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The effect of class voice instruction and differential song material on vocal performance, vocal knowledge, and attitude of elementary education majors

Barnes, Sebronette, Ph.D.
The Ohio State University, 1987

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THE EFFECT OF CLASS VOICE INSTRUCTION AND DIFFERENTIAL SONG MATERIAL ON VOCAL PERFORMANCE, VOCAL KNOWLEDGE, AND ATTITUDE OF ELEMENTARY EDUCATION MAJORS

Dissertation

Presented in Partial Fulfillment of the Requirements for the Degree Doctor of Philosophy in the Graduate School of The Ohio State University

BY

Sebronette Barnes, B.M.E., M.M., M.A.

* * * * *

The Ohio State University
1987

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School of Music
To My Parents
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Chapter I

INTRODUCTION

Singing has long been regarded as central to the elementary school curriculum and at one time was the total music program. Although the structure of the music program in the elementary schools has evolved to include all facets of music, singing activities still comprise a large portion of the music experiences provided for children in grades K-6.

The importance of singing as an activity is unquestioned and it has been argued that "nearly all musical skills and knowledge can be developed through worthwhile singing experiences in the classroom" (Winslow & Dallin, 1984, p. 12). O'Brien (1983) presented several reasons why singing is a vital part of the elementary music program. He felt that children can experience music through the use of the voice which is an instrument possessed by everyone. Singing is a skill and to neglect the development of the singing skill would be the same as neglecting
the development of reading and writing skills. Singing provides for pleasurable individual and group experiences and may be considered a social skill. Good (1962) commented on the importance of singing as a means of participation and musical experience.

For many years the question has been who should have primary responsibility for providing singing and other music experiences for children in the elementary school. In an effort to provide answers to this question, the role of the classroom teacher has been examined (Picerno, 1966; Tunks 1974; Hartwell, 1980; Pendleton, 1976; Goodman, 1986, Coffman, 1987). These investigations revealed the classroom teacher as a provider of all, some, or none of the music instruction for elementary children. Hoffer & English (1966), Balkin (1972), Fulbright (1976), and Pendleton (1976) noted that because of economic constraints placed on some school districts, the classroom teacher will continue to serve a integral role in elementary music instruction. From this observation, it is clear, for the most part, that students preparing to become elementary teachers can expect to have some responsibility for music instruction in the elementary music program. Due to the lack of specificity of
roles across states or local districts, it is necessary that the prospective classroom teacher be prepared to assume the role as provider of either some or all of the music instruction for elementary children. This preparation should occur during preservice training. It is during this experience that preservice teachers should develop music competencies and music-teaching competencies.

If indeed the classroom teacher is expected to assume some form of participation in the music education program on the elementary level and if singing is important within this program, then preservice training should prepare elementary education majors in vocal performance. The intent is not to produce a vocal performer or vocal music specialist from the ranks of elementary education majors. However, it is hoped that an increase and emphasis in singing experiences during preservice training will result in classroom teachers who are not only willing but capable of engaging children in singing activities. Because of the value of such activities in the elementary school music curriculum, it is necessary that classroom teachers be able to use their voices effectively as they proceed in providing
some or all of the vocal modeling for children in grades K-6. The current study was designed to provide information that may be useful in preparing prospective classroom teachers to use their singing voices more effectively.

NEED FOR THE STUDY

Music was introduced into the upper grades of the Boston public schools in 1838 with Lowell Mason, an early music educator, as its "prime force" (Tellstrom, 1971, p.36). At this time, and for the first forty years of its existence, music was taught by music specialists. By the turn of the century, the classroom teacher was fully involved in providing music instruction (Birge, 1937). Today the classroom teacher may supplement the music instruction provided by specialists or may assume full responsibility for this instruction.

Realizing the importance of the classroom teacher in the elementary music education program, states generally require elementary education majors to take special music courses as a part of their certification requirement. These courses are designed to aid prospective classroom teachers in developing those
music competencies and music-teaching competencies necessary for providing general music instruction in the elementary schools.

In an early study of this topic, Shambaugh (1961) called for an emphasis on undergraduate training which would enable prospective classroom teachers to achieve the level of competence in music necessary for successful elementary general music teaching. Singing is one of the competencies required of inservice teachers, thus it is expected that during preservice training, various singing experiences will be provided.

Balkin (1972) credited the success and continuation of music education in the elementary school to the involvement of the classroom teacher. He expounded on the need for preservice classroom teachers to receive instruction which would equip them with the necessary skills, knowledge, and incentive to provide quality music education.

Goodman (1986) concluded in his doctoral dissertation that "an effort must be made by music educators at all levels to impress upon classroom teachers that they can play an important role in the musical development of their students" (p. 115). He
added that "In order for classroom teachers to provide substantive music instruction for students in their classes, teachers must develop their music competencies and music-teaching competencies to the extent that they perceive themselves as more than just "somewhat competent"" (p. 113).

Singing prevails as the dominant music activity in the elementary classroom. This understandably leads to the conclusion that classroom teachers should willingly participate in engaging children in singing activities. If classroom teachers are to follow through on this expectation, then more effective and efficient means of music preparation for prospective classroom teachers in music, in general and singing, specifically, must be identified and implemented.

It appears that the structure of music fundamentals and methods courses for elementary majors usually does not allow for sufficient time to be devoted to developing the singing voices of these students. It may be necessary to provide a separate and supplementary opportunity for such special training to take place. One alternative would be a voice class unit for elementary education majors. This group setting would allow these students to learn
more about singing and using their voices through vocal pedagogical information, vocal exercises, and appropriate song literature. The purpose of this experience would be to help prospective classroom teachers feel confident and competent in their abilities to engage children in singing activities by developing a good vocal model for children to follow. Major (1979) noted the importance of such a goal:

The means of teaching young children to sing involve the process of imitation. A model to imitate is a necessary aspect of the instructional approach— for example, the teacher's singing voice. The child hears a quality of vocal sound in the instructor's voice and sees the status of the instructor's body while physically producing that sound. Because of the modeling that occurs when an adult sings for or with children, it is important that the instructor's singing voice be a positive example and provide a standard for singing that is worthy of imitation by children. (p. 37)

The question arises as to what would be the most effective method in achieving this goal. The purpose of this study was to provide possible answers to this question.

STATEMENT OF THE PROBLEM

The current study was designed to provide a research basis for exploring the value of specific vocal instruction for elementary education majors.
Since singing is a central focus of the elementary school curriculum, it a skill that should be developed during preservice training. Hence, elementary education majors need to be able to use their voices effectively in order to be good vocal models for children. They should feel confident and competent in their abilities to engage children in singing activities. The class voice approach is a vehicle through elementary education majors could develop vocal competencies. This could in turn lead to better music instruction by the inservice classroom teacher.

Purpose of the Study

The purpose of the study was to determine the effect of class voice instruction and differential song material on vocal performance, vocal knowledge and attitude of elementary education majors. Specifically, the study addressed the following research questions:

1. Will subjects who receive vocal pedagogy training using traditional class voice songs gain significantly in pre-post evaluations of solo vocal performances?
2. Will subjects who receive vocal pedagogy training using children's songs gain significantly in pre-post evaluations of solo vocal performances?

3. Will subjects who engage in singing children's songs, and receive no pedagogical training, gain significantly in pre-post evaluations of solo vocal performances?

4. Will there be significant differences among posttest evaluations of solo vocal performances by subjects in three treatment groups and no contact control?

5. Will there be significant differences among the posttest scores of knowledge of vocal pedagogy of subjects in three treatment groups and no contact control?

6. Will there be significant differences among the posttest attitudes of singing of subjects in three treatment groups and no contact control?

The following components of vocal performance were examined in addition to overall scores: posture, breathing, diction, intonation, projection, vocal quality. For attitude, two subsections were included: general attitudes concerning singing and self-competence analysis of vocal performance skills.
DEFINITIONS

Class Voice Instruction. Group voice instruction in which vocal techniques and song literature are used to improve singing skills. Term used synonymously with "group voice" and "voice class."

Differential song material. Term used to describe traditional class voice songs or children's songs used in the study.

Vocal Performance. Singing a song without accompaniment demonstrating skills in posture, breathing, diction, intonation, projection with a pleasant vocal quality.

Vocal Knowledge. Understanding of specific vocal pedagogy concepts and knowledge of the voice.

Attitude. A verbally expressed assessment by elementary education majors of their singing competence and desires to engage children in singing activities.

Elementary music instruction. Music instruction in the elementary school in which children are engaged in music activities deemed appropriate for their age level and physical development.
Term used synonymously with "elementary general music instruction".

**Elementary education major.** Term used to describe a junior or senior education major enrolled in a program leading to elementary classroom certification. Term used interchangeably with "preservice teacher" and "prospective classroom teacher".

**Music 270: Music Skills and Fundamentals.** One of three courses required by the College of Education at The Ohio State University for teacher certification. Usually taken during the sophomore or junior year, the course provides instruction in singing, playing classroom instruments, and in interpreting and creating music as applicable to the public school setting.

**Music 271: Basic Skills in Literature and Listening.** One of three courses required by the College of Education at The Ohio State University for teacher certification. It is designed to foster listening skills through planned activities in the classroom, live performances, and listening laboratory exercises.
Music 370: Music for Elementary Teacher. One of three required courses by the College of Education at The Ohio State University. Music 370 involves peer teaching, discussion, and lectures. Participatory activities include performing, listening, singing, moving and opportunities for understanding the materials and methods used in the elementary classroom.

Vocal Performance Rating Form. An investigator-designed instrument used by experts to evaluate the individually videotaped solo vocal performances of subjects.

Vocal Knowledge Test. An investigator-designed posttest instrument used to evaluate subjects' understanding of vocal pedagogy concepts and knowledge about the voice.

Singing Attitude Survey. A two-part investigator-designed instrument used for posttest to evaluate subjects' attitudes about their role in engaging children in singing activities and their singing ability.

VPCVS. Acronym for Vocal Pedagogy Class Voices Songs group and used for the treatment condition in which subjects received vocal pedagogy
Instruction in posture, breathing, projection, diction, intonation, and vocal quality and used traditional class voice songs for song literature.

**VPCS.** Acronym for *Vocal Pedagogy Children's Songs* group and used for treatment condition in which subjects received vocal pedagogy instruction in posture, breathing, projection, diction, intonation, and vocal quality and used children's songs for literature.

**CSO.** Acronym used for *Children's Songs Only* group and for treatment condition in which subjects received no pedagogical instruction and used children's songs for literature.

**Vocal Pedagogy.** "Aggregate principles, rules, and procedures pertaining to the development, exercise, and practice of the art of singing and the process of training by a prescribed course of study or technical discipline" (Fields, 1947, p. 16). In the current study these principles are translated into instruction in the following:

**Posture** refers to the proper alignment of the human body necessary for good vocal production.
Breathing refers to the act of inhalation and exhalation required for singing and most important for vocal freedom, intonation, and a good vocal sound.

Diction is the act of enunciation, pronunciation, and articulation involved in the accurate and clear communication of words.

Intonation refers to the maintenance of pitch accuracy throughout the duration of a song.

Projection refers to sound production which is the process by which the vocal sound is carried.

Vocal quality refers to the character of the singing voice.

ASSUMPTIONS

The premise that class voice instruction would lead to effective vocal modeling and to engaging children in singing activities is assumed in the current study and not tested.

It was assumed that the distribution of actual class time between instruction activities and singing was similar for all treatment groups. However, no actual check of this assumption was conducted.
LIMITATIONS

The subjects used in the study were elementary education majors from four sections of music education classes at The Ohio State University. Sampling was due only to registration selection. Students in the 8:00 and 12:00 sections of Music 270 (Music Skills and Fundamentals) and the 4:00 section of Music 370 (Music Methods for Elementary Teachers) comprised the experimental groups while the 3:00 section of Music 271 (Literature and Listening for Elementary Teachers) provided the no contact control group. These sections were selected because they corresponded with the investigator's schedule and allowed the investigator to provide the class voice instruction during the study. It was feasible to randomly assign subjects to treatment groups, therefore, the limitation of subject selection is somewhat mitigated, and experimental design control is exercised by randomization.

There were ten forty-minute treatment sessions over a period of five weeks. The treatment period was limited to five weeks in order to accommodate simultaneously the goals, objectives, and requirements of Music 270 and Music 370. This period represents a
limitation in that more time would be considered valuable, though not realistic, in the usual teacher education curriculum.
CHAPTER II
REVIEW OF RELATED LITERATURE

This presentation of a review of literature is organized into four sections pertaining to selected topics: (a) music competencies and music-teaching competencies of elementary education majors; (b) attitudes of preservice teachers and inservice teachers toward teaching music; (c) class voice instruction; and (d) vocal pedagogy. Relevance to the current study varies but these studies provide a literature framework within which the present research was conducted.

Music Competencies and Music-Teaching Competencies of Elementary Education Majors

Kiely (1955) investigated the music theory and singing competencies of beginning elementary classroom teachers. He found a significant difference between those teachers with a vocal music background from either high school or college and those without such training, in singing a song unaccompanied. He also
noted a substantial achievement in music theory. Klely concluded, however, that the teachers surveyed were capable of providing good vocal modeling for children.

Klein (1956) sought to determine the degree to which required music education courses prepare prospective classroom teachers with the competencies needed to teach music in the elementary classroom. Klein distributed a check list to 483 recently certified classroom teachers in Tennessee. The results showed that fifty percent of those responding needed outside help to learn a new song and that preservice music classes had done little in assisting them in learning to sing. Piano skills were reported as being low. Klein recommended more experience at the piano as well as more attention in "developing the prospective teacher's capacity to sing" (p. 134). He further noted that preservice training was an important factor in determining the classroom teacher's level of involvement in music instruction.

Shambaugh (1961) selected areas of competence from the Fort Wayne, Indiana Community Schools music course of study for grades kindergarten through three in an effort to compare measured musical competencies
with those considered necessary to teach elementary
general music education. Fifty-seven classroom
teachers used three instruments to measure
competencies of singing, music reading, playing
instruments, creative activities, and listening.
These teachers possessed the necessary competencies
but at a limited level and were capable of recognizing
superior music teaching in the elementary classroom.

Hargiss (1962) used different methods of
instruction in music fundamentals for prospective
classroom teachers to determine if sight-singing
skills could be developed during piano laboratory
experiences. Three levels of piano classes were
divided into experimental and control groups. The
only difference in instruction was that the
experimental group sang the musical patterns they
played. The Knuth Achievement Test in Music, the
Gaston Test of Musicality, a performing test in piano,
and a performance test in sightsinging were used as
pretest and posttest measures. Both groups showed
significant gain scores on all measures. The
experimental group scored significantly higher than
the control group on the sightsinging test. Hargiss
concluded that piano
skills could be acquired through a combination of singing and playing.

Slagle (1968) conducted a study in music fundamentals for elementary education majors using these seven methods of instruction: (a) lecture-discussion with no direct performance experience; (b) lecture-discussion with emphasis on singing experience; (c) lecture-discussion with emphasis on piano and singing experience; (d) lecture-discussion with emphasis on ukulele, piano, and singing experience; (e) lecture-discussion with emphasis on ukulele and singing experience; (f) lecture-demonstration with emphasis on flutophone and singing experience; and (g) traditional lecture-discussion method supplemented by singing and playing experience. The *Alice Snyder-Knuth Music Achievement Test*, Form A, was used before and after the thirteen-week instructional period. Posttest results revealed gains by all groups from pretest to post with the traditional group advancing over the other groups in knowledge development. The piano group advanced over the other group in both knowledge and skill development. The singing only group improved in attitude toward music.
Laxson (1967) examined elementary teachers' opinions about their music preparation. He surveyed teachers with two to ten years of teaching experience. Noting a deficiency in pre-college music experiences, these teachers suggested more instruction in classroom music with an emphasis on singing, music listening, and piano. Logan (1967) found in his survey of music classroom teachers that 50% or more felt prepared to utilize music series, melodic or rhythmic instruments, and music fundamentals, as well as selected classroom skills. Over 80% felt equipped to teach songs.

Picerno (1970) surveyed classroom teachers concerning the adequacy of their preservice music courses and undergraduate music preparation. Sixty percent of those responding felt their music courses were sufficient while two percent considered the number of required courses to be "too much." Seventy percent of the respondents felt adequately to well prepared to teach music in the elementary classroom.

Sarvis (1970) investigated the perceptions of elementary teachers concerning the content and importance of music courses required in their undergraduate teaching. Results of his study showed that most teacher training programs required a course
in music but the respondents felt unprepared to offer music instruction.

Fulbright (1971) compared two methods of instruction for teaching music fundamentals to elementary education majors. The control group received the traditional lecture-demonstration method of instruction while the experimental group received instruction incorporating various activities such as singing, playing the autoharp, melody bells and pitch pipes. Groups were similar at the beginning of the study. The experimental group scored significantly higher on both group and individual singing and playing tests as well as on individual tests of musical skills. Fulbright recommended the activities approach, which most closely simulated elementary classroom music, as an appropriate method for teaching music fundamentals to prospective classroom teachers.

Hudson (1974) used two approaches, "separate approach" and "combined approach", in a music fundamentals class for elementary education majors. He described the "separate approach" as incorporating the fundamentals of music (e.g., scales, chords, meter signature) while the "combination approach" involved methods of instruction in such areas as singing and
accompanying instruments. Hudson found net gains with both approaches with subjects who received the "combination approach" showing greater gains in fundamentals of music from the pretest to the posttest.

Lofgren (1975) used expert opinion to construct a list of musical and extramusical competencies for music teachers in Texas. The list was sent to elementary and secondary music teachers at random. They were asked to report the competencies currently in use and to rate the importance of each competency to the field of music education. Lofgren found the ability to lead singing activities and to sing a vocal line at sight high priorities for those involved in elementary music teaching.

Pendleton (1976) surveyed classroom teachers, principals and music specialists in an effort to determine the skills that were expected from elementary teachers as well as to identify factors related to classroom teachers' role in providing music experiences for students in grades one through six. Teaching rote songs, rounds, and singing games were among the list of skills expected of the classroom teacher and these were considered reasonable
expectations of those teachers responding. Pendleton noted that a decrease in music specialists would signal an increase in classroom teacher participation in elementary general music instruction.

Meyer (1982) investigated the relative effectiveness of vocal instruction and instrumental-vocal instruction on the sight singing achievement of elementary education majors with varying levels of musical background. Matched pairs of one hundred and twenty-one prospective classroom teachers formed six homogeneous groups on three levels according to music background, sightsinging, music theory, keyboard and performance experience. The levels were: limited, moderate, and extensive. During the twelve-week instructional period, the vocal instruction group used investigator designed sight singing materials based on the solfa system with movable do. The instrumental-vocal instruction group used a playing and singing method with the soprano recorder and solfa system. Meyer found a significant difference between the experimental group and the control group in sight singing achievement scores, but no significant difference existed between the experimental groups. Meyer concluded both methods to be effective in
developing sight singing skills with elementary education majors.

Reifsteck (1981) examined elementary education majors' development of competencies through peer teaching and field experiences. A list of competencies was constructed to evaluate the effectiveness of preservice teachers under these two conditions. Subjects in both groups showed significant gains from pretest to posttest, but there was no significant difference between groups on music teaching abilities. Both groups showed positive changes in attitudes toward teaching music.

Soderblom (1982) identified music and music-teaching competencies needed for successful first-year elementary general music teaching. A questionnaire was distributed to first-year and experienced elementary school general music teachers, and college and university teachers involved in elementary music methods courses. From the responses received, Soderblom found singing, conducting, ancillary instruments and lesson planning to be among the list of priority competencies for first-year elementary general music teacher.
Kelly (1984/1985) investigated the effects of differential modeling and discrimination training on selected music teaching skills, confidence level and achievement among elementary education majors. Three modeling levels were used: live model/discrimination training/active participation; live model/active participation; videotape model/discrimination training/passive participation; and videotape model/active participation. Kelly found both live and videotaped models to contribute to the development of music teaching skills of a elementary education majors. Selected teaching skills were developed effectively through discrimination training as well as through participation in demonstration lessons.

The confidence level of elementary education majors in their ability to teach music was not found to be significantly effected by the type of model, presence or absence of discrimination training or by form of participation. Kelly found music achievement to be "minimally affected" by participation mode or discrimination training. Significant predictors of music teaching confidence were grade point average and performance experience. Kelly concluded that teachers seem to be willing to teach music if they have solid
education in both music fundamentals and music teaching techniques. She recommended that teacher education programs attend to "the problem of developing the required competencies in preservice teachers prior to certification" (p. 30).

Goodman (1985/1986) investigated the perceived music and music-teaching competencies of classroom teachers in the state of Ohio. He further examined preservice training in music in relation to selected variables and classroom teacher perceptions. A questionnaire was randomly distributed to two hundred and ten elementary classroom teachers. Findings showed that classroom teachers in the state of Ohio perceived their competencies and undergraduate music courses to be "somewhat effective" and that private music lessons affect teachers perceptions to the greatest extent. Goodman recommended a reexamination of music courses for prospective teachers to fall more in line with assisting elementary education majors in acquiring needed competencies.

Summary

Classroom teachers are expected to possess certain music competencies and music-teaching
competencies. A general consensus of desired and perceived competencies has been formulated from the opinions of practicing classroom teachers, music supervisors and principals, and music teacher education faculty at colleges and universities (Kiely, 1955; Laxson, 1961; Shambaugh, 1961; Pendleton, 1976; Soderblom, 1982; and Goodman, 1985). Numerous methods have been employed at the college level in elementary music classes in an effort to prepare prospective classroom teachers to fulfill required music expectations. Lecture-demonstration, activities-centered approach, homogeneous groupings, separate versus combined instruction, peer teaching and field experiences, and discrimination training have all been variously effective in improving the skills of prospective classroom teachers in the areas of singing, instrumental performance, and knowledge (Hargiss, 1962; Slagle, 1968; Fulbright, 1971; Hudson, 1974; Reifsteck, 1981; Meyer 1982; and Kelly, 1985). The music preparation of the classroom teacher during preservice training, and the effectiveness of this preparation, have been under continuous examination (Klein, 1956; Logan, 1967; Picerno, 1970; and Sarvis, 1970). These evaluations, based on the opinions of
Inservice classroom teachers, have served as a basis for recommendations in music education classes for elementary education majors.

Attitudes of Preservice and Inservice Classroom Teachers Toward Teaching Music

Evans (1958) investigated elements associated with classroom teacher attitudes toward teaching music proceeding on the premise that the classroom teachers should be responsible for some music instruction in elementary schools. Classroom teachers involved in the study responded to inquiry concerning musical background, present teaching environment, and perception of competence in teaching music. Evans found that teachers generally had a favorable attitude toward teaching music although total musical experience was limited.

Gelineau (1961) conducted a study concerning the effects of certain factors on classroom teachers attitudes toward teaching music. Environmental factors considered were home and family background, undergraduate music experiences, and public school music experience prior to college. Gelineau found that those teachers who had negative early experiences
in music disliked teaching music. Those teachers with a positive regard for giving music instruction had more music experiences in pre-college and college and had more music teaching experiences during student teaching.

Lawrence (1969) surveyed classroom teachers in a selected district to assess the relationship between elementary classroom teacher attitudes toward music, their previous musical experiences, and self-confidence in teaching music. He further sought to identify which factors could be used to predict attitudes toward music. Lawrence found a statistical relationship between attitude toward music and previous musical background and attitude toward teaching music and self-confidence. However, these results yielded no predictions. He did find that that the most significant predictor of attitudes toward music to be student teaching and post graduate music experiences.

Tunks (1974) investigated elementary classroom teacher attitudes toward elementary general music and developed an Attitude Behavior Scale to measure these attitudes. Tunks also wanted to assess the importance of viewing videotaped elementary music classes on
classroom teachers attitudes toward elementary school general music. Tunks found that viewing videotapes had no effect on attitude of classroom teachers toward elementary general music and reported the Attitude Behavior Scale as an appropriate attitude measure.

Daughtery (1978) conducted a study to investigate the effects of selected strategies from the Manhattanville Music Curriculum Project in a music methods class for prospective classroom teachers. He found that students preferred the MMCP unit of instruction over the traditionally oriented unit and that musical achievement improved. A positive attitude toward the value of music in the elementary school was observed from both units.

Simpkins (1980/1981) studied the effect of videotape feedback on the confidence level and self-assessment of prospective elementary classroom teachers. Subjects were forty-one students enrolled in a music fundamentals class for elementary education majors. The instruction for both experimental and control groups was the same. The designated five performance skills of the experimental group were videotaped, viewed and rated by these subjects using an investigator-designed rating scale. Simpkins found
no significant difference between videotape feedback and in-class participation in increasing the confidence level of elementary education majors. Videotape feedback was not more effective than classroom participation in enhancing positive self-assessment.

Summary

Factors such as family background, pre-college and student teaching experiences, and preservice training contribute to the formation of the classroom teacher's attitude toward teaching music (Evans, 1958; Gelineau, 1961; and Lawrence, 1969). Studies have not only yielded instruments to measure such attitudes (Tunks, 1974), but have also investigated the effects of methods of instruction on attitudes of elementary education majors toward teaching music (Daughtery, 1978; Simpkins, 1981).

Class Voice Instruction

The terms "group voice", "class voice", and "voice class" are used synonymously to describe what Doscher (1975) defined as "a group of students gathered together at certain times during the week for
the purpose of learning how to sing" (p. 1). Thompson (1935) some forty years prior to Doscher defined college group voice instruction as a form of individual instruction which takes place in a group setting "partly to save time for the teacher, partly to reduce the expense to the individual student, and partly to give each student the advantage of working with others" (p. 46). He contended that group instruction provided the instructor with an opportunity to give one demonstration as opposed to several, separate explanations. Also, an intermingling of gifted students with less gifted students presented an atmosphere for healthy competition.

The Music Educators National Conference in its 1947 Source Book (Morgan, 1947) listed the following purposes for voice class training:

a. To present correct use of the singing and speaking voice, with a progressive study of good song literature and its intelligent interpretation.

b. To lay the groundwork for an appreciative concept of the art of singing, and of fine repertoire, from the standpoint of the listener as well as the performer.

c. To provide further training and individual help for the talented student who may become a professional singer and teacher (p. 109).
The *Source Book* (Morgan, 1947) supported class voice instruction at the college level as a method of providing vocal instruction for preservice music teachers to prepare them to conduct class voice instruction more effectively.

Taylor (1936), in his text on group voice, promoted the idea of all vocal study beginning with group instruction. He stated: "the ideal plan, even for professional students, would include at least one group lesson a week, in addition to regular private instruction" (p. 2). Studies by Quist and Strom (cited in Sims, 1961), Housewright, Rezatto, and Wilson (cited in Hinton, 1961) investigated the philosophy of class voice, values of voice class procedures, materials, voice class organization and techniques. From these studies came recommendations concerning the need for more structure in voice classes for music education majors with less emphasis on singing and more emphasis on providing methodological information. A general conclusion was that the class voice setting provided an opportunity for preservice music teachers to best develop the skills that would enable them to develop singing skill in their students.
Gelvin (1957) investigated the preparation of music majors for student teaching. Through his observation, he noted the importance and value of group classes—instrumental and vocal. Gelvin stated:

Instrumental and vocal classes offer opportunities for rich experience in many phases of music education. Basically the purpose of such classes is to develop knowledge and experience in the technique of playing or singing. However such classes can be workshops for learning methodology and materials for instrumental and vocal teaching in the schools . . . and as such these classes become centers for laboratory experience. (p. 87)

Hinton (1961) conducted a study to determine the skills, knowledge, and teaching abilities needed by a vocal music teacher. He surveyed public music supervisors in cities of 100,000 or over and college and university music educators. The competencies reported were grouped into categories of "most important," "moderately important" and "least important." "The ability to develop proper and effective use of the singing voice" was listed as one of the most important competencies while "the ability to pronounce foreign language song texts" was considered to be a least important skill.

Sims (1961) conducted a study to investigate the effectiveness of class and individual voice
Instruction with beginning-level high school students. She used the results of the Music Aptitude Test by Whistler and Thorpe to assign twenty-one subjects to private study or to one of three classes. Students were evaluated three times during the study: at the beginning, after fourteen lessons, and at the end of the instructional period. All instruction was done by the investigator and the same three judges were used for all evaluations. At the end of the eight-month study, Sims found that the "class-taught" students were equal to or better than the "private-taught" students; adjudicators were consistent in the scores they gave, but were likely to disagree on subjective evaluation (e.g., tone quality, breath support, breath control); and heterogeneous grouping was more conducive to learning voice than the separate groupings of boys and girls. Sims recommended that the class method be used by voice teachers and public school music teachers.

Manley (1968) sought to determine if class voice students could develop vocal intensity commensurate with private students. He also wanted to identify what difference, if any, there was between vocal intensity abilities of beginning students in a class
and those receiving private instruction. Thirty subjects were enrolled in two sections of beginning voice class with eight boys and seven girls in each. The contact control group received eight private lessons while the experimental group received thirty-six class lessons. The students were rotated at the end of the eleven week quarter. Vocal intensity measurements were made at the start and end of each quarter. After twenty-six comparisons of vocal intensity, Manley found no difference between class and private methods in developing vocal intensity.

Abusamra (1978) visited approximately seventy-five colleges and universities during a five-month period to answer questions concerning the effectiveness of group instruction versus individual instruction. He noted a growing interest in the use of the group methods alone or in conjunction with traditional one-to-one teaching. From his findings, Abusamra drew the following conclusions: 1) Students progressed and teaching quality was not lessened in the group setting. 2) Healthy competition was fostered through increased motivation. 3) Techniques and concepts were enhanced as "the repetition of basic fundamentals become better understood and
strengthened” (p. 38); 4) The contact between teacher and students increased.

Summary

The Music Educators National Conference issued its purposes for voice class training in 1947. This announcement was followed by a continuance of investigations concerning not only the philosophy of group vocal instruction, but also its value, procedural aspects and materials (Thompson, 1935; Taylor, 1936; Hinton, 1961). While class instruction has been advocated for more than musical reasons, it has been recommended, based on results from experimental observations, as an effective method of voice instruction (Sims, 1961; Manley, 1961).

Vocal Pedagogy

Warmink (1975) constructed a programmed instructional text to teach the fundamentals of vocal production. The text contained diagrams of muscle, bone and cartilage positions as well as respective physiological terminology. The text was found to be effective in teaching the fundamentals of voice
production and was preferred over other textbooks in this area.

Decker (1976) noting a deficiency in available information on teaching of vocal techniques to singers in the choral rehearsal, embarked upon an analysis of printed literature on solo and choral voice teaching between 1960 and 1970. He also gathered information from the choral conductors of ten nationally recognized universities and colleges. Both the analysis of literature and interviews focused on posture, breathing, relaxation, resonance, and diction, five elements recognized by the National Association of Teachers of Singing as the foundation for training the vocal instrument. From his observation, Decker concluded that these aspects can be taught in the choral rehearsal.

Richner (1976) conducted a study to investigate the effect of classroom and remedial methods of music instruction on the ability of inaccurate singers, in the third, fourth, and fifth grades to reproduce pitches. Seventy-seven subjects were randomly assigned to four treatment levels: 1) self-contained classroom music instruction by the classroom teacher; 2) music instruction provided by a music specialist
emphasizing all areas of music education; 3) music specialist guiding students in small groups in singing song only; and 4) music specialist teaching small group working primarily on remedial voice training.

Richner found that the inaccurate singers at the third grade level who only sang songs and those who received remedial voice training improved significantly in comparison with the inaccurate singers who were taught by the classroom teacher in a self-contained setting. There was no significant difference between the treatment groups in grade four. The inaccurate singers in the fifth grade who worked with the music specialist on remedial voice training improved significantly in comparison to all other treatment groups.

Phillips (1983) sought to determine the effect and appropriateness of breath control training on vocal range, vocal intensity, tonal duration, and pitch accuracy of elementary children grades two, three, and four. Subjects for the twenty-two week study were forty-four girls and boys who were randomly assigned within each grade level to control and experimental groups. The experimental group sang songs and vocalises and received training in breath
control. The control group used vocalises and and the traditional song approach. The experimental group not only responded to breath control training, but improved in vocal range, vocal intensity, and pitch accuracy.

Ten Eyck (1985) sought to determine the effect of programmed materials with adjunct listening examples on the vocal development of children's choruses. Programmed materials were developed during phase one of the study and implemented under experimental condition in phase two. Subjects were forty children's choruses and their respective directors. The national anthem was used as the pretest and judges ratings were used to match the experimental and control groups. The teachers in the experimental groups received the programmed materials. The posttest used the national anthem along with a song of the teacher's choosing. Ten Eyck found no significant difference in choral sound between the experimental and control groups, but teacher knowledge increased in regards to the materials. He attributed these results to the level of which the directors were able to transfer knowledge into the rehearsal setting.
Corbin (1982/1983) investigated the influence of selected concepts on choral tone quality, student understanding of the singing process and student attitudes toward choir participation. The investigator reviewed research in both vocal and choral pedagogy to establish vocal pedagogy concepts for training. The treatment period was seven weeks and the investigator rehearsed both high school groups involved in the study. The experimental group received instruction in development of posture, breathing, diction, resonance, and relaxation while the control group rehearsed with emphasis on interpretation and dynamics, blend, intonation, rhythm, and correct notes. Corbin concluded that "the use vocal pedagogy in choral rehearsal improves the diction, precision, and tone quality of high school choirs, and thereby improves overall performance" and that "the teaching of vocal pedagogy in the choral setting improves student understanding of the singing process which thus encourages application of this knowledge for improved individual vocal performance" (p. 62).

Goetze (1986) examined the use of text rather than a neutral syllable and the presence of other
voices in unison singing when compared with individual singing. Subjects were one hundred and sixty-five kindergarten through third grades from three schools. Subjects learned two melodic phrases of equal length, intervallic content, and direction. One of the melodic phrases was imitated in response to the investigator's voice by the subject in the presence of other subjects. Unison singing with five other subjects was recorded. Both phrases were sung using text and with the neutral "loo" syllable. Goetze found more accuracy in individual singing, more accuracy in pitch using the neutral "loo" syllable, and that girls sang more accurately than boys in unison singing. Goetze recommended that teachers should incorporate the use of the "loo" syllable into classroom methods for all beginning singers.

Summary

Pedagogical aspects of singing have been implemented satisfactorily in both group and individual settings at different levels of instruction and have resulted in improved individual and group vocal performance (Richner, 1976; Corbin, 1983; Phillips, 1983; Goetze, 1986). The use of programmed
materials has also been examined as a means of improving vocal performance (Warmink, 1975; Ten Eyck, 1985).
CHAPTER III
METHODOLOGY

Introduction

The major purpose of the study was to investigate the effect of class voice instruction and differential song material on vocal performance, vocal knowledge and attitude of elementary education majors.

Contained in this chapter is a description of (a) the subjects, (b) independent variable, (c) dependent measures: development and validation, (d) the research design, (e) procedures, and (f) evaluation of vocal performances.

Description of Subjects

Subjects were elementary education majors enrolled in the required music sequence, Music 270, Music 271, and Music 370, at The Ohio State University during the Spring Quarter 1987. Students in the 8:00 and 12:00 sections of Music 270 and the 4:00 section of Music 370 were involved in experimental assignments while students in the 3:00 section of Music 271 served
as control subjects. Selection of participating sections was based on the investigator's schedule and the need for an adequate number of subjects in various groups.

Independent Variable: Treatment Groups

Three treatment groups were involved in the study. In two of the groups, subjects received pedagogical training. In one group, traditional class voice song literature was used for vocal material (VPCVS n=24), while in the other, standard children's songs were used (VPCS n=30). The third treatment group received no pedagogical instruction, but subjects engaged in singing children's songs (CSO n=28). Thus, class voice instruction and differential song material constituted the independent variables under investigation. The class voice instruction involved pedagogical instruction in posture, breathing, diction, intonation, projection, and vocal quality. Warm-ups, voice building techniques, relaxation exercises, directives for vocal pedagogy training, and related information were derived from standard class voice texts and materials, texts for beginning singers and elementary teachers' music texts.
(Christy, 1966 & 1979; Trusler & Ehret, 1972; Schmitt, 1984; Winslow & Dallin, 1984; Gelineau, 1987).

The song material for all groups was chosen from selected sources. Consideration was given to vocal range with reference to Wilson (1970), Kuhn, Wachus, Moore, and Mantle (1979), Wassum (1979), and Geringer, Nelson, and Kostka (1981). Songs for the VPCVS group were selected from standard class voice collections. Songs taken from these collections were folk and art songs, and songs from musical theater. A list of the songs (n=19) used for this group along with the names of the books from which they were extracted appears in Appendix A. Children's songs (n=44) used as song material for the VPCS group and the CSO group were selected from elementary music series and other standard sources designated as appropriate for use by children. The texts and songs used for these groups are found in Appendix B.

**Dependent Measures: Development and Validation**

To assess the effects of the independent variable, three dependent measures were used: a vocal performance skills test, a vocal knowledge test and an attitude measure.
The Vocal Performance Rating Form

The Vocal Performance Rating Form was an investigator-designed instrument used by three judges to evaluate subjects' videotaped solo vocal performances (pretest, posttest) of "America". To determine a general consensus of expert opinions concerning areas of vocal performance considered to be pedagogically critical, the investigator reviewed class voice texts, voice class syllabi, elementary education music texts and syllabi, and vocal pedagogy literature and observed class voice instruction.

Each of these areas was translated into a rating form whereby the panel of experts could evaluate the appropriateness of each. The panel consisted of three university music faculty with experience in teaching class voice. The panel was given an operational definition sheet and two separate rating sheets -- each sheet consisting of a Likert-type five-point scale ranging from disagree to agree. One sheet was used to evaluate the rating form; the other was used to evaluate the explanation sheet. A section was provided on the evaluation sheet for comments.

The overall consensus of the committee was that the form needed minor revision. The operational
definitions were included within the original form. The final version of the **Vocal Performance Rating Form** can be found in Appendix C.

**The Vocal Knowledge Test**

The **Vocal Knowledge Test** was developed from statements extracted from texts used in elementary education music materials, fundamentals and methods classes, elementary music series, and voice class texts. Content statements were converted into test items using a multiple-choice format.

The test was distributed to another panel consisting of three vocal music faculty. In validating the initial ten-item test, the committee was asked to rate the vocal knowledge test items and accompanying answers as to their appropriateness in assessing vocal pedagogy knowledge of elementary education majors on a one to five scale (disagree to agree). Each committee member received the test and a rating sheet.

It was decided that any item receiving an average rating of less than three from the panel would be revised or deleted. All items were considered by the judges to be appropriate for inclusion on this test.
Suggestions from the committee resulted in revising some items for clarity. An attached sheet was included to be used later for group identification. The final form of the Vocal Knowledge Test appears in Appendix D.

**Singing Attitude Survey**

The instrument designed to assess elementary education general attitudes about singing and self-competence analysis about vocal performance was also developed by the investigator. Statements and operational definitions were constructed from Music 270 and Music 370 syllabi and texts, and an examination of studies (Flom, 1970; Smith, 1970; Tuttle, 1976; Simpkins, 1984). This resulted in a two-part, twenty-six item *Singing Attitude Survey*. For validation purposes, the survey was distributed to a panel composed of three Ohio State University music education faculty member with expertise in elementary music education. Operational definitions and rating sheets containing a Likert-type scale (disagree or agree) were given to the panel. Both the questionnaire and definition sheet were evaluated. The panel was instructed to evaluate the
appropriateness of the statements as they related to elementary music instruction. The operational definitions were to be considered as to their clarity they provided for some of the terms found in the survey. Any item receiving an average score of less than three was revised. All items were considered by the committee to be appropriate; however, comments about general teaching expectations as well as statements about vocal performance skills of elementary education majors were incorporated into statements resulting in twenty-four items in Part I and eleven items in Part II with a strongly agree to strongly disagree scale. A section for comments was added to the second part of the survey and a sheet was attached for use in group identification. The final version of this instrument appears in Appendix E.

Research Design

A pre-posttest design was implemented in the analysis of the vocal performance evaluations for the three treatment groups. In addition, a posttest-only control group design was employed in the analysis of vocal performance as well as vocal knowledge and attitude. Subjects from two sections of Music 270 and
one section of Music 370 were randomly assigned to three treatment conditions. Students in Music 271 served as a no contact control group.

Subjects in the three treatment groups were pretested and posttested individually by videotaping each subject’s performance of the singing of "America". The no contact control subjects (NCC n=31) were posttested in the same manner. All subjects were administered a Vocal Knowledge Test and a Singing Attitude Survey as posttest measures.

Procedures

During the first week of classes of the Spring Quarter 1987 at The Ohio State University, the investigator visited each class used in the study. Students in Music 270 and Music 370 were told that for this particular quarter the elementary music classes were being team-taught, with more emphasis on singing and that in order to do this, it would be necessary for them to meet in a different location twice a week. Since the supplementary instruction was a part of the requirements for the quarter, students were informed that they would receive credit for their participation. Students were also made aware of the
videotaping procedures.

At the end of this first week, the instructor of each class provided the investigator with a class roster. This roster was used to randomly assign subjects within class sections to treatment groups. This randomization resulted in both Music 270 and Music 370 being included in the VPCVS and VPCS groups. Music 270 subjects composed the CSO group. This process was necessitated by the fact that classes from which subjects were drawn continued in a normal fashion. During the first day of the second week of classes, each subject was informed of the group assignment and given a schedule sheet which contained room assignments and the instruction schedule for the five-week period (Appendix F).

The first videotaped testing occurred during the first three days of week three. A printed script was used to ensure common instructions for pretesting and posttesting (Appendix G). Subjects in the three treatment groups were videotaped individually performing "America." A description of video equipment used is found in Appendix H.

Class voice instruction began during the third week of the quarter. Each treatment group received
two forty-minute periods of instruction per week for five weeks. On the day subjects were to receive voice class instruction, they reported directly to the designated room. During the first class meeting, each subject was assigned a music folder with a designated number which contained all the texts of the songs to be used in class.

Every effort was made to ensure that instruction for the groups receiving vocal pedagogy training was the same, even though students in the VPCVS used traditional class voice songs while the VPCS group used children's songs. Each lesson was divided into three parts: (1) warm-ups, voice building and relaxation exercises; (2) pedagogy training; (3) singing applying learned pedagogical concepts (Appendix I). After warm-ups and exercises, the investigator focused the lesson on one of the pedagogical areas. In each succeeding lesson, a new area would be added while reviewing areas already presented. The subjects were intermittently requested to demonstrate their gradual assimilations of the skills being taught. The investigator used verbal and visual imagery, technical descriptions, and modeling as means of assisting the subjects in their
acquisition and understanding of vocal pedagogy training. Following this period in the lesson, subjects were involved in singing various songs. This material served as a vehicle for incorporating learned skills.

The song material used for voice class sessions was taught by rote using the phrase method. Each song was first performed by the investigator as subjects followed the text. During the first lesson, subjects were asked to recite the text without any reference to breath markings. At subsequent sessions, subjects were instructed where to place the breath markings in the text and observed them during the recitation exercise. This element was omitted from the instruction of the CSO group to avoid allusions to breath control. Subjects spoke the words to the songs and were corrected in diction as needed. The song was then repeated with the investigator singing the vocal line while the melody was played as accompaniment. Subjects were then taught the song phrase by phrase.

When the song was learned adequately, the accompaniment was added and additional instruction was focused upon the song in an effort to apply vocal
pedagogy concepts (in the pedagogy groups). No direct attention was given to aspects of music fundamentals (e.g., rhythm, meter), since this was not a consideration in the study. The investigator made every effort not to sing during subsequent repetitions of the song unless the subjects were experiencing some difficulty in singing. Singing was accompanied alternating between the melody and given accompaniment as well as an improvised accompaniment. In most children's songs, chord symbols were given or had to be added for accompanying purposes. As subjects performed, verbal feedback was given (e.g., "That sounds great." "More consonants." "Don't look down while you're singing."). Singing was done alternating between the seated and standing positions.

Instruction was delivered enthusiastically and subjects were gradually asked to select the last song of the day and as time permitted, other songs from their repertoire. This format was used in all groups. Subjects were videotaped during the second, third, and fourth days of week nine of the quarter incorporating the same procedure used in pretesting. This taping included the no-contact control group. The posttest-only measures, the Vocal Knowledge Test and the
Singing Attitude Survey, were administered on the first day of the last week of the quarter by the investigator to the intact classes.

**Evaluation of Vocal Performances**

The evaluations of each subject's vocal performance were conducted by a panel of judges. This panel consisted of one university music education faculty member with experience in elementary music teaching and two graduate students with substantial elementary school music teaching experience and knowledge of vocal pedagogy.

There was a total of 184 vocal performances evaluated. To determine interobserver agreement, one-third of the performance were randomly selected and dubbed on a master Sony T-120 minute color video cassette and sent to all judges. The tape, instructions, and seventy rating forms (with extras in case of errors) were mailed to each judge. Judges were informed that if interobserver agreement was sufficiently high, they would only need to evaluate an equal number of the remaining performances. Cooper, Heron, & Heward (1987) considered this form of "reliability" to be a formal assessment on the human
element included in observation. Interobserver agreement level was 85%. Therefore, the remainder of the tapes were divided among the judges for independent evaluation.
CHAPTER IV
PRESENTATION AND ANALYSIS OF DATA

The purpose of the study was to determine the effect of class voice instruction and differential song material on vocal performance, vocal knowledge and attitude of elementary education majors. The data reported in this chapter are (a) interobserver agreement, (b) vocal performance ratings, (c) scores on vocal knowledge tests, and (d) responses of subjects on an attitude survey. The statistical tests were computed using the Statistical Analysis System (SAS).

Interobserver Agreement

A panel of three judges viewed and rated a common set of the pretest and posttest solo videotaped vocal performances of all subjects. These ratings were used to establish interobserver agreement levels. Interobserver agreement was calculated by dividing the number of agreements by the total number of agreements
plus disagreements. An agreement was achieved when two judges circled the same numerical rating or were within one number of each other on the five-point rating scale that was used to assess each aspect of the vocal performance. A disagreement was reached when two judges differed by two or more numbers on the scale. Using this method, the average agreement percentage level among the three experts was 85%. Table 1 contains the agreement levels as they varied by factor.

Table 1

Interobserver Agreement By Factor: Posture (P), Breathing (B), Diction (D), Intonation (I), Projection (PR), Vocal Quality (VQ)

<table>
<thead>
<tr>
<th></th>
<th>P</th>
<th>B</th>
<th>D</th>
<th>I</th>
<th>PR</th>
<th>VQ</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>93%</td>
<td>78%</td>
<td>89%</td>
<td>83%</td>
<td>88%</td>
<td>78%</td>
</tr>
<tr>
<td>Total</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>85%</td>
</tr>
</tbody>
</table>

It is interesting to note the variation in agreement levels for six different factors. Posture, the most visible factor, had the highest agreement
level (93%) while the level of agreement for breathing and vocal quality factors was the lowest (78%).

Experimental Questions

Based on the statistically analyzed data, answers to the six experimental questions posed in Chapter One are provided in this chapter. The results are given after each question. Experimental questions one, two, and three are grouped together. Questions four, five, and six are presented separately.

Experimental Question I. Will subjects who receive vocal pedagogy training using traditional class voice songs gain significantly in pre-post evaluations of solo vocal performances?

Experimental Question Two. Will subjects who receive vocal pedagogy training using children’s songs gain significantly in pre-post evaluations of solo vocal performances?

Experimental Question Three. Will subjects who engage in singing children’s songs, and receive no pedagogical training, gain significantly in pre-post evaluations of solo vocal performances?

Eighty-two subjects comprised the three treatment groups: VPCVS (n=24), VPCS (n=30), and CSO (n=28).
Instruction for subjects in the VPCVS and VPCS groups consisted of vocal pedagogy training using traditional class voice songs and children's songs, respectively. The CSO group sang children's songs with no instruction. Subjects were individually videotaped singing "America" at the beginning and end of the five-week instructional period.

The Vocal Performance Rating Form was used by three judges to evaluate the videotaped performances. Subjects were evaluated on six different factors: posture, breathing, diction, intonation, projection, and vocal quality. To address the three experimental questions on pre-post evaluation of solo vocal performance, t-tests were computed to determine if a significant difference existed between the pretest and posttest scores of each treatment group on the vocal performance test (Table 2). The total number of scores used in the analysis was seventy-one. This number represented the data available for subjects who completed both the pretest and posttest. Eight subjects, four from both the VPCS and the CSO groups, were not pretested. Only one subject from the VPCS group was not posttested. Two subjects, both from the VPCVS group, dropped out before the study ended.
Table 2

**t-Test for Pretest-Posttest Scores on Vocal Performance**

<table>
<thead>
<tr>
<th>Factors</th>
<th>Mean Change</th>
<th>SD</th>
<th>t</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Posture</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>VPCVS (n=22)</td>
<td>0.318</td>
<td>0.945</td>
<td>1.58</td>
<td>0.129</td>
</tr>
<tr>
<td>VPCS (n=25)</td>
<td>0.520</td>
<td>1.045</td>
<td>2.49</td>
<td>0.020*</td>
</tr>
<tr>
<td>CSO (n=24)</td>
<td>0.250</td>
<td>1.073</td>
<td>1.14</td>
<td>0.265</td>
</tr>
<tr>
<td><strong>Breathing</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>VPCVS (n=22)</td>
<td>0.000</td>
<td>1.272</td>
<td>0.00</td>
<td>1.000</td>
</tr>
<tr>
<td>VPCS (n=25)</td>
<td>0.200</td>
<td>1.224</td>
<td>0.82</td>
<td>0.422</td>
</tr>
<tr>
<td>CSO (n=24)</td>
<td>-0.166</td>
<td>1.403</td>
<td>-0.81</td>
<td>0.425</td>
</tr>
<tr>
<td><strong>Diction</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>VPCVS (n=22)</td>
<td>0.227</td>
<td>1.231</td>
<td>0.87</td>
<td>0.396</td>
</tr>
<tr>
<td>VPCS (n=25)</td>
<td>0.240</td>
<td>0.969</td>
<td>1.24</td>
<td>0.227</td>
</tr>
<tr>
<td>CSO (n=24)</td>
<td>-0.166</td>
<td>1.007</td>
<td>-0.81</td>
<td>0.425</td>
</tr>
<tr>
<td><strong>Intonation</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>VPCVS (n=22)</td>
<td>0.045</td>
<td>1.132</td>
<td>0.19</td>
<td>0.852</td>
</tr>
<tr>
<td>VPCS (n=25)</td>
<td>0.400</td>
<td>1.384</td>
<td>1.44</td>
<td>0.161</td>
</tr>
<tr>
<td>CSO (n=24)</td>
<td>0.083</td>
<td>1.212</td>
<td>0.34</td>
<td>0.739</td>
</tr>
<tr>
<td><strong>Projection</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>VPCVS (n=22)</td>
<td>0.181</td>
<td>1.052</td>
<td>0.81</td>
<td>0.427</td>
</tr>
<tr>
<td>VPCS (n=25)</td>
<td>0.360</td>
<td>0.952</td>
<td>1.89</td>
<td>0.070</td>
</tr>
<tr>
<td>CSO (n=24)</td>
<td>-0.375</td>
<td>1.055</td>
<td>-1.74</td>
<td>0.095</td>
</tr>
<tr>
<td><strong>Vocal Quality</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>VPCVS (n=22)</td>
<td>0.181</td>
<td>1.097</td>
<td>0.78</td>
<td>0.445</td>
</tr>
<tr>
<td>VPCS (n=30)</td>
<td>0.440</td>
<td>1.083</td>
<td>2.03</td>
<td>0.053*</td>
</tr>
<tr>
<td>CSO (n=24)</td>
<td>-0.250</td>
<td>1.113</td>
<td>-1.10</td>
<td>0.282</td>
</tr>
</tbody>
</table>

*Denotes significance p<.05
There was a significant difference (p<.05) between pretest and posttest scores of subjects in the VPCS group on two of the six factors: posture and vocal quality. Improvement in projection approached significance for this group. There were no significant differences in vocal performance scores in the VPCVS or CSO groups.

Experimental Question Four. Will there be significant differences among posttest evaluation of solo vocal performances by subjects in three treatment groups and no contact control?

An Analysis of Variance on pretest ratings indicated that there was no significant difference at the .05 level among the three treatment groups on any of the six factors. The scores of one-hundred and ten subjects were used in the posttest evaluation of solo vocal performances. An Analysis of Variance on posttest ratings revealed a significant difference on projection (Table 3). No significant differences were found on posture, diction, intonation, and vocal quality ratings. Although not significant, the breathing factor approached significance (p<.068). Mean scores and standard deviations appear in Table 4.
Table 3

Analysis of Variance on Posttest Scores of Vocal Performance

<table>
<thead>
<tr>
<th>Source</th>
<th>df</th>
<th>SS</th>
<th>MS</th>
<th>F</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>Posture</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Between Groups</td>
<td>3</td>
<td>2.5162</td>
<td>0.8387</td>
<td>1.22</td>
<td>0.306</td>
</tr>
<tr>
<td>Within Groups</td>
<td>106</td>
<td>72.9746</td>
<td>0.6884</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>109</td>
<td>75.4909</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Breathing</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Between Groups</td>
<td>3</td>
<td>6.7282</td>
<td>2.2427</td>
<td>2.43</td>
<td>0.068</td>
</tr>
<tr>
<td>Within Groups</td>
<td>106</td>
<td>97.6445</td>
<td>0.9211</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>109</td>
<td>104.3727</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Diction</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Between Groups</td>
<td>3</td>
<td>4.3603</td>
<td>1.4534</td>
<td>1.95</td>
<td>0.125</td>
</tr>
<tr>
<td>Within Groups</td>
<td>106</td>
<td>78.9123</td>
<td>0.7444</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>109</td>
<td>83.2727</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Intonation</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Between Groups</td>
<td>3</td>
<td>5.0859</td>
<td>1.6953</td>
<td>1.06</td>
<td>0.368</td>
</tr>
<tr>
<td>Within Groups</td>
<td>106</td>
<td>169.3140</td>
<td>1.5973</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>109</td>
<td>174.4000</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Projection</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Between Groups</td>
<td>3</td>
<td>13.0824</td>
<td>4.3608</td>
<td>6.76</td>
<td>0.000*</td>
</tr>
<tr>
<td>Within Groups</td>
<td>106</td>
<td>68.4084</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>109</td>
<td>81.4909</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Vocal Quality</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Between Groups</td>
<td>3</td>
<td>3.2104</td>
<td>1.0701</td>
<td>1.49</td>
<td>0.221</td>
</tr>
<tr>
<td>Within Groups</td>
<td>106</td>
<td>76.0622</td>
<td>0.7175</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>109</td>
<td>79.2727</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

*Denotes significance $p<0.05$
Table 4

Mean Scores and Standard Deviations of Posttest Scores of Vocal Performance By Factor: Posture (P), Breathing (B), Diction (D), Intonation (I), Projection (PR), and Vocal Quality (VQ)

<table>
<thead>
<tr>
<th>Group</th>
<th>P</th>
<th>B</th>
<th>D</th>
<th>I</th>
<th>PR</th>
<th>VQ</th>
</tr>
</thead>
<tbody>
<tr>
<td>VPCVS (n=22)</td>
<td>3.72</td>
<td>3.04</td>
<td>3.59</td>
<td>3.40</td>
<td>3.54</td>
<td>3.54</td>
</tr>
<tr>
<td>Mean</td>
<td>0.702</td>
<td>0.950</td>
<td>0.854</td>
<td>1.333</td>
<td>0.911</td>
<td>0.857</td>
</tr>
<tr>
<td>VPCS (n=29)</td>
<td>3.62</td>
<td>3.65</td>
<td>3.82</td>
<td>3.72</td>
<td>4.00</td>
<td>3.79</td>
</tr>
<tr>
<td>Mean</td>
<td>0.862</td>
<td>0.936</td>
<td>0.804</td>
<td>1.306</td>
<td>0.654</td>
<td>0.818</td>
</tr>
<tr>
<td>CSO (n=28)</td>
<td>3.35</td>
<td>3.14</td>
<td>3.28</td>
<td>3.14</td>
<td>3.07</td>
<td>3.32</td>
</tr>
<tr>
<td>Mean</td>
<td>0.869</td>
<td>1.007</td>
<td>0.937</td>
<td>1.353</td>
<td>0.813</td>
<td>0.862</td>
</tr>
<tr>
<td>NCC (n=31)</td>
<td>3.38</td>
<td>3.09</td>
<td>3.48</td>
<td>3.32</td>
<td>3.35</td>
<td>3.51</td>
</tr>
<tr>
<td>Mean</td>
<td>0.843</td>
<td>0.943</td>
<td>0.851</td>
<td>1.076</td>
<td>0.838</td>
<td>0.851</td>
</tr>
</tbody>
</table>
The Tukey Post-Hoc test was performed on the mean ratings to determine specifically which groups were significantly different. The Tukey revealed significant difference between the VPCS and both the CSO and the NCC groups for projection at the .05 level (Table 5).

Table 5

Means Scores and Tukey Post-Hoc Comparisons on Posttest Scores of Vocal Performance By Group

<table>
<thead>
<tr>
<th>Projection</th>
<th>CSO</th>
<th>NCC</th>
<th>VPCS</th>
<th>VPCS</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>3.07</td>
<td>3.35</td>
<td>3.54</td>
<td>4.00</td>
</tr>
</tbody>
</table>

Note: Underlined means were not significantly different.

Experimental Question Five. Will there be significant differences among posttest scores of knowledge of vocal pedagogy of subjects in three treatment groups and no contact control?

Subjects completed the ten item Vocal Knowledge Test which was administered as a posttest-only measure. The highest possible score on the
multiple-choice test was ten. An ANOVA indicated a significant difference among the four groups (n=101). Results appear in Table 6. Means scores, standard deviations, Tukey Post-Hoc comparisons appear in Table 7. The VPCS had the highest mean score (M=7.70) while the CSO had the lowest (M=6.19). A significant difference existed between the VPCS group and both the CSO and NCC groups. There was no significant difference between the VPCS and VPCVS groups and the CSO and NCC groups on the Vocal Knowledge Test.

Table 6
Analysis of Variance on Vocal Knowledge Test

<table>
<thead>
<tr>
<th>Source</th>
<th>df</th>
<th>SS</th>
<th>MS</th>
<th>F</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>Between Groups</td>
<td>3</td>
<td>36.6411</td>
<td>12.2137</td>
<td>4.86</td>
<td>0.003*</td>
</tr>
<tr>
<td>Within Groups</td>
<td>98</td>
<td>246.1529</td>
<td>2.5117</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>101</td>
<td>282.7941</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

*Denotes significance at p<.05
Table 7

Mean Scores, Standard Deviations, Tukey Post-Hoc Comparisons of Vocal Knowledge Test By Group

<table>
<thead>
<tr>
<th>Group</th>
<th>CSO (n=26)</th>
<th>NCC (n=27)</th>
<th>VPCVS (n=22)</th>
<th>VPCS (n=26)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mean</td>
<td>6.1923</td>
<td>6.4444</td>
<td>7.0909</td>
<td>7.7037</td>
</tr>
<tr>
<td>SD</td>
<td>1.6737</td>
<td>1.5770</td>
<td>1.6877</td>
<td>1.4091</td>
</tr>
</tbody>
</table>

Note: Underlined means were not significantly different.

Experimental Question Six. Will there be significant differences among the posttest attitudes of singing of subjects in three treatment groups and no contact control?

Subjects responded to the thirty-five item, two-part Singing Attitude Survey (n=101). The twenty-four statements in Part I pertained to elementary education majors' general attitudes toward singing and engaging children in singing activities. Part II, consisting of eleven items, was a self-competence analysis of elementary education majors vocal performance skill.
An ANOVA indicated a significant difference among groups in general attitude (Table 8). Significant differences were not found on Part II, though results approached significance (p<.057). The Tukey Post-Hoc test indicated a significant difference between the VPCS group and the NCC groups on general attitudes (Part I). Results of the Tukey procedure, mean scores and standard deviations for both parts are given in Table 9.

Table 8

<table>
<thead>
<tr>
<th>Source</th>
<th>df</th>
<th>SS</th>
<th>MS</th>
<th>F</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>Attitudes</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Between Groups</td>
<td>3</td>
<td>1.4167</td>
<td>0.4722</td>
<td>3.01</td>
<td>0.033*</td>
</tr>
<tr>
<td>Within Groups</td>
<td>98</td>
<td>15.3689</td>
<td>0.1568</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>112</td>
<td>16.7857</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Self Competence Analysis</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Between Groups</td>
<td>3</td>
<td>2.2448</td>
<td>0.7482</td>
<td>2.59</td>
<td>0.057</td>
</tr>
<tr>
<td>Within Groups</td>
<td>98</td>
<td>28.3392</td>
<td>0.2981</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>112</td>
<td>30.5840</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

*Denotes significance p<.05
Table 9

Mean Scores, Standard Deviations, and Tukey Post-Hoc Comparisons of Singing Attitude Survey

<table>
<thead>
<tr>
<th>Attitudes</th>
<th>NCC (n=27)</th>
<th>CSO (n=26)</th>
<th>VPCVS (n=22)</th>
<th>VPCS (n=26)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mean</td>
<td>3.249</td>
<td>3.467</td>
<td>3.512</td>
<td>3.545</td>
</tr>
<tr>
<td>SD</td>
<td>0.456</td>
<td>0.378</td>
<td>0.425</td>
<td>0.314</td>
</tr>
</tbody>
</table>

Self Competence Analysis

| Mean                           | 3.323      | 3.405      | 3.691        | 3.616       |
| SD                             | 0.461      | 0.653      | 0.519        | 0.499       |

Note: Underlined means were not significantly different.

Additional Finding

Vocal performance was a primary area under investigation in the study. Respondents provided a self-analysis of their current vocal performance skills in Part II the Singing Attitude Survey. A rank-order of mean scores for each of the eleven items, accompanying descriptions, and value ratings
are found in Table 10. The information was regarded as pertinent in part due to the findings of Goodman (1985/1986).
Table 10

Rank-Order Mean Scores for Singing Attitude

Survey: Self-Competence Analysis

<table>
<thead>
<tr>
<th>Item No.</th>
<th>Item Mean</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>2</td>
<td>4.21</td>
<td>Sing with correct vocal tone</td>
</tr>
<tr>
<td>6</td>
<td>4.14</td>
<td>Sing best with accompaniment</td>
</tr>
<tr>
<td>7</td>
<td>4.13</td>
<td>Sing in tune</td>
</tr>
<tr>
<td>8</td>
<td>3.85</td>
<td>Find correct starting pitch</td>
</tr>
<tr>
<td>5</td>
<td>3.84</td>
<td>Sing using good diction</td>
</tr>
<tr>
<td>9</td>
<td>3.48</td>
<td>Stand in correct position to sing</td>
</tr>
<tr>
<td>1</td>
<td>3.44</td>
<td>Sit in correct position to sing</td>
</tr>
<tr>
<td>10</td>
<td>3.44</td>
<td>Breathe properly to sing</td>
</tr>
<tr>
<td>3</td>
<td>3.39</td>
<td>Teach a song</td>
</tr>
<tr>
<td>4</td>
<td>2.84</td>
<td>Project voice effectively</td>
</tr>
<tr>
<td>11</td>
<td>1.70</td>
<td>Sing best without accompaniment</td>
</tr>
</tbody>
</table>

Total 3.50

Value Ratings

1-1.99: little competence
2-2.99: some competence
3-3.99: substantial competence
4-4.99: very competent
Informal Comments on Class Voice Instruction

Space was made available at the end of Part II of the Singing Attitude Survey for respondents to comment concerning class voice instruction. The majority of the comments supported the need for more voice training for elementary education majors. Informal comments can be found in Appendix J.
CHAPTER V
SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS

Purpose of the Study

The purpose of the study was to investigate the effect of class voice instruction and differential song material on vocal performance, vocal knowledge, and attitude of elementary education majors. The study sought to answer the following questions:

1. Will subjects who receive vocal pedagogy training using traditional class voice songs gain significantly in pre-post evaluations of solo vocal performances?

2. Will subjects who receive vocal pedagogy training using children's songs gain significantly in pre-post evaluations of solo vocal performances?

3. Will subjects who engage in singing children's songs, and receive no pedagogical training, gain significantly in pre-post evaluations of solo vocal performances?

4. Will there be significant differences among posttest evaluations of solo vocal performances by
subjects in three treatment groups and no contact control?

5. Will there be significant differences among the posttest scores of knowledge of vocal pedagogy of subjects in three treatment groups and no contact control?

6. Will there be significant differences among the posttest attitudes of singing of subjects in three treatment groups and no contact control?

To address the above research questions, the study involved the manipulation of certain treatment conditions and the assessment of effects on selected dependent measures.

**Evaluation Instruments**

Three instruments were used for measurement. A *Vocal Performance Rating Form* was developed to be used by three judges in evaluating the solo videotaped vocal performances of subjects in the study. The instrument was constructed based on information from various voice class texts, voice class observations, vocal pedagogy literature, and elementary music texts for elementary education majors. The form consisted of six evaluation factors: posture, breathing, diction,
intonation, projection and vocal quality. It was validated by a panel of experts whose specialization is vocal music education. A Vocal Knowledge Test was constructed to test the possible effects of treatment on vocal pedagogy knowledge. The ten-item, multiple choice test was formulated from voice class and vocal pedagogy literature as well as elementary music materials for prospective classroom teachers. The content of the test was validated by a panel with expertise in vocal music and vocal pedagogy.

A Singing Attitude Survey was also constructed in order to examine possible attitude differences in groups. The thirty-five item, two part questionnaire was used to ascertain elementary education majors' general attitudes towards engaging children in singing activities and to evaluate their perceptions of their current level of vocal performance. This instrument was examined by a panel of music educators with expertise in elementary music education.

Research Design

A pretest-posttest design was employed in the analysis of the vocal performance of each of the three treatment groups. The analysis of posttest-only
measures involved a posttest-only control group design on vocal performance, vocal knowledge, and attitude.

**Procedures**

One hundred and thirteen elementary education majors enrolled in the required music sequence for elementary education majors during the Spring Quarter 1987 at The Ohio State University served as subjects in the study. Students in Music 271 served as the no contact control group (NCC) while students from Music 270 and 370 were randomly assigned to treatment groups. Three treatment groups were investigated: (1) vocal pedagogy instruction using traditional class voice songs as song literature (VPCVS); (2) vocal pedagogy instruction using children's songs as song literature (VPCS); and (3) singing children songs only (CSO). Before the instructional period commenced, all subjects in the treatment groups completed a pretest which involved video recordings of individual performances of "America", sung without accompaniment.

Class voice sessions were held twice a week for forty minute periods. The instructional period was five weeks and all instruction was conducted by the investigator. At the conclusion of the instructional
period, all subjects completed the vocal performance skills posttest ("America"), the Vocal Knowledge Test and the Singing Attitude Survey. Vocal performances were evaluated by three judges using the Vocal Performance Rating Form.

Results and Discussion

The findings are presented in order of research questions, with the first three being presented together.

1. Will subjects who receive vocal pedagogy training using traditional class voice songs gain significantly in pre-post evaluations of solo vocal performances?

2. Will subjects who receive vocal pedagogy training using children’s songs gain significantly in pre-post evaluations of solo vocal performances?

3. Will subjects who engage in singing children’s songs, and receive no pedagogical training, gain significantly in pre-post evaluations of solo vocal performances?

Solo-vocal performances were evaluated by three independent judges. A common set of one-third of the performances were subjected to an inter-judge
agreement check. The result was an overall 85% level of agreement. Thus subsequent analyses proceeded with confidence in the basic data and the remaining performances were divided among the three judges.

Pre-post evaluations were subjected to statistical analysis employing t-tests. The VPCS group showed significant pre-post changes on posture (p<.020) and vocal quality (p<.053) factors. Though not statistically significant, results for vocal projection (p<.070) approached the .05 level of confidence, suggesting that class voice instruction using children's songs might indeed have had some effect on the vocal projection of this group. The VPCVS and CSO groups showed no significant changes between pretest and posttest observations.

4. Will there be significant differences among posttest evaluations of solo vocal performances by subjects in three treatment groups and no contact control?

An Analysis of Variance on pretest scores indicated no significant differences among three treatment groups. The ANOVA computed on posttest scores revealed a significant difference among groups on projection (p<.000) but no significant differences
in posture, diction, intonation, and vocal quality. Though not significant, breathing approached significance \((p<.068)\) suggesting that class voice instruction may have resulted in an improvement in breathing. The Tukey Post-Hoc comparisons indicated that there was a significant difference among vocal projection ratings for the VPCS group \((M=4.00)\) and both the CSO \((M=3.07)\) and NCC \((M=3.35)\). The VPCVS and VPCS and the CSO and NCC were not significantly different from each other.

5. Will there be a significant difference among the posttest scores of knowledge of vocal pedagogy of subjects in three treatment groups and no contact control?

The Vocal Knowledge Test revealed a significant difference among groups \((p<.003)\). There was a significant difference between the scores of the VPCS group \((M=7.70)\) and both the CSO \((M=6.19)\) and NCC \((M=6.44)\) groups. The scores of VPCVS \((M=7.09)\) and VPCS and the scores of the CSO and NCC \((M=6.44)\) were not significantly different from each other. It is interesting to note that although the VPCVS received vocal pedagogy instruction, the score for this group on the Vocal Knowledge Test was not significantly
higher than the two groups that did not receive selected pedagogical training.

6. Will there be a significant difference among the posttest attitudes about singing of subjects in three treatment groups and no contact control?

An Analysis of Variance indicated a significant difference ($p<0.033$) at the .05 level among groups in subjects' general attitudes about singing and engaging children in singing activities on Part I of the Singing Attitude Survey. A significant difference was revealed between the VPCS group and the NCC group but no other comparisons were significant. The VPCVS, VPCS, and CSO groups were not significantly different from each other. Although there was not a significant difference indicated among groups in self-competence analysis of vocal performance skills (Part II), the level approached significance ($p<.057$). The mean score of the NCC ($M=3.32$) was the lowest while the highest mean score of the VPCVS was the highest ($M=3.69$).

The means score for each of the eleven items in Part II were rank-ordered and categorized using the "value ratings" method employed by Goodman (1985/1986) in his doctoral study. From lowest to highest value
ratings were: "little competence" (1-1:99); "some competence" (2-2:99); "substantial competence" (3-3:99); and "very competent" (4-4:99). The results showed the highest mean score ($M=4.21$) to be in elementary education majors' assessment of their abilities to "sing with correct vocal tone," while the lowest mean ($M=1.70$) was "singing without accompaniment." It of interest that the second lowest mean score ($M=2.84$) was in vocal projection abilities. This was also the factor in vocal performance where a significant difference was indicated among groups. The mean scores for "singing in tune" and "teaching a song" were 4.13 and 3.39, respectively. These findings coincide with Goodman's (1985/1986) report that classroom teachers feel "substantial competence" in "singing in tune" ($M=3.22$) and "teaching a rote song" ($M=3.65$).

**Conclusions**

The following conclusions are offered based on the data:

1. Vocal pedagogy training using children's songs has a positive effect on elementary education majors' vocal performance skills in the areas of posture and
vocal quality. While there is no significant improvement in breathing, the level of confidence achieved indicates that this type of instruction might indeed have some promise for improving breathing.

2. Elementary education majors who receive vocal pedagogy training using children's songs demonstrate a significantly higher vocal projection ability than those elementary education majors who only sing children's songs and those who receive no additional singing experiences.

3. Elementary education majors who receive vocal pedagogy training using children's songs, demonstrate significantly more vocal knowledge than those elementary education majors who only sing children's songs or those who receive no additional singing experience. However, elementary education majors who receive vocal pedagogy training using traditional class voice songs, and those students who only sing children's songs, do not show significantly higher vocal knowledge than those elementary education majors who do not have additional singing opportunities.

4. Class voice instruction involving vocal pedagogy training with traditional class voice songs or children's songs, or merely singing children's
songs has a positive effect on general attitudes of elementary education majors towards singing and engaging children in singing activities.

5. Although not statistically significant difference, there is evidence that differences exist in the self-competence analysis of vocal performance skills of elementary education majors who have more singing experiences, and/or vocal pedagogy instruction using traditional class voice or children's songs, and those who do not have this experience. The noticeable difference is sufficient to suggest that added singing opportunities might eventually affect elementary education majors' assessment of their own vocal performance skills.

6. Vocal pedagogy training, using traditional class voice songs, has no significant effect on improving vocal performance skills of elementary education majors, as evidenced in the lack of pre-post change in any of the six performance factors.

7. Engaging elementary education majors in singing children's songs, with no vocal pedagogy training, is not an effective means of improving vocal performance.
8. Elementary education majors feel "very competent" in their abilities to "sing with correct vocal tone" and to "sing in tune" but only "some competence" in vocal projection and "little competence" in "singing without accompaniment."

9. The vocal performances of elementary education majors can be effectively evaluated using a rating form designed for this purpose.

10. Judges who evaluate videotaped vocal performances tend to have a higher agreement level on more visible, objective aspects of singing such as posture, diction, intonation, and projection. A higher disagreement level is observed on less visible, subjective aspects of singing such as breathing and tone quality. Sims (1961) recommended the inclusion of both objective and subjective components on a rating form for vocal performance evaluation and established these components in her rating scale a priori. This approach was not taken in the present study. However, the results of interobserver agreement levels in the present study tend to support Sims' findings of a lack of agreement among judges on subjective aspects such as breath support, breath control, and tone quality.
Interpretations

Vocal pedagogy training using children's songs appears to be the most effective method in improving posture, vocal projection, and vocal quality of elementary education majors. Students who receive this instruction demonstrate significantly higher achievement on vocal knowledge and attitude assessments. There are no significant differences between the achievements of elementary educations who receive vocal pedagogy instruction and sing traditional class voice songs and these students. This observation suggests that merely singing songs is not an adequate activity for improving the vocal performance skills of elementary education majors. These results reinforce Goetze's (1986) finding that "the role of music training is an important one in developing singing skills" (p. 138).

The positive results with subjects who received vocal pedagogy instruction and sing children's songs may be attributed to the number and type of songs used. Forty-four songs were used during the five-week instructional period as opposed to the nineteen traditional class voice songs used. The songs used
were also more akin to the types of literature these students are being prepared to use in the elementary classroom. It is also possible that this literature was more compatible with that being experienced in the classes which students were currently enrolled. This simultaneous reinforcement could have contributed to the achievement of this group.

There is a difference between the general attitudes toward singing and engaging children in singing activities of elementary education majors who have special class voice experience and those who do not have this experience. This difference suggests that class voice instruction with pedagogical information or just singing songs has a positive effect on the attitudes of elementary education majors towards singing and their involvement in leading children in singing activities. This result is notable in that it points out that special vocal training can influence attitudes, regardless of the specific nature of that training.

While the difference among elementary education majors' assessments of their vocal performance skills is not statistically significant, the level achieved suggests that class voice instruction and singing
experiences could have a positive effect on elementary education majors' perceptions of their vocal performance abilities.

Traditional class voice songs are not appropriate literature for elementary education majors who, for the most part, have had minimal singing experiences. These songs require a degree of vocal sophistication which appears to be beyond the present vocal abilities of most of the students in this group. Using the rote method, with only the text of the song given, is not effective in this setting. Students had no visual reference to support what they were expected to execute vocally. The inclusion of notation might have helped the students to follow the melodic contour of the song. Because of the length of the songs used, it is possible that students concentrated more on remembering the song rather than assimilating the vocal pedagogy concepts in performance. Although vocal range was a consideration in song selection, tessitura was not. Elementary education majors, in singing traditional class voice songs, were using various parts of their vocal range, particularly their upper range, which they apparently were unaccustomed to doing. These observations may account for the lack
of significant improvement in vocal performance of elementary education majors who received vocal pedagogy instruction using traditional class voice songs.

The lack of improvement in some areas of vocal performance may be attributed to the limited length of instruction. The five week treatment period was selected as a means of accommodating simultaneously the requirements of the classes used. However, this may not have been a realistic length of time in which to synthesize and apply learned pedagogical concepts in actual vocal performance. In his doctoral dissertation, Ten Eyck (1985) found no significant differences between the choral sound of children’s choruses whose directors used programmed instruction materials with accompanying listening tapes and those directors who did not receive these materials. He concluded that the lack of difference was due to the inability of the directors to incorporate the knowledge they gained into the rehearsal setting.

Understanding of vocal knowledge concepts is not necessarily guaranteed by receiving formal vocal instruction. In the study, no significant difference was found among the scores of elementary education
majors who received vocal pedagogy using traditional class voice songs or those who sang children's songs, and those students who did not participate in additional singing experiences. These results suggest that elementary education majors may already possess a basic understanding of vocal knowledge, and while class voice instruction provides demonstrations and applications of concepts, this organized instruction does not particularly enhance basic knowledge about the voice and related vocal pedagogy. It is possible, also, that the results from this test were due to the length of the test and the need for more specific and extensive coverage of content.

This study, like similar studies in vocal performance (Sims, 1961; Ten Eyck, 1985; Goetze, 1986), involved the singing of a selected song to evaluate change or improvement in vocal performance. Sims noted that "The demands of a musical selection will greatly determine the level of performance as evaluated by the objective components" (p. 76). It is possible that "America" may not have been the most effective song for revealing dramatic differences in performances of subjects who received different vocal training experiences.
While all singing during the five-week instructional period was accompanied, students were asked at both the pretest and posttest to find the starting pitch and sing "America" unaccompanied. This may have had some affect on the level of performance of elementary education majors' who in self-competence analysis of vocal performance indicated that they feel "little competence" in "singing without accompaniment". This finding coincides with those of Vorce (1965). He noted, in his doctoral study, the significant difference between the unaccompanied and accompanied vocal performance of adults. Singing with accompanying instruments or voices was more effective in improving pitch accuracy. Therefore, it may have been unrealistic to expect elementary education majors to sing without the aid of accompaniment.

The study has shown that an appropriate instrument can be developed for use in evaluating the vocal performances of elementary education majors. Although the construction of such a device was not an initial purpose of the study, the validation and subsequent use of the rating form, as a dependent measure, provide a basis for its implementation as a
tool in evaluating the vocal performance skills of elementary education majors.

Recommendations

1. Replication of the study with a longer treatment period.

2. Replication of the study with periodic evaluations to measure gain and improvement throughout the duration of the treatment.

3. Replication of the study using a different song in pretest and posttest performances with the starting pitch and accompaniment provided.

4. Follow-up investigation to determine the long-term effect of preservice class voice instruction on classroom teachers' attitude towards engaging children in singing activities and the extent to which these teachers actually lead children in singing activities.

5. Development of supplementary class voice instruction for elementary education majors.

6. Further testing of the Vocal Performance Rating Form and consideration for its use as an instrument for evaluating vocal performances of elementary education majors.
LIST OF REFERENCES


Good, M. (1962). Music in selected Virginia elementary schools having no music specialist or music supervisor. Dissertation Abstracts, 22, 1655. (University Microfilms No. 61-4543)


Klein, A. F. (1956). Elementary teachers' judgments regarding the adequacy of their music perception. Dissertation Abstracts, 16, 133. (University Microfilm No. 15, 467)


APPENDIX A

TRADITIONAL CLASS VOICE SONGS

103

All Through the Night


Bendemeer's Stream
Early One Morning
The Gypsy Rover
The Turtle Dove
What If Day


The Riddle Song
Today
Sunrise, Sunset


Far Down in the Valley
Drink to Me Only With Thine Eyes
APPENDIX B

CHILDREN’S SONGS AND REFERENCES

*Are You Sleeping*
*Hey Ho! Nobody Home*
*Music Alone Shall Live*
*Swing Low, Sweet Chariot*
*When the Saints Go Marching In*


*E Jeka Lo*
*Ev'rybody Loves Saturday Night*
*London's Burning*

*Singing for everyone*. Delaware, Ohio: Cooperative Recreation Services.

*Good Night to You All*
*Holla Hi, Holla Ho*
*Hunting Song*
*Old Gray Goose*
*Sarasponda*
*The Swan Sings*


*Ifca's Castle*
*Shalom, Chaverim*


*Little Bells of Westminster*
*Polly Wolly Doodle*
*Why Shouldn't My Goose*

Donkeys and Carrots
Four in a Boat
Land of the Silver Birch
Sandy Land


Canoe Round
Chairs to Mend


Found a Peanut
Johnny Has Gone for a Soldier
Take Time in Life
Who's Gonna Shoe Your Pretty Little Foot


At the Foot of Yonder Mountain
Blow the Man Down
Coffee Grows on White Oak Trees
Copper Kettle
Lovely Evening
Love Somebody
Mister Frog Went A'Courtin'
Tails


A Bicycle Built for Two
Grandfather's Clock
I've Been Working on the Railroad
Oh, Dear! What Can the Matter Be
The Mulberry Bush
The Old Gray Mare
When Johnny Come Marching Home
APPENDIX C

VOCAL PERFORMANCE RATING FORM
VOCAL PERFORMANCE RATING FORM

Please use the following form in evaluating each videotaped solo vocal performance on a continuum of one to five. Circle only one number for each category. Also, indicate your assessment of each subject's ability to perform the skills listed under each heading by circling a minus (-) for disagree and a plus (+) for agree.

Rating Scale

<table>
<thead>
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<th>2</th>
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Posture

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<td>b.</td>
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<td>c.</td>
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<td>d.</td>
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Breathing

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<td><strong>Diction</strong></td>
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<td>a. consonants articulated</td>
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<td>b. vowels enunciated</td>
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<td>c. words understandable</td>
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<td><strong>Intonation</strong></td>
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<td>a. maintains the starting pitch</td>
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<td>b. sings in tune throughout</td>
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<td>c. maintains the key</td>
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<td>+</td>
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<td><strong>Projection</strong></td>
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<td>a. tone forward</td>
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<td>b. tone not forced</td>
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<td>c. tone audible</td>
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<td><strong>Vocal Quality</strong></td>
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<td>a. free</td>
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<td>b. steady</td>
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<td>+</td>
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<td>c. pleasant</td>
<td>-</td>
<td>+</td>
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**COMMENTS**

_________________________________________________________
APPENDIX D

VOCAL KNOWLEDGE TEST
Please place a check (√) next to your class and group, if applicable.

<table>
<thead>
<tr>
<th>Time</th>
<th>Class A</th>
<th>Class B</th>
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<tbody>
<tr>
<td>8:00</td>
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<td>10:00</td>
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<td>4:00</td>
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</table>
Please select the answer which bests completes the following statements. Indicate your response (one only) by circling the corresponding letter.

1. The type of breathing most desired for singing is
   a. clavicular
   b. diaphragmatic
   c. costal
   d. none of the above

2. The first aspect of singing that must be established is
   a. posture
   b. breathing
   c. projection
   d. none of the above

3. The correct position for singing when standing is
   a. feet slightly apart, one in front of the other
   b. shoulders rounded and relaxed
   c. chest high
   d. all of the above

4. The type of breathing that is synonymous to the "Jogger's breath" is
   a. clavicular
   b. diaphragmatic
   c. costal
   d. none of the above
5. During inhalation and exhalation, the chest should remain
   a. high
   b. quiet
   c. a and b
   d. none of the above

6. A correct vocal tone should be
   a. free
   b. pleasant
   c. steady
   d. all of the above

7. Diction involves
   a. words
   b. vowels
   c. consonants
   d. all of the above

8. Vocal quality is most closely associated with the
   a. character of the voice
   b. placement of the voice
   c. projection of the voice
   d. none of the above

9. Intonation means singing
   a. in tune
   b. softly
   c. with expression
   d. none of the above

10. Projection refers to
    a. holding back the tone
    b. forcing the tone
    c. softening the tone
    d. none of the above
APPENDIX E

SINGING ATTITUDE SURVEY
A SURVEY OF ELEMENTARY EDUCATION MAJORS' OPINIONS
ABOUT THE ROLE OF THE CLASSROOM TEACHER IN ENGAGING
CHILDREN IN SINGING ACTIVITIES

Please place a check (✓) next to your class and group, if applicable.

___ 8:00 ___ 10:00 ___ 3:00 ___ 4:00
___ A ___ A ___ A
___ B ___ B ___ B
In completing the attached questionnaire, you may refer to the following definitions. They are:

Classroom Teacher. Person who is employed in a school setting to teach elementary education.

Rote Song Method. A method of teaching a song with only the teacher having the aid of written words or music.

Voice Class. Group vocal instruction as opposed to individual vocal instruction.

Class Voice Instruction. Term used interchangeably with voice class.

Singing Activities. Guided musical activities that involve singing songs.

Music Specialist. Person with a music education degree who is employed in the school setting to teach music.

Vocal Modeling. Demonstrating with the singing voice for the purpose of imitation by students or to initiate or lead singing activities for instructional purposes.

Diction. Proper enunciation of the text of a song while singing.

Correct Vocal Tone. A vocal tone that is free (not tense), steady, and pleasant.

Class Voice Songs. Songs selected from texts used in the class voice setting (e.g., art songs, folk songs, ballads, songs from musical theater).

Children's Songs. Songs selected from texts used in the elementary class setting and from supplementary sources which have been compiled for use with children.

Preservice Training. Preparation of elementary educators majors during undergraduate study prior to inservice experience.
Singing has long been regarded as central to the elementary school music curriculum. As a prospective classroom teacher, what is your opinion about the role of the classroom teacher's involvement in engaging children in singing activities?

DIRECTIONS: Please circle the response which best reflects your view.

1 = strongly disagree
2 = disagree
3 = neither agree nor disagree
4 = agree
5 = strongly agree

Part I.

1. It is important for classroom teachers to know how to use the singing voice effectively in order to lead children in singing activities........1 2 3 4 5

2. Classroom teachers should know how to teach children to sing.................................1 2 3 4 5

3. Classroom teachers should be able to lead a song using the rote song method...............1 2 3 4 5

4. The major purpose of singing is for recreation......................1 2 3 4 5

5. Classroom teachers should be able to provide an effective model for musical performance without the aid of a recording.........................1 2 3 4 5

6. Using children's songs for song literature in a voice class for elementary education majors would be an appropriate choice of song material.........................1 2 3 4 5
7. It is important for classroom teachers to know how to select song material for children.........................1 2 3 4 5

8. In a five year teacher certification program, voice class should be a required course for elementary education majors.......................1 2 3 4 5

9. The major purpose of singing activities is to strengthen the social-emotional growth of a child.................................1 2 3 4 5

10. Specific vocal training should be a part of a music skills and fundamentals class..............1 2 3 4 5

11. Even when there is a music specialist, the classroom teacher should take an active role in teaching songs......................1 2 3 4 5

12. Using class voice songs for song literature in a voice class for elementary education majors would be an appropriate choice of song material.........................1 2 3 4 5

13. Children should sing in the elementary class in some form (music lesson or one song) every day..............1 2 3 4 5

14. Classroom teachers who are able to sing are more likely to engage children in general music activities.........................1 2 3 4 5

15. The use of recordings is not as effective in teaching singing as the teacher......................1 2 3 4 5
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<tr>
<td>16.</td>
<td><strong>Classroom teachers who are able to sing are more likely to engage children in singing activities</strong></td>
<td>1</td>
<td>2</td>
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<tr>
<td>17.</td>
<td><strong>Most children have a natural talent for singing</strong></td>
<td>1</td>
<td>2</td>
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<tr>
<td>18.</td>
<td><strong>Singing class voice songs in a voice class for elementary education majors would be enjoyable</strong></td>
<td>1</td>
<td>2</td>
<td>3</td>
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<tr>
<td>19.</td>
<td><strong>Most of the skills involved teaching singing can be learned by the prospective teacher</strong></td>
<td>1</td>
<td>2</td>
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<tr>
<td>20.</td>
<td><strong>The major purpose of the classroom teacher engaging children in singing activities is to insure that the attitudes of children toward singing are positive</strong></td>
<td>1</td>
<td>2</td>
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<tr>
<td>21.</td>
<td><strong>Knowledge of one's own singing voice would likely improve one's ability to lead children in singing activities</strong></td>
<td>1</td>
<td>2</td>
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<tr>
<td>22.</td>
<td><strong>More singing experiences during preservice training would be beneficial in preparing prospective classroom teachers to engage children in singing activities</strong></td>
<td>1</td>
<td>2</td>
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<tr>
<td>23.</td>
<td><strong>Classroom teachers would engage children in more singing activities if they felt confident in their singing abilities</strong></td>
<td>1</td>
<td>2</td>
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<tr>
<td>24.</td>
<td><strong>Singing children's songs in a voice class for elementary education majors would be enjoyable</strong></td>
<td>1</td>
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</table>
Part II.

Classroom teachers are expected to have certain music skills. One of these is the ability to sing in order to engage children in singing activities. How do you perceive your current singing skills?

DIRECTIONS: Please circle the response which best reflects your view.

1 = strongly disagree
2 = disagree
3 = neither agree nor disagree
4 = agree
5 = strongly agree

<table>
<thead>
<tr>
<th>Statement</th>
<th>1</th>
<th>2</th>
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<tbody>
<tr>
<td>1. I can sing using a correct vocal tone</td>
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<td>2. I can sing best with accompaniment</td>
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<td>3. I can sing in tune throughout the duration of a song</td>
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<td>4. I can find the correct starting pitch in any key</td>
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<td>5. I can sing using good diction</td>
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<tr>
<td>6. I can stand in the correct position for singing</td>
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<td>7. I can sit in the correct position for singing</td>
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<td>8. I can breathe properly for singing</td>
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<td>9. I can teach a song using the rote song method</td>
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</table>
10. I can project my voice effectively..............................1 2 3 4 5

11. I can sing best without accompaniment.........................1 2 3 4 5

Please use the space below to comment on the strengths and/or weaknesses of the class voice instruction you received the quarter, if applicable.
APPENDIX F

INSTRUCTION SCHEDULE FOR TREATMENT GROUPS
CLASS VOICE INSTRUCTION

MUSIC 270

GROUP A             GROUP B
(VPCVS)            (CSO)

Students in Groups A and B should report to Room 109
Hughes Hall at 8:00 a.m. on the following schedule:

April 20-April 24**
Monday and Wednesday (A); Thursday and Friday (B)

April 27-May 1
Monday and Wednesday (B); Tuesday and Thursday (A);

May 4-May 8
Monday and Wednesday (A); Tuesday and Thursday (B)

May 11-May 15
Monday and Wednesday (B); Tuesday and Thursday (A)

May 18-May 22**
Tuesday and Friday (A); Wednesday and Thursday (B)

**Please note changes in sequence.
Students in Groups A and B should report to Room 109 Hughes Hall at noon on the following schedule:

**April 20-April 24**
Monday and Wednesday (A); Thursday and Friday (B)

**April 27-May 1**
Monday and Wednesday (B); Tuesday and Thursday (A)

**May 4-May 8**
Monday and Wednesday (A); Tuesday and Thursday (B)

**May 11-May 15**
Monday and Wednesday (B); Tuesday and Thursday (A)

**May 18-May 22**
Tuesday and Friday (A); Wednesday and Thursday (B)

**Please note changes in sequence.**
CLASS VOICE INSTRUCTION
MUSIC 370

GROUP A  
(VPCVS)

GROUP B  
(VPCS)

Students in Groups A and B should report to Room 213 Hughes Hall on the following schedule:

April 20-24

Monday, A-B; Thursday, B-A

April 27-May 1

Monday, A-B; Tuesday, B-A

May 4-May 8

Monday A-B; Tuesday, B-A

May 11-May 15

Monday, A-B; Tuesday, B-A

May 18-May 22

Tuesday, A-B; Thursday, B-A

Please note changes in sequence.
APPENDIX G

VIDEOTAPING SCRIPTS (PRETEST, POSTTEST)
SCRIPT FOR VIDEOTAPING (PRETEST)

Thank you for coming, _____________. As you know, Music 270 (Music 370) is being team-taught this quarter with more emphasis on singing. I wanted to hear everybody individually before starting the group instruction. The song you'll be singing is "America." You might know this song as "My Country 'Tis of Thee." I'd like for you to sing the song one time and you may sing in the key that is the most comfortable for you. You are not permitted to use the piano or to practice the song before you are taped. Instead of humming the starting pitch, I'd like for you to sing it two times on the syllable "lah." Do you have any questions? Please stand on the "x" and take a moment to review the words. (pause) When I raise my right hand, begin with your starting pitch and then move right into singing "America." Remember that the "lahs" are also the first notes of the song. After your last note, count to five then you may move. Please do not discuss the fact that you sang this song with the other students. Enjoy yourself!
Thank you for coming, ___________. As you know, Music 270 (370) were team-taught this quarter with more emphasis. I'd like for you to sing "America" or as you might know it, "My Country 'Tis of Thee." You may sing the song in the key that is the most comfortable for you. You are not permitted to use the piano or to practice the song before you are taped. Instead of humming the starting pitch, sing it two times on the syllable "lah." Do you have any questions? Please stand on the "x" and take a moment to review the words. (pause) When I raise my right hand, begin with your starting pitch and then move right into singing "America." Remember that the "lahs" are also the first notes of the song. After your last note, count to five and then you may move. Please do not discuss the fact that you sang this particular song with the other students. Enjoy yourself.
APPENDIX H

EQUIPMENT FOR VIDEOTAPEING

130
Panasonic Color Video Camera (Model No. WV-3230)

Panasonic Portable Video Cassette Recorder (Model No. NV-8420)

Velbon Tripod (Model No. VGB-32BC)

Sony Brand T-120 Minute Color Video Cassettes

Zenith Video Monitors (Model No. S1983W3)

Panasonic Video Cassette Recorder (Model No. AG-2200)

Panasonic Video Cassette Recorder (Model No. NV-8350)
APPENDIX I

DAILY LESSON PLANS

132
Week One

Day One

Introductions and distribution of song folders.
Elaboration of class procedure.
Warm-ups, voice building and relaxation exercises.
Discuss Concept: Posture.
Introduce song(s) for the day.

Day Two

Warm-ups, voice building and relaxation exercises.
Review Posture using specific activities.
Discuss Concept: Diction. Emphasize need for clear diction in singing and speaking.
Start breathing exercises with no explanation of process.
Review song(s) from Day One and add breath markings.
Sing song(s) alternating between standing and seated positions.

Week Two

Day Three

Exercises and warm-ups.
Discuss Concept: Breathing (Process and Types)
Use breathing exercises.
Discuss relationship of posture and breathing.
Introduce new song(s) with more attention given to all factors discussed.
Review first song(s).

Day Four

Exercises and warm-ups.
Review Breathing with reinforcement exercises.
Discuss Concept: Intonation
Incorporate concepts into performance.
Review songs employing learned techniques.
Introduce new song(s).

Week Three

Day Five

Warm-ups and exercises.
Review all concepts.
Discuss Concept: Projection.
Review all songs.
Introduce new song(s).
Permit group to select last song.

Day Six

Warm-ups.
Review all concepts using appropriate exercises
Emphasize need to demonstrate learned skills through vocal performance.
Permit students to select song for the day.
Introduce new song(s).

Week Four

Day Seven

Demonstrations of correct and incorrect Implementation of concepts with subject participation.
Warm-ups using songs from previous lessons
Discuss Concept: Vocal Quality
Divide subjects in small groups for singing.
Use songs already covered in previous lessons.
Introduce new song(s).
Day Eight
Repeat procedure from Day Seven.

Week Five

Day Nine
Warm-ups and exercises.
Review all concepts.
Encourage students to ask further questions related to pedagogy.
Review songs and introduce remaining song(s).
Permit students to select a few songs for end of lesson.

Day Ten
Remind subjects about videotaping next week.
Warm-ups.
Review concepts with subject input.
Permit subjects to select songs for the remainder of lesson.
APPENDIX J

INFORMAL COMMENTS ON CLASS VOICE INSTRUCTION
"I believe that the 270 singing and teaching class is very effective. Students who do not have a music background need as much vocal experience as [sic] can receive. I have really enjoyed the singing portion of 270 class and would strongly encourage the class to continue in this manner!"

"... The improvement in our singing was very obvious as a class and I believe for me individually. The instruction gave us all much more confidence when we had to teach a song ourselves."

"I really enjoyed the class—even though I don’t feel confident at all about my singing ability. I feel like I improved a little bit. I felt was a good addition to the class."

"I enjoyed the songs and the instruction. Things such as posture, breathing, diction were all items I had heard about but was not sure how they fit into singing. Now I know."

"I enjoyed the instruction that I received. It is good to expose future elementary teachers to children’s songs, however, I think that it should be taught independently from this Music 270 course. It makes it harder to keep up with the course."

"I enjoyed being able to sing in this class. ... I feel that my courage to sing in front of others improved, but that I do not know exactly the proper ways to sing (like breathing, and projection my voice). This was a good idea to start, maybe in the future their [sic] will be more instruction."

"I feel the voice class instruction was beneficial. It helped to build self-confidence and helped to eliminate fears about singing in groups, however, there could have been a little more technical in learning about producing a good vocal tone quality and maintaining the proper pitch. The use of children’s songs is an excellent idea."
"I feel it was a good experience because I have always felt uncomfortable about singing in front of others. I wish there would be a separate class required to teach class-voice instruction—not graded on ability but on effort."