbal means of communication (p. 297). Howery (1968) believes that the nonverbal character of music may serve as an opening wedge in reaching the



mentally retarded. The inability of many retardates to express verbal communication necessitates finding avenues of socially acceptable means of communicating feelings, and Howerly suggests that music can do this. Music affords interaction at a nonverbal level and permits acceptable and successful nonthreatening participation at varying levels of ability (pp. 50-51). Crawfis (1952), too, emphasizes the use of music as a means of communication to get through the patient's "wall of defense," to reach those who cannot be reached by the spoken word (p. 66).

Music is the most adaptable of the arts in that it can be effectively used in a variety of settings: with individuals or in groups, indoors or outdoors, by boys or by girls. Music is the most pervasive of the arts because of its vibratory sensations. The body cannot totally exclude the sensory reception of music (Gaston, p. 298). Research has demonstrated the power of music to influence emotional behavior and various psychological and physiological processes. Schneider (1954) investigated functional uses of music with brain-damaged children: five classed as athetoids and five as spastic. The children diagnosed as spastics evidenced varying degrees of relaxation while influenced by stimulative music--fast tempo, marked rhythm, and staccato style. The relaxed state effected less jerking of the body, less drooling, less sliding in chairs, and greater control in psychomotor performance. However, those children diagnosed as athetoids usually evidenced states of relaxation while listening to sedative music. While influenced by sedative music, "the motor behavior in quiet listening or while performing simple psychomotor tasks did not appear as grotesque or as forceful as when not under the stimulus of music" (pp. 96-97).

Music is capable of dissipating feelings of isolation. It can, for example, contribute to the development of a positive attitude on the part of handicapped children toward the therapeutic setting or on the part of a new child toward an unfamiliar school. Some handicapped children remain aloof from their peers or teachers. Closeness is threatening. In such cases, music may be the most effective medium of establishing contact with the child (Gaston, pp. 298-300). Pierce (1934) believes that music as a cooperative effort may help to break down the feeling of isolation that is common to mental disease (p. 142).

Participation in the performance of music gives the performer a feeling of accomplishment and gratification. Handicapped children often have great needs for self-gratification. The opportunity to experience the pleasure of performing music can help meet these needs (Gaston, pp. 301-302). Levine (1942) suggests that learning to play a musical instrument may help compensate for a feeling of inferiority and help build a feeling of self-confidence (p. 67).

Nordoff and Robbins (1971) state that many children "who score a low I.Q. can show, in their musical responses, perception, intelligence, and other inherent capacities which throw new light on their potential" (p. 52). Isern (1959) conducted a study to discover whether music would affect the memory of mentally retarded children. The children were told a story (no music) and were taught a song with a story. Recall was tested immediately, three days later, and three months later. Isern concluded on the basis of statistical results, music influenced the memory of the subjects tested. Music apparently helped to reinforce,

organize, and focus the attention of the subjects upon the learning experience and seemed to help clarify the interpretation of the intellectual content.

Because of the association of music with therapy, it seems probable that in the implementation of Public Law 94-142 the music classroom will be one area in which handicapped children will be placed with nonhandicapped children in compliance with the least restrictive setting provision. Taylor and Soloway (1973) in describing an instructional alternative for exceptional children in Santa Monica, California, assert that

not all handicapped children are inefficient learners requiring full time, special classroom placement. . . . Some children are ready to function in non-academic activities such as art, music, or physical education, away from the special classroom. (p. 145)

Cruickshank, writing in the Music Educators Journal in 1952, was against the categorizing of exceptional children that was prevalent in education. "The end result," he claims, "has been to divorce the exceptional child from general education to a marked degree" (p. 19). He urges that music educators do not give physically handicapped children separate music programs, but include them in active participation with the other children of the community.

#### Importance of Attitudes

Successful implementation of mainstreaming handicapped children into regular classes may be dependent upon the attitudes of regular classroom teachers. Shotel, Iano, and McGettigan (1972) consider the attitudes of teachers to be a major concern. Prouty and McGarry (1973) suggest that the values held by the teachers and principal in a school are more important than its physical facilities or administrative

structure (pp. 48-49). According to Haring (1957) the attitudes and understanding that teachers have about handicapped children affect the social, emotional, and intellectual growth of the children. Martin (1974) and Deno (1973) have identified the negative attitudes of teachers as one of the barriers to effective implementation of mainstreaming. In the process of analyzing the mainstreaming programs for educable mentally retarded children in six different school districts, Birch (1974) concluded that "the positive attitudes of teachers toward mainstreaming make up the most effective force for excellent special education" (p. 94). "Segregation or integration is not the critical issue," claims Valletutti (1969), but rather "the values and attitudes of teachers and their effects on the pupils' self perceptions and performances are the key questions" (p. 407). Thus it appears that determining the attitudes of teachers toward students with mental or physical handicaps is crucial.

#### Purposes of the Study.

The purposes of this study were, first, to assess the attitudes of selected North Carolina public school music educators toward mentally and physically handicapped students, and second, to determine their willingness to have these students mainstreamed or integrated into their music classes. An attitudinal measurement instrument was developed by the researcher. Biographical data on each respondent were collected via a survey questionnaire. Public school music personnel in the Greensboro City, Guilford County, and Burlington City school systems of North Carolina served as subjects for the study. Statistical procedures employed to analyze the data included factor analysis, analysis of variance, and Pearson product-moment correlations.

### Research Questions Investigated

1. Are there differences in attitudes expressed by music educators as a function of age, sex, years of teaching experience, educational level, previous experience with handicapped students, course work and training in areas of exceptionality, or area of teaching responsibility?
2. Is strength of opinion related to years of teaching experience, previous experience with handicapped students, or with course work and training in areas of exceptionality?
3. Are teachers from any one area of teaching responsibilities more willing to accept handicapped students into their music classes or performance groups?

CHAPTER II  
REVIEW OF RELATED LITERATURE

Prior to 1958 published research dealing with attitudes of teachers toward exceptional children was almost totally lacking (Haring, Stern, Cruickshank, 1958, p. 8). In 1958 Haring, Stern, and Cruickshank published the results of their study on attitudes of educators toward exceptional children. The general purposes of this study were "to determine the extent to which the attitudes of classroom teachers can be modified toward greater and more realistic acceptance of exceptional children," and "to attempt to modify the initial attitudes of these teachers in this direction by the utilization of a workshop" (p. 18). A series of workshops was conducted in an attempt to accomplish these goals. The workshops did not prove effective in increasing the abilities of teachers to become more realistic in their judgments concerning the placement of handicapped children. The workshop did appear to effect changes in a positive direction with regard to the teachers' responses to handicapped children. It appeared to have had a strong positive influence upon the attitudes, philosophy, and teaching methods of the teachers which effected changes in their teaching relationships with exceptional children (pp. 125-127). This study was apparently patterned after the study Haring (1957) did as his doctoral dissertation. Almost ten years passed before educational researchers began to show a surge of interest in measuring the attitudes of teachers toward handicapped children.

In 1967 Fine published the results of a study on the attitudes of regular and special class teachers toward the educable mentally retarded child. The subjects of the study were asked to rate the following characteristics from 1 to 5 in order of importance in the classroom: good citizenship, social adjustment, reading achievement, personal adjustment, and academic performance. In a second question the teachers were asked to record on a five-point scale, from strongly agree to strongly disagree, their reaction to the statement "most children of lower ability would do better if made to try harder." The data indicated that the special education teacher placed greater emphasis on personal and social adjustment factors than did the regular class teachers. In addition, the special class teachers were less demanding of slow ability children "to try harder" (p. 430).

Combs and Harper (1967) investigated the effects of labels on the attitudes of educators toward handicapped children. Subjects of the study were undergraduate students enrolled in the professional education sequence (inexperienced professional group) and graduate students with a mean of 9.9 years of teaching experience (experienced professional group). The labels employed in the study were schizophrenia, psychopathy, mental deficiency, and cerebral palsy. Labeled and unlabeled descriptions of these exceptionalities were presented to the subjects in booklet form. The researchers concluded that labels do affect the attitudes of teachers toward exceptional children. The effects varied: when labeled mentally deficient, the child was perceived less negatively than when the label was not used. For the other three exceptionalities the reverse was true. No differences were found between the attitudes of experienced

and inexperienced teachers toward exceptional children on the labeled or unlabeled descriptions.

A study by Proctor (1967) investigated the relationships between knowledge of exceptional children, kind and amount of experience with exceptional children, and attitudes toward their classroom integration. Proctor concluded that her study provided support to the belief that the integration of handicapped children into regular classes can be facilitated by orientation programs designed to develop knowledge and understanding of the exceptional child and to develop more positive teaching approaches to them.

Siller and Chipman (1967) published the results of several studies concerned with the attitudes of the nondisabled toward the physically disabled. The principal goals of the study were

- (1) to examine the relationships of specific personality characteristics to attitudes toward disability, (2) to describe differential reactions to various disabilities, and (3) to analyze components of attitudes toward the disabled. (p. 75)

Three instruments were employed in the study: Attitudes Toward Disabled Persons (ATDP) by Yuker, Block, and Youngg; Social Distance Scale (SDS) by Siller; and Feeling Check List (FCL) by Siller. Based on data from the FCL, the authors suggested that blindness and deafness were the handicaps which were viewed most favorably. Respondents recorded the greatest aversion to skin disorders and body deformations. The least socially acceptable physical handicaps identified by SDS data were muscular dystrophy and cerebral palsy. Women were significantly less rejecting of all the identified disability types.

Saunders (1969) studied the differential effects of five variables on attitudes of college students toward handicapped persons. The



variables were: (1) a course related to disability, (2) college major, (3) grade level, (4) age, and (5) sex. The results showed that none of the five variables significantly ( $p = .05$ ) affected the attitudes measured.

Knowledge about and attitude toward exceptional children were the focus of a study by Coffelt (1970). Coffelt tried to determine whether student teachers and experienced teachers in special education could be differentiated from student teachers and experienced teachers in general education. No significant differences were found among the four groups except in attitudes toward exceptional children. The two groups of experienced teachers demonstrated attitudes which were significantly more accepting of exceptional children than were those of the two student teacher groups.

In 1971 Shaw conducted research to assess and to compare the attitudes of elementary teachers toward mildly handicapped and average children. The results showed that regular elementary classroom teachers have more favorable attitudes toward average children than toward mildly handicapped children. However, there appeared to be no differences in teacher behavior toward mildly handicapped and average children. Younger, less experienced teachers had fewer extremely positive or negative attitudes toward the mildly handicapped child than did older, more experienced teachers.

Brooks and Bransford (1971) reported on a program at the University of New Mexico which was designed to improve the capabilities and qualifications of experienced regular class teachers to work more effectively with exceptional children in their classes. The five specific goals of the Summer Institute were:

(a) to provide for regular education personnel adequate training related to the individual needs of the handicapped child within the regular classroom, (b) to develop sensitivity and more positive attitudes toward handicapped children within the regular classroom, (c) to develop an understanding about how a handicapping condition affects learning, (d) to develop acceptance of handicapped children within the regular classroom structure as a contributing member of the class, and (e) to develop an alternate approach to the education of mildly handicapped children so they may be maintained in the "main-stream" of the educational process. (p. 259)

Pretest and posttest scores on a semantic differential measuring perceptions toward eight special education related concepts revealed a statistically significant increase ( $p = .05$ ) in positive attitudes toward "special education," "prevention," and "integration." The authors concluded that "if regular classroom teachers and administrators became informed about special education goals they would be more willing to accept the handicapped in the regular class" (p. 260).

In 1972 Shotel, Iano, and McGettigan published a research study that was concerned with teacher attitudes associated with the integration of handicapped children. The 13-item questionnaire utilized by the researchers was designed to elicit teacher attitudes in four areas: (1) integration of handicapped into the regular classroom, (2) the handicapped students' potential for social and academic adjustment, (3) the teachers' competencies for teaching these students, and (4) the teachers' need for special methods and materials in teaching handicapped children. Three areas of disability were specified: educable retarded, emotionally disturbed, and learning disabled. The researchers concluded that

integrating handicapped children into regular classes with supportive services provided by resource rooms had slight, if any effects on teachers' attitudes toward educable retarded and learning disabled children and moderately positive effects on teachers' attitudes toward emotionally disturbed children. (p. 683)

Analysis of the data caused the researchers to question whether or not successful integration of handicapped children can be accomplished at the elementary school level under the conventional grade organizational pattern. Therefore they suggested other strategies may need to be employed, such as inservice workshops on methods and techniques for working with the handicapped, and the opportunity for observation in the resource room.

A study of attitudes of elementary school teachers toward mentally handicapped children was conducted by Kulbeida (1972) in Spartanburg County, South Carolina. Ten variables were identified for analysis: (1) years of teaching experience, (2) sex, (3) age, (4) highest degree earned, (5) number of semester hours earned in special education, (6) race, (7) specific grades, (8) teachers who come from different schools, (9) number of years married, and (10) the number of children in the teacher's family. There were no significant differences ( $p = .01$ ) among the ten related variables. The researcher suggested that, based on the results of the study, "areas of teacher attitudes toward the mentally handicapped should receive more concern from educators in special education" (p. 6206).

A study of principals' attitudes toward integrating handicapped students was published by Payne and Murray in 1974. It was hypothesized that there would be differences in the attitudes of urban and suburban principals. There were significant differences between suburban and urban principals in their willingness to integrate handicapped children into regular classes. The urban principals were more reluctant to integrate handicapped children.

In 1974 Gullotta published a study of teacher attitudes toward the moderately disturbed child in which the subjects were asked to read a case history of an "acting-out" male youngster (four versions of the case history were used). Then, using a seven-point Likert scale, they were to indicate whether they would recommend or not recommend each of ten proposed solutions. Finally, the subjects were asked to rank order the ten solutions. The results indicated that the solutions which were acceptable to the majority of the subjects required service outside the school structure. However, the teachers did seem to care enough about each of the youngsters to want to keep a disturbed child in their classes, provided they had assistance.

Jacobs (1974) compared the attitudes of teachers toward teaching, toward educable mentally handicapped (EMH), and toward their ability to teach educable mentally handicapped. Variables of teacher age, sex, experience, training, and amount of in-school contact with these students were also investigated. Four categories of teachers were used: (1) those who taught special classes of identified EMH, (2) those who taught regular classes with support services given for identified EMH in classes, (3) those who taught regular classes with no supportive help for identified EMH in classes; and (4) those who taught regular classes with no children identified as EMH. Three instruments were employed for measurement purposes: (1) Personal Information Questionnaire, (2) Minnesota Teacher Attitude Inventory (MTAI), and (3) Teacher Opinion Check (TOC). The hypothesis that teachers who have positive attitudes toward teaching (MTAI) will have positive attitudes toward EMH was rejected. Teachers who were under thirty had more positive attitudes than those

over thirty. The youngest group also attained the highest score on the TOC. Teachers who had experience teaching EMH had significantly higher scores on the TOC than those with little or no experience. Teachers who had some in-school contact with EMH scored higher on every measure than teachers with no in-school contact with EMH.

Greer, Flint, and Jenkins (1974) developed several forms of a disability opinion survey based on Rotter's concept of locus of control. The instruments were designed to measure if the respondents' locus of control helps to determine their attitudes toward handicapped persons. The researchers concluded that the Internal-External scale of the Disability Opinion Survey (DOS) measured the degree of respect the respondent held for the internal motivations of disabled persons, that the Special Consideration scale of the DOS measured the tendency of the respondent to extend special considerations to disabled persons; that the Treatment scale of the DOS tended to reveal the respondent's view of rehabilitation programs for the disabled.

Sadlick and Penta (1975) were able to change the attitudes of senior nursing students toward quadriplegics through the use of television. The attitudes of 44 nursing students were significantly altered in a positive direction through viewing and discussing a 17-minute videotape of a successfully rehabilitated quadriplegic. The change in attitude persisted over a 10-week period in which the nurses worked with quadriplegics in a rehabilitation center.

The semantic differential technique was employed by Ianacone and Stodden (1975a) to analyze perceptions and attitudes toward the concepts "disabled" and "handicapped" and the effects of prestructured definitions.

upon the concepts. The subjects were divided into two groups: Group I was given the predetermined and differing definitions of the two concepts measured; Group II was administered only the assessment instrument. The data indicated that the concept "handicapped" was received more favorably than the concept "disabled," although the difference was not significant. Group I was slightly more positive in response than Group II.

Another study by Ianacone and Stodden (1975b) used semantic differential scales to measure the perceptions of bachelor level special education majors and doctoral candidates in education toward various exceptionalities following three types of treatment. The control group received no treatment; Experimental Group I received negative treatment in the form of a 10-minute slide presentation of various syndromes associated with profound retardation; and Experimental Group II received positive treatment consisting of a 10-minute presentation of selections recorded by a musically superior group of educable mentally retarded students. The data revealed significantly more positive responses on the posttest for the positive treatment group, significantly more negative responses on the posttest for the negative treatment group, and no significant difference between the pretest and posttest for the control group. The attitudes and perceptions of the advanced degree subjects on the posttest were significantly higher than those of the preservice special education students. Of all labels presented on the instrument, "gifted" was viewed most positively and the label "severely retarded" was viewed most negatively.

Kelly and Menolascino (1975) investigated the awareness physicians from a large midwestern city have toward community services available to

retarded citizens and the extent to which they referred these services to parents of retarded children. Another purpose of the study was to determine what advice physicians were offering about institutionalization for retarded patients. The results indicated that physicians were the least familiar with the two agencies which exclusively served the retarded and that these agencies were the least recommended to parents of retarded children. An analysis of the parents' responses revealed that over half of the parents had not received any referral suggestions from their doctors, although 81% of the physicians responded that they referred some or all of their patients to the Visiting Nurses Association. A large percentage of the responding physicians recommended institutionalization for retarded children: 80% reported they sometimes recommended institutionalization for moderately retarded patients. Of the parents who responded 40% had been advised by their physician to institutionalize their retarded child; however, not one of the children was in an institution. Over half of the parents were dissatisfied with their physician's attitude toward their child.

Sund (1975) investigated the attitudes of general education teachers toward Educable Mentally Handicapped (EMH) students in schools with different special education delivery systems. Measurement instruments were Jacobs' personal questionnaire and the Teacher Opinion Check (TOC). The comparisons concerned differences in attitudes of general education teachers toward placement, abilities of the EMH, teacher competency and concessions analyzed by the delivery system, socioeconomic level of the school, number of years of teaching experience, and number of semester hours of course work in special education. No statistically significant

differences were found. Sund, however, found that the response pattern suggested a positive relationship between number of course hours in special education and more positive attitudes toward the placement of EMH in regular classes, use of supportive services, and confidence in teacher's own ability to teach EMH.

DeLeo (1976) developed an instrument to assess the attitudes of public school administrators and teachers toward the integration of children with special needs into regular education programs. The subjects were grouped into four categories: director of special education, special education teacher, principal, and regular teacher. The 57-item instrument provided feedback in five identified areas labeled by DeLeo as (1) de-labelization, (2) MR involvement, (3) MR peer involvement, (4) teacher involvement, and (5) administrator involvement. Consistently the special education trained personnel had the more positive attitudes toward the integration of children with special needs into the regular education program.

Myers (1975) also investigated the attitudes and knowledge of public school administrators toward mainstreaming handicapped children. A pre-posttest design was employed to measure the effectiveness of a workshop experience in bringing about increased knowledge of and more positive attitudes toward handicapped students. A slight positive change resulted. Carpenter (1976) conducted a follow-up study with the principals involved in Myers' study. The same measurement instrument was employed (Rucker-Gable Educational Programming Scale) to determine if there were any significant changes in principals' attitudes after one year. There were



none. The schools of all principals involved had increased the services provided to handicapped students.

Mandell (1976) attempted to identify factors that are related to the regular teacher's attitudes toward mainstreaming mildly educationally handicapped into the regular classroom. A model of factors related to the regular teachers' attitudes toward integration was developed. The relationship between the proposed factors and attitudes held by the regular teachers was investigated. The results of the study indicated an inverse correlation between years of teaching experience and positive attitudes toward integration or mainstreaming. Teachers who had more knowledge of special education procedures were more willing to accept exceptional students into the classroom. The variables team-teaching, resource teacher available, and class size were all related to positive attitudes toward mainstreaming.

Ingram (1976) conducted a study of the attitudes of selected public school administrators in West Virginia toward handicapped children. The measurement instrument employed was the Classroom Integration Inventory developed by Harding, Stern, and Cruickshank. Bass (1976) attempted to determine the staff development needs perceived by elementary teachers before the placement of exceptional children in their classroom. Five categories of perceived needs were identified: (1) diagnosis and management, (2) classroom behaviors, (3) methods and materials, (4) interpersonal relations, and (5) specialized services.

Smith (1976) attempted to determine the attitudes of a group of experts in special education for the purpose of establishing reference norms for the Smith-Wieters Attitude Test, an instrument designed to

assess attitudes toward educable mentally retarded. Another purpose of the study was to determine the degree of congruence that existed between the norm reference group and a sample of special educators. The normative group and the teacher group differed significantly ( $p = .01$ ) in their attitudes on all but two of the 75 items.

A study to determine the preferences and opinions of regular classroom teachers concerning the placement of educationally handicapped students into regular school programs was conducted by Johnson (1976). A researcher-designed instrument was employed. A majority of the teachers believed students should be in the regular classroom for at least part of the day. They ranked paraprofessionals as the most desired support service. The qualities that educable handicapped students needed to succeed in the classroom included the ability to follow directions, to exercise self-control, to respond positively to authority, and to comply with classroom regulations. Disrupting class, talking to peers, and making noise were the most unacceptable behaviors.

Skrtic (1976) investigated the influence of inservice programs on the attitudes and behaviors of regular elementary classroom teachers toward mainstreamed learning disabled students. The experimental and control groups were compared on three variables (teacher attitude toward learning disabled, amount of student-perceived teacher approval, and amount of student-perceived teacher disapproval) at three measurement periods (i.e., pre, post, and follow-up). There was a significant difference between the experimental and control teachers on the follow-up teacher attitude measure. Although the attitudes of the experimental teachers toward their learning disabled students improved, there was no

concomitant change in the students' perceptions of teacher approval or disapproval.

The purpose of a study by Gottlieb and Siperstein (1976) was to investigate the impact of attitude referents on attitude expressions compared to the impact of a nondescript attitude referent. Another purpose of the study was to determine whether the nature of the attitude referent would have differential effects on subjects' expressed attitudes as a function of the response format of the attitude questionnaire. Seventy-five female undergraduate education majors were randomly assigned to one of five treatment conditions. Each treatment was a description of a mentally retarded referent about whom the subjects were asked to express attitudes. The attitude referents were: (1) mentally retarded person; (2) severely retarded child between the ages of 9 and 12 residing in an institution; (3) a mildly retarded child between the ages of 9 and 12 attending a special class; (4) a severely retarded young adult who was just released from an institution; and (5) a mildly retarded young adult who just completed a vocational education program. Four instruments, each with a different response format, were administered to the subjects: (1) a 6-item, 5-point Likert scale; (2) a 13-item forced-choice (agree-disagree) scale developed by Q-sort procedures; (3) a semantic differential scale consisting of 16 pairs of bipolar adjectives; and (4) a 32-item adjective check list.

Analysis of the data indicated that attitudes toward the mildly retarded referent were more favorable than toward the severely retarded referent regardless of the chronological age of the person being described. The attitude referent "mentally retarded person" elicited

attitude expressions that were generally intermediate in favorability between a mildly retarded and a severely retarded person.

The study also revealed that different attitude scales are not equally sensitive to detect differences in attitudes toward mildly and severely retarded people. In this study only the Likert scale yielded significant differences between attitudes toward severely and mildly retarded people and the nondescript mentally retarded person referent.

Attitudes of 4,459 persons of all age levels toward 22 disability groups were surveyed over an 8-year period by Harasymiw, Horne, and Lewis (1976). The subjects in 50 sampling categories were administered one of three social distance scales: the Disability Social Distance Scale, the General Social Distance Scale, and the Perception of Social Closeness Scale. The subjects were divided into 12 groupings for data analysis purposes. Intercorrelations between the groups were high--all but two were statistically significant. The authors concluded that attitudes toward disabled persons were remarkably stable among all populations sampled. The data also revealed that physical disabilities such as an ulcer or asthma are the most acceptable and social disabilities are the least acceptable (e.g., drug addict, ex-convict).

Using a pre- posttest design, Lazar, White, and Sengstock (1976) evaluated 102 students enrolled in a beginning special education course at three different universities on attitudes toward the handicapped, social adjustment, instructional goals desired, and self-concept. The purpose of the study was to determine if "normal" or "traditional" methods of instruction in a beginning course in special education would change attitudes in a positive direction. A comparison of the pretests

and posttests revealed no significant mean differences. The authors suggested that the results of attitude changes that have been reported in other studies were due to a carefully designed and sequenced curriculum (the experimental treatment), but traditionally taught courses in special education do not contribute to positive attitude change.

Lazar and Sigler (1976) investigated the effect of

sex, age, amount of training, years of teaching experience, internal or external locus of control, positive or negative self esteem and grade level of teaching as they contributed to the teacher's attitude toward handicapped individuals. These variables were analyzed to determine their relative importance for predicting the variance in the teacher's attitude toward handicapped individuals as measured by Lazar's Attitude Toward Handicapped Individuals Scale and for making predictive statements concerned with teacher attitudes. (p. 2)

Analysis of the data demonstrated that the variables were not individually, in combination, or collectively predictive of teachers' attitudes toward handicapped individuals.

Lillis and Wagner (1976) investigated the effects of nursing education upon attitudes toward mentally retarded persons. Three types of nursing programs (diploma, associate, and baccalaureate) were examined. There were significant differences in the attitudes toward mentally retarded as a function of the type of program in which the students enrolled. However, there were not significant differences in the attitudes of entering nursing students compared to graduating students when each educational program was evaluated separately. Students from varying socioeconomic levels did not differ in their attitudes toward the mentally retarded. The majority of the students did not desire to work with the mentally retarded upon graduation from nursing school nor did they feel adequately prepared to work with them.

Graduate social work students enrolled in a course on developmental disabilities served as the subjects for a study by Hersh, Carlson, and Lossino (1977). The purpose of the study was to effect positive attitude change toward mentally retarded persons through a day of interaction with the family of a retarded person. Students who volunteered to participate were randomly assigned to the control group (no interaction) or treatment group (visit in home for one day). The precourse attitudinal ratings were compared with the postcourse ratings and the experimental group demonstrated positive attitude change--evidenced by ratings which indicated that differences between mentally retarded persons and normal persons were almost non-existent.

Lazar, Demos, Gainer, Rogers, and Stirnkorb (1978) initiated a study to compare the attitudes of physically handicapped and nonhandicapped students in three areas of concern: (1) social adjustment, (2) instructional goals desired, and (3) attitudes toward handicapped individuals along an accepting/rejecting continuum. The researchers found no comparative studies between attitudes of handicapped and nonhandicapped in the literature and believed this area needed to be investigated. The subjects for the study were 26 nonhandicapped students and 26 handicapped students confined to wheel chairs because of spinal cord dysfunction, matched for age and sex. The first scale administered was the Is of Identity test which measures social adjustment. No statistically significant differences were found between the two groups on social adjustment. The second scale, The Preferred Student Characteristics Scale, assessed affective and cognitive attitudes toward goals. A significant difference was found between the two groups: the nonhandicapped ranked nearer the

affective pole of the continuum while the handicapped ranked nearer the cognitive pole of the continuum. The third scale, The Attitudes Toward Handicapped Individuals, measured the attitudes of acceptance or rejection. No significant difference was found between the two groups on the measures of attitude toward handicapped persons.

One music-related study has been found in the literature. Stuart and Gilbert (1977) developed a videotape scale to measure attitudes toward atypical students and their musical behavior. Then the visual scale was used to investigate the reactions of college music education and music therapy majors to the situations. The videotape presented 26 excerpts portraying individuals involved in music activities. Each segment was classified as normal, moderately atypical, or extremely atypical. The respondents indicated their willingness to interact with, to work with, and self-perceived capability to work with the individual portrayed in each segment. The music education majors indicated less comfort in interacting with, less willingness to work with professionally, and less felt capacity in working professionally with the portrayed individual than music therapy or dual majors. As the behavioral category moved from normal to extremely deviant behavior, the education majors' responses became more divergent, suggesting "that preservice teachers are not sufficiently prepared for the behavioral and psychological impact of mainstreaming programs" (p. 289). The authors conclude that the

present preparedness of both inservice and preservice teachers to accept and teach children being mainstreamed into the music class must be evaluated. A thorough needs assessment is necessary for the compilation of this evaluative data. (p. 289)

Deurksen and Gilbert at the University of Kansas have received a federal grant to conduct the needs assessment that was recommended by

Stuart and Gilbert (1977). The needs assessment was mailed to a nationwide sample during the latter part of 1978 and the data are in the process of being analyzed. The grant also provides funding for the development of inservice materials. Five media packages are being prepared. Packet 1 deals with FL 94-142 and its implications for music educators. Packets 2 and 3 are concerned with the various handicapping conditions. Packet 4 is designed to aid the teacher in development and implementation of Individualized Education Programs (IEP's). The fifth packet suggests ways in which music can serve as a reinforcer in other subjects. Pilot testing of the packets is planned for the spring of 1979. Other materials which will be made available through this project are a listing of available teaching materials and a review of all related literature (Turk, Note 1).

A pilot study by Damer (Note 2) compared the attitudes of public school music teachers in the Greensboro City Schools and the Guilford County Schools of North Carolina toward mentally retarded and physically handicapped students with the attitudes expressed by public school music teachers enrolled in the course "Music for Students with Special Needs," University of North Carolina at Greensboro, summer term 1978. A researcher-designed attitudinal instrument and biographical survey was employed to collect data on each respondent. About 60% of the respondents had worked in some capacity with physically and mentally handicapped students. The handicap with which they had the most experience was educable mentally retarded. No one had taught deaf students and very few had worked with blind, partially blind, or hearing impaired students.

The respondents indicated overall positive responses to having handicapped students in general music classes and in performance groups.



The handicap cited the least for acceptance was deafness. When asked to identify types of handicapped students they felt unprepared to teach in a mainstreaming situation, the handicaps most often listed were deafness, cerebral palsy (spastic), and trainable mentally retarded. However, a large percentage were willing to accept these handicapped students into their classrooms if appropriate training and resource help were available.

Over half the respondents did not think mentally retarded students should be integrated into the regular classroom, but they did feel that physically handicapped students should be mainstreamed into the regular classroom. A larger percentage of the respondents had a more favorable attitude toward the mainstreaming of mentally retarded students into music classes as compared to mainstreaming them into the regular classroom. Almost all respondents indicated that physically handicapped students should be mainstreamed into music classes. Ninety-five percent of the respondents thought that physically handicapped students should be permitted to participate in school musical performing groups. When considering the admission of mentally retarded students into musical performing groups, the teacher sample dropped to 75% agreement.

The overall response of the subjects of this study indicated a favorable attitude toward the mainstreaming of both physically and mentally handicapped students into music classes. Generally the subjects were more accepting in their attitudes toward physically handicapped students than toward mentally handicapped students.

Three articles on the mainstreaming of handicapped students have been published in the Music Educators Journal. "Mainstreaming in Your Classroom: What to Expect" by Gilbert (1977) dealt with the problems

that music educators might experience with students with special needs who are integrated into the regular classroom. In their article "It's the Law" Forsythe and Jellison (1977) stressed the need for music educators to maintain an objective attitude toward teaching music to handicapped children. The roles of the music educator and of the music therapist are discussed and compared. Dykman's article (1979), "In Step with 94-142, Two by Two," described the successful use of peer advocates at Lapham School in Madison, Wisconsin. Volunteer nonhandicapped students work with and help the handicapped students in music classes. No published or unpublished articles were found which attempted to assess the attitudes of inservice public school music educators toward the mainstreaming of handicapped students into their music classes and performance groups.

## CHAPTER III

### METHOD

The purposes of this study were, first, to assess the attitudes of selected North Carolina public school music educators toward mentally and physically handicapped students, and second, to determine their willingness to have these students mainstreamed or integrated into their music classes.

#### Subjects

The subjects for the study were public school music teachers in the Greensboro, North Carolina city school system, the Guilford County, North Carolina school system, and the Burlington, North Carolina city school system (N=87). Names and addresses were obtained from each system's current (1978-79) printed personnel directory.

#### Instrumentation

The attitudinal instrument, Attitudes Toward Handicapped Students (ATHS) developed by the researcher, was employed to collect the attitudinal data. A scale to measure attitudes toward disabled persons developed by Yuker, Block, and Youngg (1960) as revised by Jordan (1970) served as a model. A positive or accepting attitude in the ATHS was one which viewed handicapped students from the same perspective as nonhandicapped students. The ATHS contained 36 statements concerning physically handicapped and mentally retarded students (see Appendix A). The statements represented general attitudes toward the education of physically and mentally handicapped students and specific attitudes toward the integration

of physically or mentally handicapped students into music classes. The respondents were, first, to record their agreement or disagreement with each statement. Secondly, they were to indicate strength of opinion on a value scale of "not strong," "moderately strong," "strong," and "very strong." A score for each statement was computed using a formula<sup>1</sup> by which the strength value was multiplied by the agree/disagree value, adjusting for the positive or negative direction of the statement. In the computed score for each variable the more positive the attitude, the more negative was the score (range was -4 to +4).

A modified split half correlation was employed to test instrument reliability. Pairs of statements were selected from the ATHS which the researcher believed would consistently be assigned similar values by each respondent. One of each pair was randomly assigned to Group A and the remaining five became Group B. The statements in Group A were then correlated with Group B. The correlation coefficient was .5. Although .5 is a low correlation for a standardized test, Colwell (1970) suggests that guidelines used for standardized tests are unrealistically high for "devices for measurement in the affective domain, because this is an area for which little is known about testing" (p. 37).

The Personal Questionnaire (PQ) surveyed biographical data on each respondent (see Appendix B). The PQ included opportunities for the respondents to record experiences with and course work dealing with mentally or physically handicapped students. The respondent's willingness

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<sup>1</sup>Formula employed for negative statement:  $\text{Score} = (2X - 3) * Y$ .  
Formula employed for positive statement:  $\text{Score} = (3 - 2X) * Y$ ; where  
 $X$  = agree/disagree value and  $Y$  = strength of opinion value.

to have specific types of handicapped students mainstreamed into general music classes or performance groups was surveyed. Respondents were asked to evaluate their own capability to work in an educational setting with specific types of handicapped students. Finally, the respondents were to indicate which types of handicapped students they would accept into their music classes if some type of special training and/or resource help were available to them.

The Attitudes Toward Handicapped Students instrument was tested via a pilot study. Factor analysis procedures were performed on the data. Items which were spurious to the constructs defined through factor analysis were eliminated from the instrument. The Personal Questionnaire was also tested in the pilot study. Respondents were requested to comment on both the ATHS and the PQ. Suggestions by the respondents were considered in the revision of the ATHS and the PQ.

#### Data Collection Procedure

The subjects received by mail a packet containing the instrument, a stamped-addressed envelope, and a cover letter explaining the purpose of the study and requesting their cooperation and assistance (see Appendix C). Each instrument carried an identification number so that follow-up contacts could be made to nonrespondents. After two weeks, each nonrespondent was sent a postcard requesting the return of the questionnaire. At the end of four weeks each nonrespondent was telephoned by the researcher asking for the return of the questionnaire. Second questionnaires were sent to those requesting them. Nonrespondents without telephones were sent a second postcard. At the end of six weeks second questionnaires were sent to all nonrespondents without telephones and

to all nonrespondents who had indicated by telephone that they would return the questionnaire. At the end of the seventh week, telephone calls were again made to the nonrespondents who had originally agreed to return the questionnaires. The return percentage was 77%.

### Data Analysis

Normative data were analyzed via the Statistical Analysis Systems (SAS) Frequencies and Crosstabulation programs. SAS factor analysis procedures were performed upon the statements in the ATHS. The use of factor analysis allows "variables to be grouped together because they behave in the same way, and it proceeds to delineate new independent, underlying factors which may be responsible for these groupings" (Cattell, 1952, pp. 14-15). Cattell suggests that factor analysis might almost as well be called factor synthesis or variable synthesis, for

although it analyzes out the distinct factors at work among the variables, it also groups the variables together in ways which permit one to synthesize new entities. These new entities are now themselves to be considered as variables . . . which can be used as hypothetical causes, intervening constructs, or independent influences behind the more numerous and bewildering mass of raw variables. (p. 15)

Factor analysis was employed to determine the basic constructs underlying the ATHS. Twelve factors emerged. The factors are shown in Appendix D. Factor scores for each respondent were computed. The factor scores served as the attitude variables. The factor scores were analyzed via SAS general linear models procedures (ANOVA) to test for significant differences in age, sex, educational degree, years of teaching experience, and area of teaching responsibility. SAS correlational procedures were employed to correlate the factor scores with experience with handicapped individuals.

A strength of opinion mean score was computed for each respondent and correlated with years of teaching experience, course work and/or workshops dealing with physically handicapped students or mentally retarded students, and other types of experience with mentally or physically handicapped students.

CHAPTER IV  
RESULTS AND CONCLUSIONS

Analysis of the data resulting from the investigation of the stated research questions was based on descriptive data obtained from the frequencies and crosstabulations procedures, and relational data obtained from analysis of variance and Pearson product-moment correlational procedures. Factor analysis was employed to discover the underlying constructs of the Attitudes Toward Handicapped Students instrument. A  $p$  of .05 served as the acceptable level of significance for the study.

Descriptive Data

Questionnaires were returned by 67 of the original population of 87, a 77% return. There were 23 males and 44 females. The largest number were in the age range 20 - 29 (N=23); the second largest number were in the 30 - 39 range (N=20). (See Table 1) A baccalaureate degree was the highest degree obtained by 37 of the respondents; 18 held a master's degree, 11 had some study past the master's degree, and one respondent held a doctoral degree. The years-of-teaching-experience was high: 29% had taught 5 - 10 years, 18% had taught 11 - 15 years, and 29% had taught 16 or more years (see Table 2). The largest group of respondents were elementary general music teachers (N=15). There were 13 whose primary responsibility was secondary instrumental music and 12 whose responsibility was primarily junior high instrumental music (see Table 3). The junior high/secondary instrumental teachers had the highest level



Table 1  
Age by Sex

Age	Male	Female
20-29	3	19
30-39	8	13
40-49	7	9
50-59	5	2
<b>Total</b>	<b>23</b>	<b>43</b>

Note: 1 missing value (All missing values result from missing data on questionnaires.)

Table 2  
Highest Educational Degree by Years of Teaching Experience

Years of Tchng. Exp.	Bachelor's Degree	Master's Degree	Study Past Master's	Doctor's Degree
1	3	2	-	-
2-4	9	2	-	-
5-10	14	3	2	-
11-15	5	5	2	-
16 or more	6	6	6	1
<b>Total</b>	<b>37</b>	<b>18</b>	<b>10</b>	<b>1</b>

Note: 2 missing values

Table 3  
Sex by Area of Teaching Responsibility

Area of Teaching Responsibility	Male	Female
Elementary General Music	1	14
Junior High General Music	1	5
Junior High Choral Music	0	8
Secondary Choral Music	1	7
Elementary Instrumental	2	1
Junior High Instrumental	7	5
Secondary Instrumental	10	3
Other (Secondary-electronic music)	1	0
Total	23	44

of education (see Table 4). The disabled students most commonly mainstreamed into music classes were educable mentally retarded, learning disabled, and emotionally disturbed. The disability with which most teachers had worked in a homogeneous grouping was educable mentally retarded (see Table 5).

The respondents were asked to indicate other types of experience with disabilities besides teaching experience. Over half of the respondents had done some personal reading in the area of physical handicaps and mental retardation. Twenty-three had participated in workshops or course work dealing with physically handicapped students. Twenty-six had participated in workshops or course work dealing with mental retardation. There were 34 who had friends with some type of disability and 27 who had a family member with some type of disability (see Table 6).

Frequencies for the statements in the ATHS are found in Table 7. The scores for the variables in the table have been adjusted for strength and for attitude direction, so that -4 is the most positive attitude.

Generally, the majority of the music teachers responding displayed accepting or positive attitudes toward physically and mentally handicapped students. The respondents indicated, however, that there should still be special schools for physically handicapped and mentally retarded students, but a large majority (86.3%) did not believe all physically handicapped should attend a special school nor that all mentally retarded students should attend a special school (64.2%). Most respondents indicated that the government should provide for both the educational and therapeutic needs of physically and mentally handicapped students (range: 70.8% to 85%).

Table 4

## Area of Teaching Responsibility by Highest Educational Degree

Area of Teaching Responsibility	Bachelor's Degree	Master's Degree	Study Past Master's	Doctor's Degree
Elementary General Music	10	2	3	-
Junior High General Music	4	2	-	-
Junior High Choral Music	5	3	-	-
Secondary Choral Music	5	2	-	-
Elementary Instrumental	3	-	-	-
Junior High Instrumental	5	3	3	1
Secondary Instrumental	5	5	3	-
Total	37	17	9	1

Note: 3 missing values

Table 5

## Number of Students with Specific Disabilities in Music Classes

Disability	Mainstreamed			Homogeneous		
	Once	Occasionally	Regularly	Once	Occasionally	Regularly
Blind	4	5	1	1	1	-
Partially Blind	9	12	2	1	-	1
Deaf	1	5	-	-	-	-
Partially Deaf	10	12	4	1	-	-
Orthopedically Impaired	11	16	6	5	-	-
Spastic	5	8	6	2	1	1
Speech/lang. Impaired	4	12	11	1	-	3
Educ. Ment. Retarded	9	17	24	6	2	9
Train. Ment. Retarded	5	11	8	2	1	6
Emotionally Disturbed	9	24	12	2	-	4
Learning Disabled	5	12	28	1	2	5
Other Health Impaired	2	14	7	1	-	1

Table 6

Number of Teachers with Other Types of Experience by Area of Teaching Responsibility

Types of Experience	Elem. Gen. Music	Jr.Hi Gen. Music	Jr.Hi Choral Music	Sec. Choral Music	Elem. Instr.	Jr.Hi Instr.	Sec. Instr.
Personal Reading on Physically Handi.	6	3	3	3	2	10	6
Personal Reading on Mental Retardation	7	5	3	4	3	9	6
Workshops on Physically Handi.	3	1	1	2	1	2	3
Coursework on Physically Handi.	2	1	-	1	1	3	2
Workshops on Mental Retardation	5	1	1	1	1	1	3
Coursework on Mental Retardation	3	2	-	1	-	5	2
Friend Who Is Physically Handi.	4	2	3	5	1	4	2
Friend Who Is Mentally Retarded	2	2	2	1	-	3	2
Worked with Physically Handi. in Other Capacity	4	1	-	1	-	1	1
Worked with Mentally Retarded in Other Capacity	6	1	1	3	-	1	1
Relative Who Is Physically Handi.	2	1	1	1	-	3	1
Relative Who Is Mentally Retarded	3	1	1	-	1	2	1
Immed. Family Member Is Physically Handi.	1	1	1	-	-	1	-
Immed. Family Member Is Mentally Retarded	1	-	2	-	-	1	-

Table 7

Frequency Table for ATHS Statements (Adjusted)

Statement Number	-4	-3	-2	-1	+1	+2	+3	+4	Disagree Total	Agree Total
1.	18 26.8%	27 40.3%	14 20.9%	1 1.4%	2 2.9%	3 4.5%	2 2.9%	-	60 89.6%	7 10.4%
2	28 41.7%	27 40.3%	6 8.9%	-	-	2 2.9%	4 5.9	-	61 91.0%	6 8.8%
3	13 20.0%	26 40.0%	15 23.0%	3 4.6%	2 3.0%	3 4.6%	3 4.6%	-	57 87.6%	8 12.3%
4.	4 6.1%	7 10.6%	4 6.1%	-	2 3.0%	9 13.6%	22 33.3%	18 27.2%	15 22.7%	51 77.0%
5.	16 24.2%	21 31.8%	16 24.2%	4 6.1%	-	3 4.5%	4 6.1%	2 3.0%	57 86.3%	9 13.7%
6.	4 6.1%	6 9.1%	2 3.0%	1 1.5%	-	11 16.7%	23 34.8%	19 28.8%	13 19.7%	53 80.3%
7.	6 9.1%	17 25.8%	15 22.7%	2 3.0%	3 4.5%	13 19.7%	8 12.1%	2 3.0%	40 60.6%	26 39.4%
8.	5 7.7%	4 6.2%	6 9.2%	4 6.2%	3 4.6%	16 24.6%	21 32.3%	6 9.2%	19 29.2%	46 70.8%
9.	18 27.2%	26 39.4%	10 15.2%	1 1.5%	1 1.5%	2 3.0%	7 10.6%	1 1.5%	55 83.3%	11 16.7%
10.	21 31.8%	22 33.3%	10 15.1%	1 1.5%	-	7 10.6%	5 7.6%	-	54 81.8%	12 18.2%

**Note:** Complete statements are in Appendix A. Scores are adjusted by formulas in footnote 1, p. 33.

Statement Number	-4	-3	-2	-1	+1	+2	+3	+4	Disagree Total	Agree Total
11.	3 4.6%	3 4.6%	5 7.7%	- -	2 3.1%	12 18.5%	25 38.4%	15 23.1%	11 16.9%	54 83.1%
12.	3 4.8%	25 39.7%	10 15.6%	3 4.8%	-	6 9.5%	13 20.7%	3 4.8%	41 65.1%	22 34.9%
13.	4 6.1%	14 21.2%	7 10.6%	1 1.5%	3 4.5%	15 22.8%	15 22.8%	7 10.6%	26 39.3%	40 60.7%
14.	7 10.6%	17 25.2%	18 27.3%	1 1.5%	2 3.0%	7 10.6%	11 16.7%	3 4.5%	43 65.1%	23 34.9%
15.	20 29.9%	27 40.3%	6 9.0%	- -	2 3.0%	5 7.5%	4 6.0%	3 4.5%	53 79.1%	14 20.9%
16.	14 21.6%	43 66.2%	- -	4 6.2%	- -	- -	4 6.2%	- -	61 93.8%	4 6.2%
17.	5 7.5%	3 4.5%	4 6.0%	1 1.5%	1 1.5%	6 9.0%	22 32.8%	25 37.1%	13 19.4%	54 80.6%
18.	12 17.8%	18 26.9%	11 16.4%	2 3.0%	- -	4 6.0%	9 13.4%	11 16.4%	43 64.2%	24 35.8%
19.	2 3.0%	4 6.0%	1 1.5%	1 1.5%	- -	11 16.4%	24 35.8%	24 35.8%	8 11.9%	59 88.1%
20.	4 5.6%	5 7.5%	5 7.5%	2 3.0%	2 3.0%	17 25.4%	24 35.8%	8 11.9%	16 23.8%	51 76.2%
21.	3 4.5%	5 7.6%	2 3.0%	- -	1 1.5%	6 9.1%	30 45.4%	19 28.8%	10 15.0%	56 85.0%



Statement Number	-4	-3	-2	-1	+1	+2	+3	+4	Disagree Total	Agree Total
22.	20 30.3%	23 34.8%	6 9.1%	1 1.5%	4 6.1%	6 9.1%	5 7.6%	1 1.5%	50 75.8%	16 24.2%
23.	4 6.2%	16 24.6%	15 23.1%	3 4.6%	2 3.1%	6 9.2%	13 20.0%	6 9.2%	38 58.5%	27 41.5%
24.	2 3.1%	10 15.6%	7 10.9%	3 4.7%	2 3.1%	14 21.9%	21 32.3%	5 7.8%	22 34.4%	42 65.6%
25.	7 10.9%	19 29.7%	12 18.8%	7 10.9%	5 7.8%	8 12.5%	6 9.3%	- -	45 70.3%	19 29.7%
26.	3 4.4%	18 26.7%	9 13.4%	2 3.0%	3 4.5%	15 22.4%	15 22.4%	2 3.0%	32 47.8%	35 52.2%
27.	3 4.5%	15 22.4%	9 13.4%	8 11.9%	2 3.0%	4 6.0%	9 13.4%	17 25.4%	35 52.2%	32 47.8%
28.	15 22.3%	26 38.8%	12 17.9%	5 7.5%	- -	- -	4 6.0%	5 7.5%	58 86.6%	9 13.4%
29.	11 16.4%	15 22.3%	14 20.9%	6 9.0%	- -	4 6.0%	9 13.4%	8 11.9%	46 68.7%	21 31.3%
30.	22 32.8%	23 34.3%	13 19.4%	3 4.5%	- -	2 3.0%	2 3.0%	2 3.0%	61 91.0%	6 9.0%
31.	12 18.2%	21 31.8%	12 18.2%	2 3.0%	1 1.5%	3 4.5%	6 9.1%	9 13.6%	47 71.0%	19 29.0%
32.	20 30.0%	17 25.8%	15 22.8%	6 9.1%	1 1.5%	2 3.0%	3 4.5%	2 3.0%	58 87.9%	8 12.1%

Statement Number	-4	-3	-2	-1	+1	+2	+3	+4	Disagree Total	Agree Total
33.	27 40.3%	25 37.3%	14 20.1%	1 1.5%	- -	- -	- -	- -	67 100%	- -
34.	28 42.4%	23 34.8%	9 13.6%	2 3.0%	- -	1 1.5%	1 1.5%	2 3.0%	62 93.9%	4 6.1%
35.	13 19.4%	16 23.8%	13 19.4%	6 9.0%	2 3.0%	4 6.0%	8 11.9%	5 7.5%	48 71.2%	19 28.8%
36.	8 12.1%	13 19.7%	5 7.6%	3 4.5%	7 10.6%	10 15.1%	12 18.2%	8 12.1%	29 43.9%	37 56.1%

The respondents were divided in their opinions concerning the mainstreaming of mentally retarded students into the regular classroom: 52.2% were in favor of mainstreaming in this situation. However, 86.6% indicated physically handicapped students should be mainstreamed into the regular classroom. A larger percentage (68.7%) of the responding music teachers indicated mentally retarded students should be mainstreamed into music classes than in the regular classroom. But when asked to respond to the statement "Mentally retarded students should be taught music only in homogeneous classes," 56.1% agreed. Only six respondents (9%) thought physically handicapped students should not be mainstreamed into music classes.

All responding teachers indicated partially deaf students should have some type of music instruction. Only eight (12.1%) suggested deaf students do not need music instruction.

Almost 94% of the respondents indicated that physically handicapped students should be permitted to participate in school musical performing groups. The percentage drops to 71.2% when mentally retarded is substituted for physically handicapped.

#### Factor Analysis of the ATHS

The instrument Attitudes Toward Handicapped Students (see Appendix A) contains 36 statements concerning attitudes toward physically and mentally handicapped students. Factor analysis was employed to determine the basic constructs underlying the ATHS. Twelve factors emerged (see Appendix D). Factor scores for each respondent were computed. The factor scores served as the attitude variables in the first research question:

Are there differences in attitudes expressed by the music educators as a function of age, sex, years of teaching experience, educational level, previous experience with handicapped students, course work and training in areas of exceptionality, or area of teaching responsibility?

The SAS General Linear Models (GLM) procedure for analysis of variance was employed to investigate if there were any differences in attitudes as a function of age, sex, years of teaching experience, educational level, and area of teaching responsibility. The first variable, age, was regressed against each factor separately. One significant F ratio was found: age and factor 6, which deals with music instruction for deaf students ( $p = .03$ ) (see Table 8). Factor 12 and age had an F ratio that was significant at  $p = .069$ . Factor 12 deals with the government's responsibility for the educational needs of handicapped students.

The variable sex was nonsignificant in its contribution to attitudes as expressed by the twelve factors. The largest significance ( $p = .093$ ) was sex with factor 3 (the school setting for physically handicapped students) (see Table 9).

There was no significant difference between the levels of respondents' education (highest degree held) on the twelve factors (see Table 10). Number of years of teaching experience had one significant F ratio. The F ratio of teaching experience with factor 12, the responsibility of the government for the educational needs of handicapped students was significant at .009 level. Years of teaching experience with factor 11, teacher behavior toward handicapped students, had an F ratio of 2.24 ( $p = .078$ ) (see Table 11).

Table 8

ANOVA: Relationship of Age to Factors 1-12.

Source	<u>d.f.</u>	<u>SS</u>	<u>MS</u>	<u>F</u>	<u>Pr F</u>
Factor 1					
Model	3	3.6767	1.2256	1.24	.3043
Error	50	49.3233	.9865		
Factor 2					
Model	3	5.7942	1.9314	2.05	.1194
Error	50	47.2057	.9441		
Factor 3					
Model	3	3.3341	1.1113	1.12	.3503
Error	50	49.6659	.9933		
Factor 4					
Model	3	1.8425	.6141	.60	.6178
Error	50	51.1575	1.0232		
Factor 5					
Model	3	4.1545	1.3848	1.42	.2486
Error	50	48.8455	.9769		
Factor 6					
Model	3	8.4667	2.8222	3.17	.0323*
Error	50	44.5333	.8907		
Factor 7					
Model	3	2.2980	.7660	.76	.5245
Error	50	50.7020	1.0140		
Factor 8					
Model	3	2.8343	.9448	.94	.4276
Error	50	50.1657	1.0033		
Factor 9					
Model	3	5.0751	1.6917	1.76	.1659
Error	50	47.9250	.9585		
Factor 10					
Model	3	1.8778	.6259	.61	.6103
Error	50	51.1221	1.0224		
Factor 11					
Model	3	3.4562	1.1521	1.16	.3333
Error	50	49.5438	.9909		
Factor 12					
Model	3	6.9517	2.3173	2.52	.0688
Error	50	46.0482	.9210		

\* $p < .05$

Table 9

ANOVA: Relationship of Sex to Factors 1-12.

Source	<u>d.f.</u>	<u>SS</u>	<u>MS</u>	<u>F</u>	<u>Pr F</u>
Factor 1					
Model	1	.0086	.0086	.01	.9269
Error	51	51.6166	1.0120		
Factor 2					
Model	1	1.8426	1.8426	1.90	.1738
Error	51	49.3889	.9684		
Factor 3					
Model	1	2.8478	2.8478	2.94	.0926
Error	51	49.4464	.9695		
Factor 4					
Model	1	2.2250	2.2250	2.24	.1405
Error	51	50.6315	.9928		
Factor 5					
Model	1	1.0573	1.0573	1.05	.3097
Error	51	51.2054	1.0040		
Factor 6					
Model	1	.4020	.4020	.39	.5344
Error	51	52.3814	1.0271		
Factor 7					
Model	1	.3987	.3987	.39	.5365
Error	51	52.5013	1.0294		
Factor 8					
Model	1	.0012	.0012	.00	.9735
Error	51	52.5869	1.0311		
Factor 9					
Model	1	.5086	.5086	.50	.4809
Error	51	51.4535	1.0089		
Factor 10					
Model	1	2.4769	2.4769	2.61	.1123
Error	51	48.3774	.9486		
Factor 11					
Model	1	.0034	.0034	.00	.9546
Error	51	52.9837	1.0389		
Factor 12					
Model	1	1.3151	1.3151	1.32	.2555
Error	51	50.7112	.9943		

Table 10

ANOVA: Relationship of Highest Degree Earned to Factors 1-12

Source	<u>d.f.</u>	<u>SS</u>	<u>MS</u>	<u>F</u>	<u>Pr F</u>
Factor 1					
Model	3	5.03277	1.6776	1.75	.1691
Error	50	47.9673	.9593		
Factor 2					
Model	3	.6517	.2172	.21	.8908
Error	50	52.3483	1.0470		
Factor 3					
Model	3	3.79699	1.2657	1.29	.2893
Error	50	49.2030	.9840		
Factor 4					
Model	3	2.0536	.6845	.67	.5734
Error	50	50.9464	1.0189		
Factor 5					
Model	3	1.9251	.6417	.63	.6002
Error	50	51.0750	1.0215		
Factor 6					
Model	3	1.7910	.5970	.58	.6290
Error	50	51.2090	1.0242		
Factor 7					
Model	3	2.5636	.8545	.85	.4747
Error	50	50.4364	1.0087		
Factor 8					
Model	3	1.5782	.5261	.51	.6762
Error	50	51.4217	1.0284		
Factor 9					
Model	3	4.7500	1.5833	1.64	.1918
Error	50	48.2500	.9659		
Factor 10					
Model	3	3.3841	1.1280	1.14	.3433
Error	50	49.6159	.9923		
Factor 11					
Model	3	2.9500	.9834	.98	.4086
Error	50	50.0500	1.0001		
Factor 12					
Model	3	1.0251	.3417	.33	.8046
Error	50	51.9750	1.0395		

Table 11

ANOVA: Relationship of Years of Teaching Experience to Factors 1 - 12.

Source	<u>d.f.</u>	<u>SS</u>	<u>MS</u>	<u>F</u>	<u>Pr F</u>
Factor 1					
Model	4	5.3671	1.3418	1.39	.2508
Error	48	46.2581	.9637		
Factor 2					
Model	4	2.4954	.6239	.61	.6543
Error	48	48.7361	1.0150		
Factor 3					
Model	4	3.9796	.9949	.99	.4229
Error	48	48.3146	1.0066		
Factor 4					
Model	4	4.5556	1.1389	1.13	.3528
Error	48	48.3013	1.0063		
Factor 5					
Model	4	4.0011	1.0003	.99	.4195
Error	48	48.2616	1.0054		
Factor 6					
Model	4	2.8704	.7176	.69	.6024
Error	48	49.9130	1.0399		
Factor 7					
Model	4	1.7151	.4288	.40	.8062
Error	48	51.1848	1.0664		
Factor 8					
Model	4	.4569	.1142	.11	.9802
Error	48	52.1311	1.0861		
Factor 9					
Model	4	1.9789	.4947	.48	.7538
Error	48	49.9833	1.0413		
Factor 10					
Model	4	6.2950	1.5738	1.70	.1665
Error	48	44.5593	.9283		
Factor 11					
Model	4	8.3448	2.0862	2.24	.0782
Error	48	44.6422	.9300		
Factor 12					
Model	4	12.6171	3.1543	3.84	.0087*
Error	48	39.4092	.8210		

\*p &lt; .05



The variable area of teaching responsibility had a significant relationship with factor 4 and factor 10. Factor 4, the government's responsibility to provide therapeutic help for handicapped students, had a  $p$  of .0498 and factor 10, academic standards for mentally retarded students, had a  $p$  of .0389 (see Table 12).

Although there were some statistically significant differences, there was no general trend which could be interpreted as any of the variables contributing systematically or consistently to the expressed attitudes toward handicapped students.

The Pearson product-moment correlation was used to determine the relationships between the twelve factors and experience with handicapped persons. Experience was divided into nine variables for purposes of statistical analysis: all experiences with physically handicapped students (XPH), courses and workshops dealing with physically handicapped students (CPH), these two variables combined for total experience with physically handicapped students (TXPH), all experiences with mentally retarded persons (XMR), courses and workshops in mental retardation (CMR), these two variables combined for total experience with mentally retarded persons (TXMR), experience with emotionally disturbed (XED), experience with learning disabled (XLD), and a total of these scores (TXPH, TXMR, XED, XLD) for over-all experience with handicapped persons (AX).

No significant correlations were found between the twelve factors and the experience variables. The variable courses and workshops concerning physically handicapped correlated with factor 5 (related to special school setting for physically and mentally handicapped) at  $-.43$ .

Table 12

ANOVA: Relationship of Area of Teaching Responsibility to Factors 1-12.

Source	<u>d.f.</u>	<u>SS</u>	<u>MS</u>	<u>F</u>	<u>Pr F</u>
Factor 1					
Model	6	4.4005	.7334	.70	.6496
Error	45	47.0249	1.0450		
Factor 2					
Model	6	4.1814	.6969	.69	.6574
Error	45	45.3414	1.0076		
Factor 3					
Model	6	7.4243	1.2374	1.24	.3037
Error	45	44.8652	.9970		
Factor 4					
Model	6	12.1838	2.0306	2.31	.0498*
Error	45	39.5531	.8790		
Factor 5					
Model	6	7.2703	1.2117	1.21	.3179
Error	45	44.9912	.9998		
Factor 6					
Model	6	5.9655	.9943	.97	.4535
Error	45	45.9161	1.0204		
Factor 7					
Model	6	6.1105	1.0184	.98	.4503
Error	45	46.7895	1.0390		
Factor 8					
Model	6	3.6723	.6130	.56	.7568
Error	45	48.8633	1.0859		
Factor 9					
Model	6	5.4401	.9067	.88	.5194
Error	45	46.5215	1.0338		
Factor 10					
Model	6	12.5763	2.0960	2.47	.0379*
Error	45	38.2467	.8499		
Factor 11					
Model	6	4.6518	.7753	.72	.6341
Error	45	48.3320	1.0740		
Factor 12					
Model	6	.74386	.1240	.11	.9948
Error	45	50.5598	1.1236		

\* $p < .05$

(A negative score indicates a positive attitude toward handicapped students.) Courses and workshops concerning mental retardation correlated with factor 5 at  $-.36$ . However, this same variable (coursework in mental retardation) correlated with factor 7 (special schools for physically handicapped) at  $+.57$ , indicating a less accepting view toward physically handicapped (see Table 13).

#### Strength of Opinion

The second research question was:

Is strength of opinion related to years of teaching experience, previous experience with handicapped students, or with course work and training in areas of exceptionality?

Some of the studies reviewed suggested that the more experience a teacher had with handicapped students, the stronger the attitude or opinion held would be, whether in a negative or positive direction. To investigate the research question a score, strength of opinion, was computed for each respondent using only the strength of opinion responses. The largest correlation coefficients were  $.23389$  (experience with mentally retarded persons) and  $.23407$  (experience with learning disabled students) (see Table 14).

#### Mainstreaming Students into Music Classes

The third research question was:

Are teachers from any one area of teaching responsibility more willing to accept handicapped students into their music classes or performance groups?

The teachers were asked to indicate their willingness to have students with each of the following handicaps mainstreamed into general music classes and into performance groups: blind, partially blind, orthopedically impaired, spastic, speech/language impaired, educable

Table 13

Correlation: Experience with Handicapped Students with Factors 1-12

Variables	XPH	CPH	TXPH	XMR	CMR	TXMR	XED	XLD	AX
Factor 1	-.18192	.00647	-.04836	-.20257	.09979	-.08903	-.13441	-.00970	-.06738
Factor 2	-.22549	-.05098	-.21717	-.27071	.05014	-.29921	-.28918	-.16011	-.19916
Factor 3	-.07312	.21843	.00852	-.08668	.20501	-.00187	-.17214	-.24294	-.02997
Factor 4	-.08255	-.23153	.00592	.15955	.09054	.13609	-.20860	-.00069	.09657
Factor 5	-.01881	-.42803	-.02413	.03807	-.36399	-.96262	-.02220	.20260	-.04822
Factor 6	.03580	.04190	.04149	-.10256	-.25367	-.10722	.07703	.08080	.01014
Factor 7	.05800	.27776	.10743	.08278	.57024	.17916	.02249	.06831	.11697
Factor 8	-.17933	.12777	-.13655	.00045	.15305	.04461	-.17092	-.01277	-.10494
Factor 9	-.10333	.30600	-.05579	-.06475	.01483	-.04856	-.22729	.01455	-.02809
Factor 10	.32906	.12429	.34914	.22591	.14338	.27660	.19921	.16118	.33008
Factor 11	-.13706	.17137	-.03446	-.15485	-.26765	-.07162	-.06297	-.21780	-.06541
Factor 12	-.11447	-.05290	-.15285	-.20852	-.04118	-.24511	-.06505	-.15816	-.12872

**Note:** See page 54 for explanation of variables.

Table 14

Correlation: Strength of Opinion with Experience

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Experience Variable	Strength Score
Years of Teaching Experience	.04911
AX	.13582
XPH	.13832
CPH	-.04111
XMR	.23389
CMR	.09977
XED	-.06049
XLD	.23407

Note. See page 54 for explanation of variables.

mentally retarded, trainable mentally retarded, emotionally disturbed, learning disabled, and other health impaired. (The definition of each handicap is given in Appendix E.)

The elementary general music teachers were the most willing to have handicapped students mainstreamed into their music classes. The mean percentage of this group for the ten handicaps was 74%. The handicaps with the highest acceptance percentage (86%) were orthopedically impaired, speech/language impaired, and educable mentally retarded. The types of handicapped students that the elementary general music teachers were least willing to accept were blind and other health impaired (60%). The junior high general music teachers had a mean acceptance percentage of 57%; however, the number of respondents in this category is only six (see Table 15).

Junior high and secondary instrumental teachers were more open to the mainstreaming of handicapped students than were junior high and secondary choral music teachers. The mean percentage for each instrumental teacher group was 47%. The mean percentages for the choral teachers were 40% and 36% respectively. The elementary instrumental group had only three in the category: the mean percentage was 40% (see Table 15).

The types of handicapped students which the instrumental teachers were the most willing to accept into their performance groups were orthopedically impaired and speech/language impaired. Trainable mentally retarded, spastic, and blind were the least acceptable. The opinions of the junior high instrumental teachers paralleled closely those of the secondary instrumental teachers. However, the opinions of the junior

high choral teachers were quite divergent from those of the senior high choral teachers. Sixty-three percent of the junior high choral teachers were open to mainstreaming orthopedically impaired, educable mentally retarded, and learning disabled students. The secondary choral teachers rated these types of handicaps at 57%, 28%, and 43% respectively. The types of handicaps most acceptable to the secondary choral teachers were blind and partially blind (86% each). Junior high choral teachers were least willing to have other health impaired students in their performance groups; secondary were least willing to have emotionally disturbed and trainable mentally retarded students (see Table 15).

The respondents were asked to indicate the handicapping conditions which they felt qualified or capable of handling in an educational setting. The specified handicaps included blind, partially blind, deaf, partially deaf, orthopedically impaired, spastic (cerebral palsied), speech/language impaired, educable mentally retarded, trainable mentally retarded, emotionally disturbed, learning disabled, and other health impaired (see Table 16).

The type of handicap which the responding music teachers felt the most qualified to handle was educable mentally retarded (63%). This was followed by orthopedically impaired (54%), partially blind, and learning disabled (51% each). The least acceptable type of handicap was totally deaf (3%). The general music teachers had the highest mean percentage (47%). The junior high instrumental teachers were second with a 42% mean score. The junior high choral teachers had the lowest mean percentage (19%).

Table 15

Types of Handicapped Students Which Music Teachers Are Willing to Accept in General Music Classes or Performance Groups

Disability	*Elem. Gen. Music	*Jr.Hi Gen. Music	Jr.Hi Choral Music	Sec. Choral Music	Elem. Instr.	Jr.Hi Instr.	Sec. Instr.
Blind	9/60%	2/33%	4/50%	6/86%	1/33%	3/25%	3/23%
Partially Blind	12/80%	3/50%	3/38%	6/86%	3/100%	7/58%	8/61%
Orthopedically Impaired	13/86%	4/67%	5/63%	4/57%	2/67%	9/75%	9/69%
Spastic	10/67%	2/33%	2/25%	2/28%	0/-	3/25%	2/15%
Speech/Ing. Impaired	13/86%	3/50%	2/25%	0/-	3/100%	9/75%	9/69%
Educable Ment. Retarded	13/86%	5/83%	5/63%	2/28%	1/33%	4/33%	8/61%
Trainable Ment. Retarded	12/80%	2/33%	2/25%	0/-	0/-	2/16%	2/15%
Emotionally Disturbed	10/67%	4/67%	3/38%	0/-	0/-	5/42%	6/46%
Learning Disabled	10/67%	5/83%	5/63%	3/43%	1/33%	7/58%	7/53%
Other Health Impaired	9/60%	4/67%	1/13%	2/28%	1/33%	7/58%	8/61%
Mean	74%	57%	40%	36%	40%	47%	47%

Note. Data for the elementary and junior high general music teachers are based on their responses to the category "mainstreamed into general music classes"; the data for the others are based on their responses to the category "mainstreamed into performance groups." First entry in each column indicates number of teachers in each category who are willing to accept the specified types of handicapped student. Second entry indicates what percentage the first entry is of all the teachers in the category.



Table 16

## Types of Handicapped Students Music Teachers Feel Qualified to Teach

Disability	Elem. Gen. Music	Jr.Hi Gen. Music	Jr.Hi Choral Music	Sec. Choral Music	Elem. Instr.	Jr.Hi Instr.	Sec. Instr.
Blind	7/47%	0/-	2/25%	3/43%	0/-	3/25%	2/15%
Partially Blind	10/67%	3/50%	2/25%	4/57%	1/33%	7/58%	6/46%
Orthopedically Impaired	9/60%	4/67%	0/-	3/43%	2/67%	9/75%	8/61%
Spastic	5/33%	2/33%	1/13%	2/28%	0/-	2/16%	1/8%
Speech/Ing. Impaired	6/40%	3/50%	2/25%	0/-	2/67%	9/75%	6/46%
Educable Ment. Retarded	13/86%	6/100%	3/38%	4/57%	1/33%	6/50%	7/53%
Trainable Ment. Retarded	8/53%	2/33%	2/25%	0/-	0/-	2/16%	1/8%
Emotionally Disturbed	7/47%	3/50%	2/25%	0/-	0/-	4/33%	2/15%
Learning Disabled	9/60%	5/83%	3/38%	4/57%	1/33%	8/67%	3/23%
Deaf	1/7%	0/-	0/-	0/-	0/-	0/-	1/8%
Partially Deaf	5/33%	3/50%	0/-	2/28%	0/-	6/50%	6/46%
Other Health Impaired	5/33%	3/50%	1/13%	2/28%	1/33%	5/42%	4/31%
Mean	47%	47%	19%	29%	22%	42%	30%

Note. First entry in each column indicates number of teachers in each category who feel qualified to teach each specified handicap. Second entry indicates what percentage the first entry is of all the teachers in the category.

In the final question the respondents were asked to indicate which handicapped students they would accept in their music classes if there were special training (e.g., in-service workshop) and/or a resource person available to help. The percentages in all ten categories increased. The largest percentage gain (14%) was in willingness to have blind students in music classes (see Table 17).

Table 17

Types of Handicapped Students Music Teachers Are Willing to Have Mainstreamed if Resource or Workshop Help Is Available

Disability	Elem. Gen. Music	Jr.Hi Gen. Music	Jr.Hi Choral Music	Sec. Choral Music	Elem. Instr.	Jr.Hi Instr.	Sec. Instr.
Blind	10/67%	2/33%	6/75%	6/86%	3/100%	6/59%	4/31%
Partially Blind	11/73%	3/50%	6/75%	7/100%	3/100%	9/75%	10/77%
Orthopedically Impaired	12/80%	3/50%	3/38%	6/86%	3/100%	9/75%	9/69%
Spastic	10/67%	2/33%	1/13%	3/43%	1/33%	5/42%	3/23%
Speech/lang. Impaired	11/73%	3/50%	5/63%	2/28%	3/199%	9/75%	10/77%
Educable Ment. Retarded	12/80%	5/83%	6/75%	5/71%	2/67%	6/50%	7/54%
Trainable Ment. Retarded	9/60%	2/33%	5/63%	1/14%	2/67%	3/25%	4/31%
Emotionally Disturbed	10/67%	4/67%	2/25%	3/43%	1/33%	6/50%	5/38%
Learning Disabled	11/73%	4/67%	5/63%	3/43%	2/67%	8/67%	8/62%
Deaf	9/60%	1/17%	2/25%	1/14%	1/33%	2/16%	2/15%
Partially Deaf	10/67%	4/67%	1/13%	3/43%	1/33%	7/58%	9/69%
Other Health Impaired	9/60%	3/50%	1/13%	4/57%	2/67%	6/50%	6/46%
Mean	69%	50%	45%	52%	67%	53%	49%

Note. First entry in each column indicates number of teachers in each category who are willing to have specified handicapped students mainstreamed if resource help or a workshop is available. Second entry indicates what percentage the first entry is of all the teachers in the category.

CHAPTER V  
DISCUSSION AND RECOMMENDATIONS

The purposes of this study were, first, to assess the attitudes of selected North Carolina public school music educators toward mentally and physically handicapped students, and second, to determine their willingness to have these students mainstreamed or integrated into their music classes. The research questions investigated were:

1. Are there differences in attitudes expressed by music educators as a function of age, sex, years of teaching experience, educational level, previous experience with handicapped students, course work and training in areas of exceptionality, or area of teaching responsibility?
2. Is strength of opinion related to years of teaching experience, previous experience with handicapped students, or with course work and training in areas of exceptionality?
3. Are teachers from any one area of teaching responsibility more willing to accept handicapped students into their music classes or performance groups?

Discussion

None of the variables listed in Research Question 1 contributed in any significant way to the positive or negative attitudes expressed by the respondents. The lack of relationship between sex and positive attitudes as expressed by the factor scores is in agreement with the results of several other studies (Saunders, 1969; Kulbeida, 1972; and Lazar and Sigler, 1976), but in conflict with the results found by Siller and Chipman (1967). Age did not contribute significantly to differences in attitudes. Studies by Saunders (1969), Kulbeida (1972), and Lazar and Sigler (1976) confirmed this finding; however, Jacobs (1974)

found that teachers under 30 had more positive attitudes toward educable mentally handicapped students than those over 30 had.

Neither educational level nor years of teaching experience contributed significantly to differences in attitudes. Educational level was not found to be significant in studies by Kulbeida (1972) and by Lazar and Sigler (1976). Years of teaching experience did contribute significantly to attitude differences in studies conducted by Jacobs (1974), Coffelt (1970), and Mandell (1976), and did not contribute significantly in studies by Sund (1975), Lazar and Sigler (1976), Combs and Harper (1969), and Kulbeida (1972).

Contrary to the trend established by the results of the normative data of the Personal Questionnaire, area of teaching responsibility did not contribute significantly to differences in attitudes. Music teachers who were primarily concerned with performance areas indicated on the PQ less willingness to have various types of handicapped students mainstreamed into their performance groups than did general music teachers toward the mainstreaming of the same types of handicapped students into general music classes. The secondary choral teachers were the least willing to mainstream handicapped students into their performance groups (see Table 15). The area of teaching responsibility categorization of the respondent was determined by the primary teaching responsibility. However, many of the music educators had responsibilities in two or three areas, so that their responses would not reflect the viewpoint of only one teaching responsibility.

Some of the studies reviewed (Haring et al., 1958; Sund, 1975; Skrtic, 1976; Herah et al., 1977) suggested experience with handicapped

students and/or course work in related subject areas would help to bring about more favorable or accepting attitudes toward mainstreaming these students. In this study, though, none of the experience variables correlated at a high level with any of the twelve attitude factors.

Several causes may have contributed to this lack of significant correlation. The manner in which the experience data were collected from the respondents may have been too crude and/or cursory. The method of computing the experience scores may not have reflected fine enough distinctions in the range of experiences the teachers have had.

Another consideration is the amount of mainstreaming experience the teachers have had. Students with some types of handicaps have been mainstreamed into the music classes on a regular basis for at least two years. The comments teachers made on the questionnaire implied that their attitudes were a reflection of the positive or negative experiences they have already had with these handicapped students. Few of the teachers have had a large enough population of handicapped students mainstreamed over a long enough period of time to have sufficient positive and negative experiences to serve as a basis for their attitude position.

Strength of opinion, contrary to results from some other studies (Shaw, 1971; Jordan, 1970), did not correlate strongly with the experience variables. It may be that a person who holds strong opinions does so as a result of some personality characteristic rather than based on any specific experience factors.

In all disability categories listed, 60% or more of the responding elementary general music teachers were willing to have these students mainstreamed into their classes. The secondary choral teachers were the

most resistant to mainstreaming in their choral groups--none of the respondents were willing to accept speech/language impaired, trainable mentally retarded, or emotionally disturbed. Their mean percentage score was 36%. In comparison, the mean percentage score for secondary instrumental teachers was 47%. Why would secondary instrumental teachers be more open to handicapped students than choral directors? It may be that instrumental directors have a much firmer control over who participates in the instrumental performance group by virtue of the fact that the student must already be able to play an instrument at an acceptable level of performance. The choral teacher, however, has much less definitive criteria available for determining membership in a choral performing group.

Although the variables analyzed did not display any significant relationships to attitudes as defined by the twelve factors, the Personal Questionnaire data indicated that most music educators are willing to have handicapped students mainstreamed into their music classes or performance groups. Very few expressed totally negative responses to the concept of mainstreaming. Some types of handicaps were more acceptable than others. In comparing the percentage of teachers who felt qualified to handle the specific handicaps to their responses on willingness to have these types of handicapped students mainstreamed if some form of aid were available, considerable gain was made in all categories: blind--28% to 58%, partially blind--51% to 77%, deaf--3% to 28%, partially deaf--34% to 55%, orthopedically impaired--54% to 70%, spastic--20% to 39%, speech/language impaired--44% to 67%, educable mentally retarded--63% to 67%, trainable mentally retarded--23% to 41%, emotionally

disturbed--28% to 48%, learning disabled--51% to 64%, and other health impaired--33% to 48%.

This study reveals that the music teachers who responded tend to be accepting of the mandate of PL 94-142 that handicapped students to the greatest extent possible be educated with nonhandicapped students. If in-service help and/or resource personnel are available, many music educators are willing to try to teach all types of handicapped students.

#### Recommendations

1. Additional reliability tests need to be performed on the ATHS. Specifically, a test/retest design for reliability would significantly strengthen the confidence that could be placed in the data collected from the ATHS.
2. Although clearly grouped constructs were defined through the factor analysis, further consideration needs to be given to what does delineate positive attitudes toward handicapped students. Is it, as is assumed in this study and as is suggested in some of the literature, those attitudes which view handicapped students deviating as little as possible from nonhandicapped students?
3. A more refined, definitive method of determining experience with handicapped students needs to be developed.
4. A larger sample is needed so that the statistical analysis performed will be more reliable. Some cells had too few members; for example, there were only three whose primary area was elementary instrumental music.
5. Random sampling from a larger population is needed for any generalizability of the results.



6. A longitudinal study could determine if the respondents have any significant changes in attitude as a result of more years of experience with mainstreaming.

7. The use of several types of attitude instruments may provide a clearer, more accurate profile of the respondent's feelings or attitudes toward handicapped students.

Conducting experimental research and controlled studies in affective areas such as attitudes is difficult; little definitive information is available to guide the researcher. However, the important role of attitudes in shaping behavior requires that continued efforts be made to research and develop valid methods of measurement.

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## Appendix A

## Attitudes Toward Handicapped Students

**Instructions:** Given below are statements of opinion about physically and mentally handicapped students. Please indicate if you agree or disagree with each statement. Next indicate for each statement how strongly you feel about your choice. Mark your answer by placing a circle around the number in front of the answer you select.

---

1. Teachers of physically handicapped students should be less strict than other teachers.
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer.
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |
2. In general, physically handicapped students are just as intelligent as nonhandicapped students.
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer.
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |
3. Most physically handicapped students feel sorry for themselves.
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer.
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |
4. There should not be special schools for physically handicapped children.
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer.
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |
5. All physically handicapped students should attend a special school for the handicapped.
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer.
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |

6. It is the responsibility of the government to provide for the educational needs of physically handicapped students.

1. Disagree 2. Agree

Strength of your answer.

1. Not strong 3. Strong  
2. Moderately strong 4. Very strong

7. Most physically handicapped students feel that they are not as good as other students.

1. Disagree 2. Agree

Strength of your answer.

1. Not strong 3. Strong  
2. Moderately strong 4. Very strong

8. It is the responsibility of the government to provide the therapy needed by physically handicapped students.

1. Disagree 2. Agree

Strength of your answer.

1. Not strong 3. Strong  
2. Moderately strong 4. Very strong

9. Most physically handicapped students should not be expected to meet the same academic standards as nonhandicapped students.

1. Disagree 2. Agree

Strength of your answer.

1. Not strong 3. Strong  
2. Moderately strong 4. Very strong

10. Teachers should maintain the same behavioral expectancies for physically handicapped students as for other students in their classes.

1. Disagree 2. Agree

Strength of your answer.

1. Not strong 3. Strong  
2. Moderately strong 4. Very strong

11. It is more difficult for a physically handicapped student to lead a normal life in school.

1. Disagree 2. Agree

Strength of your answer.

1. Not strong 3. Strong  
2. Moderately strong 4. Very strong

12. Generally, physically handicapped students are more easily upset than nonhandicapped students.

1. Disagree 2. Agree

Strength of your answer.

1. Not strong 3. Strong  
2. Moderately strong 4. Very strong

13. It is very difficult for physically handicapped students to have a normal social life.

1. Disagree 2. Agree

Strength of your answer.

1. Not strong 3. Strong  
2. Moderately strong 4. Very strong

14. A teacher has to be more careful of what is said in the presence of physically handicapped students.

1. Disagree 2. Agree

Strength of your answer.

1. Not strong 3. Strong  
2. Moderately strong 4. Very strong

15. Teachers of mentally retarded students should be less strict than other teachers.

1. Disagree 2. Agree

Strength of your answer

1. Not strong 3. Strong  
2. Moderately strong 4. Very strong

16. Most mentally retarded students feel sorry for themselves.

1. Disagree 2. Agree

Strength of your answer

1. Not strong 3. Strong  
2. Moderately strong 4. Very strong

17. There should not be special schools for mentally retarded children.

1. Disagree 2. Agree

Strength of your answer

1. Not strong 3. Strong  
2. Moderately strong 4. Very strong

18. All mentally retarded students should attend a special school for the mentally retarded.
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |
19. It is the responsibility of the government to provide for the educational needs of mentally retarded students.
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |
20. It is the responsibility of the government to provide for any therapeutic help needed by mentally retarded students.
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |
21. Mentally retarded students should not be expected to meet the same academic standards as nonhandicapped students.
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |
22. Teachers should maintain the same behavioral expectancies for mentally retarded students as for other students in their classes.
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |
23. It is almost impossible for a mentally retarded student to have a normal life in school.
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |



30. Physically handicapped students should be mainstreamed into music classes whenever possible.
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer.
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |
31. Blind students should be taught music only in homogeneously grouped classes (classes with only blind students).
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer.
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |
32. Deaf students do not need music instruction.
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer.
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |
33. Partially deaf students should have some type of music instruction.
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer.
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |
34. Physically handicapped students should be permitted to participate in school musical performing groups.
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer.
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |
35. Mentally retarded students should be permitted to participate in school musical performing groups.
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer.
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |
36. Mentally retarded students should be taught music only in homogeneously grouped classes (classes with only mentally retarded students).
- |             |          |
|-------------|----------|
| 1. Disagree | 2. Agree |
|-------------|----------|
- Strength of your answer.
- |                      |                |
|----------------------|----------------|
| 1. Not strong        | 3. Strong      |
| 2. Moderately strong | 4. Very strong |

## Appendix B

## Personal Questionnaire

1. Place an X beside your age group.

 20-29      30-39      40-49      50-59      60-69

2. Place an X beside your sex.

 Male                       Female

3. Place an X beside your highest degree completed.

 Bachelor's degree                       Master's degree Study past Master's                       Doctor's degree

4. Place an X beside the numbers which best describe the population of the area of community in which you teach.

 Below 5,000      5,000-15,000      15,000-30,000 30,000-65,000      65,000-100,000      100,000-300,000 Over 300,000

5. Place an X beside the term that best describes your number of years of teaching experience.

 1      2-4      5-10      11-15      16 or more

6. Place the number one (1) in front of the best description of your
- primary
- teaching responsibility (the one to which you devote the most time). If you have other teaching responsibilities, number them according to amount of time devoted to each, in descending order.

 Elementary general music Junior High general music Junior High choral music Secondary choral music Elementary instrumental music Junior High instrumental music Secondary instrumental music Other \_\_\_\_\_  
(Please identify)

7. If you have had personal experience with any of the categories listed below, indicate the frequency of this experience by placing an X under the appropriate heading.

	<u>Once</u>	<u>Occasionally</u>	<u>Regularly</u>
I have had <u>mainstreamed</u> into my music classes:			
Blind students	_____	_____	_____
Partially blind students	_____	_____	_____
Deaf students	_____	_____	_____
Partially deaf students	_____	_____	_____
Orthopedically impaired students	_____	_____	_____
Spastic (cerebral palsied)	_____	_____	_____
Speech/language impaired	_____	_____	_____
Educable mentally retarded	_____	_____	_____
Trainable mentally retarded	_____	_____	_____
Emotionally disturbed	_____	_____	_____
Learning disabled	_____	_____	_____
Other health impaired	_____	_____	_____

I have taught music to a homogeneously grouped (all students with the same handicap) classroom of the following handicaps:

	<u>Once</u>	<u>Occasionally</u>	<u>Regularly</u>
Blind students	_____	_____	_____
Partially blind students	_____	_____	_____
Deaf students	_____	_____	_____
Partially deaf students	_____	_____	_____
Orthopedically impaired students	_____	_____	_____
Spastic (cerebral palsied)	_____	_____	_____
Speech/language impaired	_____	_____	_____
Educable mentally retarded	_____	_____	_____
Trainable mentally retarded	_____	_____	_____



7. (continued)

Once Occasionally Regularly

Emotionally disturbed

\_\_\_\_\_

Learning disabled

\_\_\_\_\_

Other health impaired

\_\_\_\_\_

8. Place an X in front of each statement which describes your experiences relating to the handicapped. You may mark more than one.

\_\_\_ I have learned about physically handicapped students through personal reading.

\_\_\_ I have learned about mentally retarded students through personal reading.

\_\_\_ I have studied about physically handicapped persons in:

\_\_\_ workshops (how many? \_\_\_) \_\_\_ college courses (how many? \_\_\_)

\_\_\_ I have studied about mentally retarded persons in:

\_\_\_ workshops (how many? \_\_\_) \_\_\_ college courses (how many? \_\_\_)

\_\_\_ I have a friend who is physically handicapped.

\_\_\_ I have a friend who is mentally retarded.

\_\_\_ I have worked personally with physically handicapped persons in the following capacity/capacities (e.g., counselor in camp): (Please list all appropriate experiences.)

\_\_\_ I have worked personally with mentally retarded students in the following capacity/capacities (e.g., counselor in camp): (Please list all appropriate experiences.)

\_\_\_ A relative is/was physically handicapped.

\_\_\_ A relative is/was mentally retarded.

\_\_\_ Someone in my immediate family is/was physically handicapped.

\_\_\_ Someone in my immediate family is/was mentally retarded.

\_\_\_ Other  
(Please explain)

9. Which of the following students with special needs would you be willing to have (A) in you general music classes or (B) in your performance groups?

<u>(A) General Music Classes</u>	<u>(B) Music Performance Groups</u>
<u>    </u> Blind students	<u>    </u> Blind students
<u>    </u> Partially blind students	<u>    </u> Partially blind students
<u>    </u> Orthopedically impaired students	<u>    </u> Orthopedically impaired students
<u>    </u> Spastic (cerebral palsied)	<u>    </u> Spastic (cerebral palsied)
<u>    </u> Speech/language impaired	<u>    </u> Speech/language impaired
<u>    </u> Educable mentally retarded	<u>    </u> Educable mentally retarded
<u>    </u> Trainable mentally retarded	<u>    </u> Trainable mentally retarded
<u>    </u> Emotionally disturbed	<u>    </u> Emotionally disturbed
<u>    </u> Learning disabled	<u>    </u> Learning disabled
<u>    </u> Other health impaired	<u>    </u> Other health impaired

10. Which of the following types of handicaps do you feel qualified or capable of handling in an educational setting (specifically your music class)? Circle the number of each.

- |                               |                                |
|-------------------------------|--------------------------------|
| 1. Blind students             | 7. Speech/language impaired    |
| 2. Partially blind students   | 8. Educable mentally retarded  |
| 3. Deaf students              | 9. Trainable mentally retarded |
| 4. Partially deaf students    | 10. Emotionally disturbed      |
| 5. Orthopedically impaired    | 11. Learning disabled          |
| 6. Spastic (cerebral palsied) | 12. Other health impaired      |

11. Which of the following types of handicaps would you be willing to accept in your music classes if special training for you (e.g., in-service workshop) and/or a resource person were available to help? Circle the number of each.

- |                               |                                |
|-------------------------------|--------------------------------|
| 1. Blind students             | 7. Speech/language impaired    |
| 2. Partially blind students   | 8. Educable mentally retarded  |
| 3. Deaf students              | 9. Trainable mentally retarded |
| 4. Partially deaf students    | 10. Emotionally disturbed      |
| 5. Orthopedically impaired    | 11. Learning disabled          |
| 6. Spastic (cerebral palsied) | 12. Other health impaired      |

12. In the space below, please express any comments or reactions you have concerning the questionnaire or your responses to it. In addition, if you desire, please relate any personal experiences you have had with handicapped students which would be pertinent. Thank you.

Appendix C  
Cover Letter

5509-G Tomahawk Drive  
Greensboro, North Carolina  
January 12, 1979

Dear Music Educator:

The passage of Public Law 94-142, "The Education of the Handicapped Act," portends changes in our public schools. Many more handicapped students will be served in our regular public school educational settings. Public school music teachers will be affected. Some of you have already begun to experience the changes which are being brought about by this federal law.

I believe the successful implementation of the provisions of PL 94-142 will depend to a great extent upon the attitudes of you, the music educators, who will be teaching these handicapped students. I have attempted to develop an instrument to assess the attitudes of public school music teachers toward physically and mentally handicapped students and, more specifically, toward the mainstreaming of these students into music classes.

Some of you helped me last year as I was developing the questionnaire. Thank you for that help. I am again appealing to you to take time from your busy schedule to express your attitudes and opinions about the integration of these handicapped students into your music classes. Please try to answer frankly and candidly expressing both positive or negative feelings. A stamped-addressed enveloped is enclosed for you to return the questionnaire to me.

Christmas programs are over, contests and festivals are still in the future, semester break is here, now is a good time to answer the questionnaire. Thanks for your cooperation.

Sincerely,

Linda Kay Damer  
Ed.D. Candidate in Music Education  
University of North Carolina--Greensboro  
School of Music

## Appendix D

## Statements from the ATHS Grouped by Factors

## Factor 1

27. Mentally retarded students should be mainstreamed into the regular classroom if at all possible.
29. Mentally retarded students should be mainstreamed into music classes whenever possible.
35. Mentally retarded students should be permitted to participate in school musical performing groups.
36. Mentally retarded students should be taught music only in homogeneously grouped (classes with only mentally retarded students) classes.

## Factor 2

11. It is more difficult for a physically handicapped student to lead a normal life in school.
13. It is very difficult for physically handicapped students to have a normal social life.
23. It is almost impossible for a mentally retarded student to have a normal life in school.
24. It is difficult for mentally retarded students to have a normal social life.
25. Most mentally retarded students feel that they are not as good as other students.

## Factor 3

2. In general, physically handicapped students are just as intelligent as nonhandicapped students.
9. Most physically handicapped students should not be expected to meet the same academic standards as nonhandicapped students.
28. Physically handicapped students should be mainstreamed into the regular classroom.
30. Physically handicapped students should be mainstreamed into music classes whenever possible.

34. Physically handicapped students should be permitted to participate in school musical performing groups.

#### Factor 4

8. It is the responsibility of the government to provide the therapy needed by physically handicapped students.

20. It is the responsibility of the government to provide for any therapeutic help needed by mentally retarded students.

#### Factor 5

1. Teachers of physically handicapped students should be less strict than other teachers.

5. All physically handicapped students should attend a special school for the handicapped.

15. Teachers of mentally retarded students should be less strict than other teachers.

16. Most mentally retarded students feel sorry for themselves.

18. All mentally retarded students should attend a special school for the mentally retarded.

#### Factor 6

32. Deaf students do not need music instruction.

33. Partially deaf students should have some type of music instruction.

#### Factor 7

4. There should not be special schools for physically handicapped students.

31. Blind students should be taught music only in homogeneously grouped classes (classes with only blind students).

#### Factor 8

3. Most physically handicapped students feel sorry for themselves.

7. Most physically handicapped students feel that they are not as good as other students.

12. Generally, physically handicapped students are more easily upset than nonhandicapped students.

Factor 9

17. There should not be special schools for mentally retarded children.

Factor 10

21. Mentally retarded students should not be expected to meet the same academic standards as nonhandicapped students.

Factor 11

10. Teachers should maintain the same behavioral expectancies for physically handicapped students as for other students in their classes.

14. A teacher has to be more careful of what is said in the presence of physically handicapped students.

Factor 12

6. It is the responsibility of the government to provide for the educational needs of physically handicapped students.

19. It is the responsibility of the government to provide for the educational needs of mentally retarded students.

## Appendix E

## Definitions of Handicaps

Physically Handicapped includes students who are blind, partially blind, deaf, partially deaf, orthopedically impaired, spastic, speech/language impaired, learning disabled, and those who have other health impairments as defined below.

Mentally Retarded includes educable and trainable mentally retarded students. PL 94-142 defines mentally retarded as "significantly subaverage general intellectual functioning existing concurrently with deficits in adaptive behavior and manifested during the developmental period, which adversely affects a child's educational performance."

Blind means without any functional sight.

Partially Blind means a "visual impairment which, even with correction, adversely affects a child's educational performance."

Deaf means a hearing impairment "which is so severe that the child is impaired in processing linguistic information through hearing, with or without amplification, which adversely affects educational performance."

Partially Deaf means "a hearing impairment, whether permanent or fluctuating, which adversely affects a child's educational performance but which is not included under the definition of 'deaf.'"

Orthopedically Impaired means a "severe orthopedic impairment which adversely affects a child's educational performance. The term includes impairments caused by congenital anomaly (e.g., clubfoot, absence of some member, etc.), impairments caused by disease (e.g., poliomyelitis, bone tuberculosis, etc.), and impairments from other causes (e.g., amputations, and fractures or burns which cause contractures)."

Spastic means an impairment caused by cerebral palsy.

Speech/language Impaired means "a communication disorder, such as stuttering, impaired articulation, a language impairment, or a voice impairment, which adversely affects a child's educational performance."

Emotionally Disturbed means "a condition exhibiting one or more of the following characteristics over a long period of time and to a marked degree, which adversely affects educational performance: (1) an inability to learn which cannot be explained by intellectual, sensory, or health factors; (2) an inability to build or maintain satisfactory interpersonal relationships with peers and teachers; (3) inappropriate types of behavior or feelings under normal



circumstances; (4) a general pervasive mood of unhappiness or depression; or (5) a tendency to develop physical symptoms or fears associated with personal or school problems. The term includes children who are schizophrenic or autistic."

Other Health Impaired means "limited strength, vitality, or alertness, due to chronic or acute health problems such as a heart condition, tuberculosis, rheumatic fever, nephritis, asthma, sickle cell anemia, hemophilia, epilepsy, lead poisoning, leukemia, or diabetes, which adversely affects a child's educational performance."

Specific Learning Disability means "a disorder in one or more of the basic psychological processes involved in understanding or in using language, spoken or written, which may manifest itself in an imperfect ability to listen, think, speak, read, write, spell, or to do mathematical calculations. The term includes such conditions as perceptual handicaps, brain injury, minimal brain disfunction, dyslexia, and developmental aphasia."