

THE ATTITUDES OF SELECTED STUDENT TEACHERS
AT OKLAHOMA STATE UNIVERSITY TOWARD
THE PHYSICALLY DISABLED

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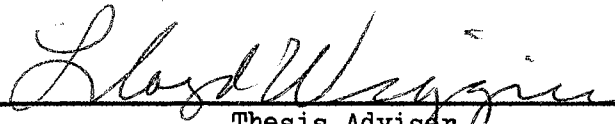
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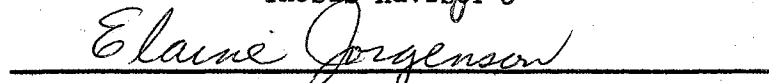
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Thesis Approved:



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DEDICATION

This thesis is dedicated to the Reverend Monsignor Leonard J. Fick, Vice President and Dean of Studies of the College of Liberal Arts, at the Pontifical College Josephinum in Worthington, Ohio. Father Fick is an august man, polished and grandiloquent, who always has an engaging and rhapsodical lecture prepared for his English classes. A paragon of scholarly devotion, he maintains an affinity with each one of his students. His wisdom as a teacher and as a priest has left an indelible mark on my life. I feel extremely honored to have been his good friend for the past years.

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TABLE OF CONTENTS

Chapter	Page
I. INTRODUCTION	1
Statement of the Problem	2
Purpose of the Study	3
Hypotheses of the Study	3
Procedure for the Study	4
Limitations	5
Definition of Terms	5
Organization of the Report of the Study	6
II. REVIEW OF LITERATURE	7
Introduction	7
Incidence	7
Attitude	8
Definition of Attitude	8
Definition of Disabled	9
Attitudes and Sex	9
Urban Vs. Rural	10
Attitudes and Contact or Experience	10
Attitudes and Knowledge	13
A Brief History of Oklahoma State University	
Student Teacher Attitudes	13
Attitudes of Agricultural Education	
Student Teachers	14
Attitudes of Home Economics Education	
Student Teachers	17
Special Educators Versus General Educators	18
Teacher Attitudes	19
Widespread Prejudice and Historical Attitudes	22
Background for the Study	23
Postulates	25
Major Hypotheses of the Study	26
III. PROCEDURES	27
Introduction	27
The Instrument	27
Permission for Use of the Questionnaire	29
Reliability	29
Construct Validity	30
The Population in the Study	30

Chapter	Page
Gathering Data in the Study	31
Handling the Data in the Study	32
IV. PRESENTATION AND ANALYSIS OF DATA	33
Introduction	33
The 150 Student Teachers of Oklahoma State University	33
The Agricultural Education Student Teachers of Oklahoma State University	36
The Home Economics Education Student Teachers of Oklahoma State University	36
The Special Education Student Teachers of Oklahoma State University	40
The General Education Student Teachers of Oklahoma State University	40
Special Problems Encountered During Student Teaching	44
Item Analysis of the ATDP	48
Agricultural Education	49
Home Economics Education	50
Special Education	50
General Education	50
Comparison With National Norms	51
Hypotheses	51
Summary of the Presentation and Analysis of the Data	56
V. SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS	59
Introduction	59
Summary	59
Conclusions and Recommendations	62
Recommendations for Further Study	64
SELECTED BIBLIOGRAPHY	66
APPENDIX A - GENERAL INFORMATION QUESTIONNAIRE	68
APPENDIX B - ATDP SCALE	71
APPENDIX C - COVER LETTER TO THE GENERAL EDUCATION STUDENT TEACHERS	74
APPENDIX D - LETTER OF PERMISSION FOR THE USE OF THE ATDP	76
APPENDIX E - THE NON-ACCEPTING RESPONSES TO THE ATDP OF THE AGRICULTURAL EDUCATION STUDENT TEACHERS	78

LIST OF TABLES

Table	Page
I. Characteristics of the 150 Student Teachers	34
II. Questions and Responses of the 150 Student Teachers in Relation to Their Contact with the Physically Disabled	35
III. Characteristics of the 33 Agricultural Education Student Teachers	37
IV. Questions and Responses of the Agricultural Education Student Teachers in Relation to Their Contact with the Physically Disabled	38
V. Characteristics of the 38 Home Economics Education Student Teachers	39
VI. Questions and Responses of the Home Economics Education Student Teachers in Relation to Their Contact with the Physically Disabled	41
VII. Characteristics of the 36 Special Education Student Teachers	42
VIII. Questions and Responses of the Special Education Student Teachers in Relation to Their Contact with the Physically Disabled	43
IX. Characteristics of the 43 General Education Student Teachers	45
X. Questions and Responses of the General Education Student Teachers in Relation to Their Contact with the Physically Disabled	46
XI. Compared Mean Scores for Form-0 of the ATDP	52

CHAPTER I

INTRODUCTION

Prejudice against the handicapped is common in our society. Certain hotels, airlines, and restaurants turn away the handicapped because it might disturb the other guests who are trying to enjoy themselves. The leg amputee is no different from the obese or the two year old when it comes to running twenty feet and jumping down the escape chute of an airplane. Yet the obese and two year old are allowed preference in boarding an airplane (17).

The roots of social discrimination are found not only in the world of work, where they are denied jobs, but in the world of education. Newspapers are replete with examples of rejection as neighborhoods oppose local schools for the retarded.

James Gallager, the former Director of the Bureau of Education for the Handicapped, cited in 1969, "Money is always available for programs that society values" (21, p. 96). If funds are short, the priority becomes that of the greatest good for the greatest number or none for the handicapped.

Instead of being concerned with the problems of integration vs. segregation or about the quality of education for the handicapped, perhaps there exists a more basic problem which should be of concern to people. Maybe it is a question of whether people ". . . believe in the worth of each individual, in his right to achieve his potential, and of

our obligation to change the value system and the social order to assure that right" (15, p. 102).

The teacher is the person who spends the most time with the young after their parents. It is important then to examine what attitudes the teachers have towards the disabled. This should be of concern in terms of the social consequences the teachers' attitudes have. Rosenthal and Jacobson (1968) found that great expectations breed great achievement and vice versa. Attitudes of teachers thus appear to affect performance of students. Evidence is indirect however (10). Yet a greater understanding of the attitudes of educators toward the physically disabled may aid in the planning of future teacher education programs.

Statement of the Problem

The basic problem of this study is a need for greater objectivity in the measurement of the attitudes of student teachers (toward the disabled) in agricultural education, home economics education, special education and general education. Studies describing the attitudes of student teachers toward the physically handicapped are scarce if not non-existent. An awareness of the importance of the role of a teacher in the successful social and emotional adjustment of the physically disabled student may lead the Oklahoma State University teacher education programs to see this study as a useful guide. It will help in the planning of future programs to train teachers by providing a utilitarian inventory of the attitudes toward the disabled of selected student teachers under present programs.

Purpose of the Study

The main purpose is to identify the attitudes of agricultural education, home economics education, special education and general education student teachers toward the physically disabled. These attitudes along with other descriptive information arrived at through the study will be used to determine (1) the need for the instruction of causes, treatment, and social implications of physical disablements and (2) the need for providing personal contact with the physically disabled in college curriculums preparing students for careers in the teaching fields.

Hypotheses of the Study

The hypotheses examined in this study include:

1. There will be no significant relationship to support the fact that the mean scores of each group will place the group into the following ordinal ranking: special education > general education > home economics > agricultural education.
2. Females will not score significantly higher on the ATDP than males.
3. Urban people will not score significantly higher than those with rural backgrounds.
4. Those with more contact with the physically disabled than others will not have significantly higher scores on the ATDP.
5. Those who had the disabled in their classroom will not score significantly higher than those who did not.

6. Those who enjoy their contact with the disabled will not score significantly higher than those who do not.
7. Those who perceive their contact as being voluntary will not score significantly higher than those who do not.
8. Those with some semester hours in special education will not score significantly higher than those with none.

Procedure for the Study

To enable the writer to meet the purpose of this study, the following steps were involved:

1. An inventory of the characteristics of: (a) the student teachers as a whole, and (b) each of the four distinct groups (mentioned above) of student teachers which comprise the whole.
2. An inventory of the special problems encountered by some of the student teachers in teaching. These problems may be a factor in influencing their attitudes.
3. An informal item analysis of the ATDP for (a) the student teachers as a whole and (b) each of the four distinct groups which comprise the whole.
4. A comparison of the mean scores of (a) the student teachers as a whole and (b) each of the four distinct groups which comprise the whole, with national norms.
5. A comparison of the four groups using the mean scores and Duncan's multiple range test. There will also be a comparison of mean scores for (a) the student teachers as a whole and (b) each of the four distinct groups which comprise the whole, with regard to sex, size of original city or town, personal contact,

and other variables relating to experience with the disabled. The analysis of variance and Duncan's test will be used at the appropriate times.

Limitations

This study is limited to:

1. One University: Oklahoma State University and three colleges within this university: Agriculture, Home Economics, and Education.
2. Those student teachers completing student teaching in the spring semester of 1974.
3. Due to the size of the sample, this study may not be able to be generalized to any larger group.
4. The opinions expressed will be used as indices of attitudes.

Definition of Terms

Definitions relevant to this study were:

1. Attitude is defined as a "delimited totality of behavior with respect to something" (13, p.4).
2. Attitude Scale is defined as a set of items which fall into a particular relationship in respect to the ordering of respondents. A set of items can be said to form a scale if each person's responses to each item can be reproduced from the knowledge of his total score on the test within reasonable limits of error (13, p. 5).
3. Student teacher is defined as a college student who is working under the guidance of a certified teacher or teachers in an

approved situation.

4. Physically disabled refers to those people with heart conditions, arthritis, hypertension, mental and nervous impairments of back or spine, impairment of lower extremities, hip impairments, and visual impairments. It also includes the deaf or partly deaf, the amputee, the spastic (or cerebral palsy) and the disfigured (18).
5. Handicap signifies the social disadvantage placed upon a physically impaired person by virtue of the impairment. It is a consequence of culturally held values and attitudes which serve to define the physically impaired person socially (13, p. 5).
6. Impairment or disability is defined as a defect in tissue or body structure. As such, it has no particular functional connotations (13, p. 5).

Organization of the Report of the Study

The report of this study is organized into five chapters. Chapter I has presented the problem, objectives, limitations, definitions of relevant terms, and procedures involved. The remainder of the report is divided into four additional chapters. Chapter II will present a review of relevant literature. Chapter III will discuss the procedures and Chapter IV will present and analyze the data in the study. The final chapter will present a summary, some conclusions, and recommendations.

CHAPTER II

REVIEW OF LITERATURE

Introduction

In this chapter, a review of literature relative to attitudes toward the physically disabled has been made. The chapter begins in a general exploratory tone, but then moves on later into more selective material which hopefully brings into focus the more significant factors relative to student teachers' attitudes toward the disabled. The central purpose of this review is to build a foundation for analysis and perhaps for prediction.

Incidence

The handicapped are increasing in numbers every year. In 1970 there were 25 million people physically disabled. Twenty million required some type of service, 3.9 million had major limitations, and 5 million needed vocational rehabilitation. Over half of them live in cities. About a third live in the South (18).

Each year half a million Americans become handicapped because of birth defects, illness, and injury. Men and women over sixty-five years of age comprise the larger proportion of the handicapped. Nearly half are handicapped (18).

There were 18 million handicapped men and women of working age

(eighteen to sixty-four) in 1970. Only one percent were severely disabled. However, forty-eight percent of this 18 million were not in the labor force. Only thirty-six percent were employed full time, and even then, many were employed below their capacity (18).

Attitude

Definition of Attitude

Before investigating the variables relative to attitudes, it might be well to investigate more closely the word "attitude" and later, the word "disabled." Most of the research relating to attitudes, values, and motivation is found in the social sciences but very little has been done by educators. This is unfortunate since these areas relate so much to the social communication between minority groups and individuals per se.

Attitudes have been defined in many ways and the differences are sometimes pronounced. Shaw and Wright, however, provides the best background for this paper. They

. . . prefer to limit the theoretical construct of attitude to an affective component which is based upon cognitive processes and is an antecedent of behavior; i.e., they consider an attitude to be an evaluative reaction based upon evaluative concepts which are closely related to other cognitions and to overt behavior (14, p. 2).

This definition of attitude has the advantage of relating this construct to the attitudinal scales based upon Likert's work. This is so because Likert scales call for an evaluation of statements which are of varying intensity, i.e., either positive or negative. It is then possible to infer positive or negative evaluations on the part of the person completing the scale.

Definition of Disabled

The pattern of prejudice and stereotyping with regard to the handicapped is only a subset of a larger attitudinal pattern (15). Physical disability, mental retardation, cultural deprivation and racial minority status are all handicaps. They are not alone. There are many sub-classes of "second class citizens." The young, the long haired, and the immigrants with the funny names all share part of that prejudice directed toward the disabled.

In any case, the status of "disabled" is one that is socially imposed or at least socially reinforced as is "deviance" from the American norm. Eiseman says, "Deviance is believed to be best understood if it is conceptualized as a social labeling process: a person becomes deviant when society defines him as such, and not necessarily due to any behavior of his own" (7, p. 203). Since deviance is a concept that is socially defined, then the research pertaining to attitudes toward the disabled has implications for all scapegoated people, whether they be Jews or freethinkers (7).

Attitudes and Sex

There are some discrepancies in the studies dealing with the relationship between attitudes toward the disabled and the sex of the respondent. However, the majority of the studies point out that the females are relatively higher in their scores and thus more positive in their attitudes toward the disabled.

Various reasons have been given for the discrepancies. The reasons include:

1. the different measures used,
2. the factor of nationality,
3. the difference in samples (adults vs. younger people), and
4. different disability types used in the studies (22).

Urban Vs. Rural

Three studies are reported in the manual for the Attitudes Toward Disabled Persons (ATDP) scale examining the attitudes of those people living in urban areas compared to those in rural areas. Roeher reported, out of a sample of 300 Canadian adults, that urban residents had more favorable attitudes than those in rural areas. Bateman found similar results from a group of ninety-two sighted children who had never known blind children. Lamers came out with the only contradictory results. He used high school students and the results showed that rural students were the more positive group (22).

Attitudes and Contact or Experience

Jordan says in his studies of attitudes and their relation to contact with the handicapped that most research is inconsistent and contradictory (13). He concludes, nonetheless, that three main conclusions can be drawn:

1. Amount of contact per se is more clearly predictive of attitude intensity when the attitude object is a personal rather than a conceptual one.
2. In general, amount of contact per se is not predictive of favorable attitudes.
3. Perceived enjoyment and voluntariness of the contact are predictive of attitude favorableness (13, p. 103).

This in essence means people must enjoy their contact with the

handicapped if it is to have a good effect on changing their attitude. If a teacher feels he has not been forced to work with the handicapped, then his attitude will be that much better.

Zetterberg (1963) reviewed the contact consideration and concluded that the effects of frequent contact on liking or disliking depends on two variables: what the cost is for avoiding a particular contact and whether better alternative rewards are available. "If the costs of avoiding interaction are low, and if there are available alternative sources of reward, the more frequent the interaction, the greater the mutual liking (Zetterberg, 1963, p. 13)" (13, p. 11).

Allport reported in his studies that mutual liking depends on whether the contact is in mutual pursuit of a goal or not. Casual contacts may in fact reinforce negative attitudes. Otherwise, he found casual contact unpredictable. Attitudes may be bad according to Jacobson, Kumata, and Gullahorn if the basis of equal status between two persons is uncertain, because one does not fully accept the other (13).

In "The Effects of Contact on an Individual's Attitude Toward Disabled Persons [ATDP]," Anthony compared the attitudes of an old staff working at a camp for the handicapped with those of the new staff. The scores using the ATDP scale were taken before the camp began and after the camp had ended. He concluded that the old staff had much more positive scores than the new staff to begin with. The new staff did improve their scores after having been at the camp but still remained lower than those in the old staff. This study added

. . . considerable weight to the conclusion of Yuker et al. that contact experience which is equal-status, close, personal, and social, which takes place in an employment setting, and which is coupled with educational experience will increase ATDP scores (3, p. 170).

In summary, frequent contact with a person or a group of persons will result in a more favorable attitude if the contact is:

1. between perceived status equals pursuing the same goals,
2. perceived as beneficial to reaching a common goal,
3. is with higher status people,
4. among those of unquestionable equal status,
5. volitional, and
6. selected over other rewards (13, p. 11).

The quality of the experience a person has with the handicapped is more important than the experience itself. Fostering interactions which put the handicapped in a favorable light will help to improve attitudes according to the theory.

This paper will not delve into the quality of the contact since that could become a paper in itself. However, it is assumed that a contact perceived as enjoyable and voluntary would affect a person's attitude toward the physically disabled. Despite Jordan's beliefs to the contrary, Yuker says that, as a general rule, increased contact is related to more positive attitudes (22).

Very few people have had extensive experience with a wide variety of handicapped persons because the majority of the population are not handicapped. Furthermore, the handicapped person may be far from reassuring in the image he projects. Having no previous experience to base his judgment on, an individual may base his reaction on a stereotype of a handicapped person. Stereotype, in the context used here, means a role which a person expects an unfamiliar disabled person to fill (12, p. 1).

Attitudes and Knowledge

A study by Eiseman suggests that attitudes can be changed by giving information about authoritarianism (7). One subcategory of authoritarianism, authoritarian benevolence for example, endows amputees with special qualities but simultaneously advocates tolerance for their shortcomings. This attitude actually devalues a handicapped person and he resents it.

It was found that students who were taught about the authoritarian personality had significantly lower scores on the moral judgments scale than students who did not receive such instruction. . . .These findings have implications for the important point about changing prejudicial attitudes, since prejudice and authoritarianism often go together (7, p. 205).

Yuker found that half of the studies attributed positive attitudes to information and professional training courses, while the rest indicated no relationship. Nevertheless, it will be assumed in this study that people who are taught the dimensions of unfavorable attitudes will be affected by this knowledge, and adjust their attitude in a more positive direction.

A Brief History of Oklahoma State University

Student Teacher Attitudes

In studying the characteristics of student teachers, it is wise to note that a teaching population cannot be treated as a homogeneous group. Subgroups of teachers based on sex, subject area, and level of instruction typically demonstrate differing patterns of interpersonal relations with students (3).

Chance found, in his study of Oklahoma State University student teachers, that student teachers " . . . enrolled in the Colleges of

Agriculture and Home Economics differed from student teachers in the Colleges of Arts and Sciences and Education" (3, p. 174). It may be that certain factors influence them to enroll in the different colleges. Chance found that 94.8 percent of the student teachers enrolled in the College of Agriculture and 62 percent of those enrolled in the College of Home Economics were raised on farms. This is in contrast to 11.1 percent in the College of Education and 11.7 percent of those enrolled in the College of Arts and Sciences who were raised on farms. This rural-urban and social class value difference is what Chance emphasizes.

Attitudes of Agricultural Education Student Teachers

An investigation into the characteristics of student teachers and their attitudes toward the disabled leads many times to studies only closely related. However, it is deemed necessary and useful to consider attitudes toward the mentally retarded, dogmatism, and personality characteristics as topics closely related to attitudes toward the physically disabled. This allows some indirect but pertinent scrutiny into the history of student teacher attitudes toward the physically disabled.

In searching the literature for any attitudinal studies using Oklahoma State University agricultural education student teachers, it was discovered that there were studies relevant to providing a brief historical perspective in this area. One excellent study was done by McCarrell regarding the personalities of this group.

McCarrell found that the different Oklahoma State University agricultural education student teachers were similar in their personality

characteristics, as measured by the California Psychological Inventory, from year to year over a period of five years (1969-1973). This would further substantiate the claim that the agricultural education student teachers of 1974 would also be similar in comparison to past groups.

After examining different components of their personalities, he found the greatest elevation above the mean was found to be self-acceptance. This meant that these students were aggressive, self-centered, confident, assured, and out-spoken. However, these groups had the greatest deflection in responsibility, intellectual efficiency and capacity for status. A low score in responsibility meant the groups were impulsive, under-controlled, personally biased, spiteful and dogmatic. Low scores in intellectual efficiency meant the group was stereotyped, conventional and shallow in their thinking. Finally, a lack of capacity for status implied that the group was again stereotyped in their thinking, awkward in social situations and restricted in their outlook and interests. Furthermore, the agricultural education student teachers were low in good impression. This meant they were distant in their relationships with others and too little concerned with the needs and wants of others.

McCarrell warns us that it must:

. . . be emphasized that all of the trait scores of the student teachers are within one standard deviation of the mean line of the norm group; therefore, these adjectives must be tempered in their extremity (16, p. 42).

Yet it would appear that these student teachers are rigid in their stereotyped attitudes and have difficulty in having meaningful relationships. Their rigid values would tend to make them uncomfortable in an atmosphere of change.

The Rokeach dogmatism scale has been instrumental in comparing agricultural teachers and student teachers to selected general education student teachers. Open-mindedness was applied to the teacher having a low score while closed-mindedness referred to achievement of a high score on the dogmatism scale. Wiggins examined seventy-five agricultural education student teachers in 1968 and found their mean score on the Rokeach scale was 159.92. In 1970, Pritchard reported that thirty-two beginning agricultural education teachers of Oklahoma had a mean score of 158.56. Fifty student teachers in science education at Oklahoma State University tested by Dick (1967) had a mean score of 141.3. Finally, Brann (1967) administered the scale to 45 elementary education student teachers at Oklahoma State University and their mean score was 140.75 (2). These studies are pointed evidence that the agricultural teachers or student teachers are noticeably more closed-minded than the student teachers either in science or elementary education.

According to Pritchard, who adapted these definitions from Edward Hodnett's work, The Art of Working With People, a person who is open-minded is

. . . a person who is flexible in his approach to problems and problem situations; judgment often is suspended, assumptions are frequently tentative—one expects the unexpected, anticipates uncertainty and change (19, p. 12).

The closed-minded personality ". . . refers to a person characterized by possession of frozen concepts, beliefs and attitudes toward problems and people which are set too securely for appreciable adjustment" (19, p. 12).

In conclusion, it is assumed, for the sake of a working hypothesis,

that the general education student teachers are more positive in their attitudes toward the disabled than the agricultural student teachers who are more closed-minded.

Attitudes of Home Economics Education Student

Teachers

In July of 1970, Holman completed a study which summarized the attitudes of selected Oklahoma State University Home Economics student teachers toward the mentally retarded. This study is used here to help clarify indirectly the attitudes of this Oklahoma group in regard to the disabled.

Of the seventy students she studied, she found that half were transfer students. None of them had ever had any course work in special education. Seventy-seven percent had some contact with the retarded outside the classroom and twenty-two percent had some retarded students in their classroom during their student teaching experience. She found that, as a group, these student teachers:

1. tended to be non-authoritarian,
2. tended not to view the retarded as removed from the mainstream of society; they found segregation unsuitable,
3. were non-condemnatory in their viewpoint toward the causal factors of mental retardation,
4. were non-accepting of intimate contact,
5. were divided on their outlook of the retarded's future, and
6. were indecisive as to the significance of cultural impoverishment as a contributing factor to retardation.

Holman summarized by saying that this group of Home Economics student

teachers were more or less positive in their attitudes and had a generalized acceptance for the retarded.

In comparing home economics student teachers with those in general education, she used Efron's study. She found that unlike

. . . the teachers in the general educational fields studied by Efron, home economics student teachers tended to be non-authoritarian and were not inclined to segregate and institutionalize the retarded (11, p. 53).

Yet the two groups were alike because both desired to avoid intimate contact and both groups were undecided in ascribing cases of mental retardation to cultural impoverishment.

Special Educators Versus General Educators

In his study of educators' attitudes toward the retarded, Efron found that, except for non-condemnatory etiology and hopelessness, the teachers of the retarded always differed from the people in general education (in the favorable direction). Similarly, students in the field of retardation differed from the general education group, except for non-condemnatory etiology and personal exclusion. Furthermore, he noted that both the teachers and students in retardation scored significantly higher than the general education sample. He attributed this to the fact that the special education groups had more factual knowledge about retardation.

The finding that teachers of the retarded were the only group that differed from any of the others in their acceptance of intimate contact with the retarded is seen as a corroboration of the notion that personal contact is probably the only way of changing the more personal and less intellectual facet of attitudes (6, p. 107).

Harth (1971) found similar differences between special education students and regular education students. Special education students

were (1) more willing to decrease social distance between themselves and the retarded and (2) more positive about their private rights, i.e., free association in playgrounds, schools, housing, etc. (10).

Fine (1969) found that even though the special education major (in elementary education) was more favorable in attitude, his behavior was different. He pointed out that ". . . special class teachers place greater emphasis on personal and social adjustment than do regular class teachers . . ." (10, p. 152). Fine elaborated further on Efron's observation that teachers of the retarded are less authoritarian. Fine said this causes them to make less demands upon lower ability students to try harder. Schmidt and Nelson (1969) reported the same results in secondary schools (10).

Dunn concluded in his study that the academic achievement of the educable mentally retarded students was lower in special classes than in regular ones. The notion of teachers contributing to lower achievement gained support here (10, p. 152).

Teacher Attitudes

Conine from Indiana University completed a study in 1968 using the ATDP scale (Form 0) to examine the attitudes of teachers toward disabled persons. His study was concerned with:

1. the degrees of acceptance of the disabled by teachers, and
2. the relationship of some demographical information with their attitudes.

Four hundred and seventy-three responses were received from 985 randomly selected full-time elementary school teachers from Indianapolis.

The study yielded the following:

1. the teachers' scores approximated those of the ATDP-0 norm group,
2. the females scored higher than the males at the .01 level of confidence,
3. no differences were found at the .05 level of confidence between the mean scores of:
 - A. Caucasian and Negro teachers,
 - B. Catholic, Protestant, Jewish, other and no religion groups,
 - C. different age groups,
 - D. teachers with relationships with a disabled person as a family member, friend, student, co-worker, acquaintance, and no relationship,
 - E. those with close contact and little or no contact with the disabled,
 - F. holders of Bachelor's and graduate degrees, and
 - G. those with formal experiences pertaining to exceptional persons and those with none.

The conclusion was that teachers are not different from other individuals in accepting the disabled. "Therefore, it may be hypothesized that public attitudes may, in part, reflect attitudes learned from teachers" (5, p. 4102-A).

In 1967, Kingsley studied the attitudes of prospective teachers toward exceptional children. The student teachers he used had an adequate knowledge and understanding of the purpose of special education. They were then asked to rank the exceptional child they would most and least like to teach. The gifted were preferred over the severely

retarded. Furthermore, they felt the severely retarded should not be provided regular educational services, but should be institutionalized.

Warren and Turner (1966) suggest that the students' lack of preference for this exceptional child may be due to the fact that this area is stressed the least in university programs. The least preferred status may be a function of lack of familiarity and knowledge rather than an actual distaste for these people (10, p. 153).

Ojemann and Wilkinson, Boynton et. al., and Baruch found a relationship between the personal adjustment of teachers and the adjustment of their pupils. Baruch has demonstrated that student teachers who have been able to achieve a better understanding of themselves can accept more positively the children who behave in a deviant manner (10, p. 6). Bergan and Smith made an interesting study in 1966 and found that the higher socioeconomic retarded were regarded more favorably than the lower status retarded (10, p. 152).

Why are the attitudes of teachers important? Moral disapproval, whether on the part of teachers or prospective employers, can greatly damage the rehabilitation process. These attitudes need to be openly acknowledged before they can be dealt with. Furthermore, the type of programs a community is willing to sponsor or support is in some measure a function of the prevailing attitude and value system of its members.

The whole idea of studying a teacher's attitude toward the handicapped may be complicated by the fact that some of the handicapped really do fit a stereotype image. They sometimes seek the companionship of other disabled persons and create a subculture.

The disabled person is on the alert for slight. At the same time he expects and becomes dependent upon preferential

treatment and assistance from the non-handicapped. The acceptance of continued help carries with it an implication of inferiority (8, p. 5).

Widespread Prejudice and Historical Attitudes

How much acceptance do the handicapped really have in America?

The findings of Roper Research Associates (1969-1970) who sampled 1000 adults across the nation were disconcerting. Three case histories were shown to those interviewed. These cases included a mildly retarded young man, a blind young man, and a young man crippled by a birth defect. These were the findings:

Those favoring institutionalizing:

- 50% -- the retardate
- over 33% -- the blind man
- over 20% -- the crippled man

Those favoring sheltered employment for:

- 58% -- the retardate
- 45% -- the blind man
- 39% -- the crippled man

Those favoring working side by side with others:

- 16% -- for the retardate
- 44% -- for the blind man
- 36% -- for the crippled man

In each category, more than half of the people thought the disabled person should not be in a regular job like others (3).

The tradition has always been to disgrace or degrade the handicapped. They are stereotyped in movies (e.g., Hunchback of Notre Dame, Dr. Jeckel and Mr. Hyde, Phantom of the Opera), comic strips, and jokes.

Our approach toward the disabled incorporates many different historical attitudes which include:

1. the Greek belief that the physically impaired were inferior,
2. the pre-prophetic Hebrew idea that the sick were being punished by God,
3. the Calvinistic assumption that the absence of material success--handicaps or disabilities--is visible evidence of lack of grace,
4. the Darwinian theory of the survival of the fittest,
5. and lastly the pre-World War II faith on the progress of mankind through science (7, p. 4).

The general prejudice of the public can possibly be but one reason for the national norm of 72.8 for the male and 75.42 for the female being below the possible perfect score of 120 on the ATDP.

Background for the Study

In summarizing a survey of the literature relating to the attitudes of student teachers, one can only conclude that the psychological and social forces which contribute toward the formation of these attitudes are sundry and complex.

Besides the factors of perceived enjoyment and voluntariness, quality of the contact, cost of avoiding interaction, available sources of reward, mutual pursuit of goals, and the status of the people involved in the relationship, as previously discussed, there exist other contributory factors which must somehow fit into the total causal explanation of their attitudes. These include sex, hometown size, amount of contact, semester hours in special education, enjoyment of the contact, voluntary status of the contact, and the academic major.

Most of the literature dealing directly with teachers or student

teachers relates only indirectly. They include such diversified variables as attitudes toward the retarded, personality characteristics, and dogmatism. One study dealt specifically with teacher attitudes toward the disabled using the ATDP. But because of the relatively scarce work in this specific area with Oklahoma State student teachers, only three postulates on page 25 were based on these indirect studies.

It is speculated that forces which contribute to closed-mindedness, rigid personalities, and non-acceptance of the mentally retarded also contribute to prejudice toward the disabled. Many studies have shown that this speculation is warranted. Furthermore, the literature reveals conclusive evidence of marked differences between student teachers with different academic majors. Although it is assumed that all student teachers must obviously share similar interests and have somewhat similar aptitudes to successfully fulfill their future occupational roles, the fact remains that some are more rigid or stereotyped in their thinking than others. Other variables such as sex, hometown size, amount of contact, the enjoyment and voluntary status of the contact, and the knowledge held about the disabled and their problems have been conclusively designated as causing further attitudinal differences across academic boundaries.

Although the relationship between academic major and attitude was not examined until late in the review of literature, it will herewith be given first priority due to its importance. The following postulates provide a basis for the subsequent formulation of hypotheses. They are based on the investigations in this chapter.

Postulates

A brief overview of the literature leads the investigator to these postulates:

- (1) Agricultural student teachers are more closed-minded than general education student teachers. Therefore, they are more non-accepting of the disabled.
- (2) General education student teachers are more urban than either agricultural or home economics student teachers. Since those from urban backgrounds (postulate 5) score higher on the ATDP, the general education group will be more accepting of the disabled than either those in agriculture or home economics.
- (3) Special education student teachers are more accepting of the disabled than general education student teachers.
- (4) Females generally are more open-minded than males and have more positive attitudes toward the disabled.
- (5) Urban individuals are more positive in their attitudes toward the disabled than those from rural backgrounds.
- (6) Those individuals who have more contact than others with the disabled generally score higher on the ATDP.
- (7) Those contacts with the disabled which are considered enjoyable and voluntary are contacts of a higher quality and reflect higher scores on the ATDP.
- (8) Individuals who know more about the disabled and their problems are generally more positive in their attitudes.

Major Hypotheses of the Study

The following hypotheses were based upon the postulates:

1. The mean scores of each student teacher group will place the groups into the following ordinal ranking: special education > general education > home economics > agriculture education. This is based on postulates 1, 2, 3, 4, 5, 6, and 8. Postulates 6 and 8 show that special education student teachers are the most accepting individuals. Postulate 4 is used to point out that the home economics group will have higher scores than the agricultural group.
2. Females will score higher on the ATDP than males (postulate 4).
3. Urban individuals will score significantly higher than those with rural backgrounds (postulate 5).
4. Those with more contact than others will have higher mean scores (postulate 6).
5. Those who had the disabled in their classroom will score higher than those who did not (postulate 6).
6. Those who enjoy their contact will score higher than those who do not (postulate 7).
7. Those who perceive their contact as being voluntary will score higher than those who do not (postulate 7).
8. Those with some semester hours in special education will score higher than those with none (postulate 8).

CHAPTER III

PROCEDURES

Introduction

This chapter will describe the methodology used in attempting to achieve the objectives described in Chapter I and test the hypotheses set forth in Chapter II. An explanation of the instrument is presented first, followed by a discussion of the population in the study. Techniques used to gather and subsequently handle the data are presented last.

The Instrument

After reviewing the literature regarding the attitudes toward the handicapped, it was found that possibly three instruments pertained to the purpose of this study:

1. Disability Factor Scales (DFS) (Multidimensional) (21),
2. Semantic Differential (11), and
3. Attitude Toward Disabled Persons Scale (ATDP) (21).

The DFS measured several dimensions of disability and offered instruments for three specific disabilities: blindness, obesity, and cosmetic disfigurement. The Semantic Differential has twenty-five bi-polar word pairs. The response to each word pair had a seven point range and could be applied flexibly to different areas of disability.

The ATDP, however, was picked because it measured the general attitude of people toward the disabled as a group. It also has been used the most frequently by investigators studying the attitudes of teachers and counselors. Besides being valid and reliable, it also offered a convenient national norms table.

In addition, a one-page general information questionnaire was developed by the investigator in order to get a description of the different people completing the ATDP. Questions involving the extent of their contact and other pertinent variables were developed in order to facilitate the investigation of the hypotheses of Chapter II. This questionnaire was attached to the ATDP. (See Appendix A.)

Subjects respond to the ATDP on a 6-point scale from strongly agree to strongly disagree or +3 to -3 on a Likert type scale. Generally speaking, a person who theoretically answers with all -3's is completely prejudice or non-accepting of the disabled while someone who answers with all +3's is completely accepting of the handicapped. Persons wishing more information on the ATDP should consult the manual (21) written by Yuker, et. al. See Appendix B for form O of the ATDP.

In scoring the ATDP, the first step is to change the signs of the items with positive wording. By definition, a positive item is one which indicates that disabled persons are not "different" from non-disabled persons. Once the signs of the positive items have been changed, the algebraic sum of all the item scores is obtained. The sign of the sum is then reversed from negative to positive or positive to negative. The total scores obtained in this fashion can range from -60 to +60. To eliminate negative values a constant is then added to make all of the scores positive. This constant is 60. The resulting

score range is from 0 to 120 with a high score reflecting positive attitudes (21).

There is no absolute interpretation from the raw score obtained from the scale. However, national normative data has been provided in the manual for males and females separately. A high score on the ATDP indicates the person feels the disabled are similar to the non-disabled while a low score indicates dissimilarity.

Permission for Use of the Questionnaire

The ATDP was developed by Yuker, Block, and Young with the assistance of many people at the Human Resources Center in Albertson, Long Island, New York. In February of 1973 the writer wrote and requested permission to use the ATDP - Form O Likert Scale. Permission was granted. (See Appendix D)

Reliability

Investigations by the competent staff at Human Resources of the reliability of the ATDP - Form O have resulted in a median stability coefficient of $+0.73$ which is usually called an index of test-retest reliability. Equivalency reliability coefficients derived from the split-half method for form O range from $+0.75$ to $+0.85$. The coefficients of the parallel form reliability range from $+0.57$ to $+0.83$. Forms A and B are the parallel forms of form O. Furthermore, investigations

. . . of the fakeability, or the extent to which the respondent's test taking attitudes influenced the test results, suggests that the ATDP is relatively not fakeable since no significant differences were found between the scores of faked vs. non-faked administrations. It has also been found that neither social desirability nor acquiescence accounts for significant portions of variance in ATDP scores (21, p. 43).

Construct Validity

In general, the ATDP was found by the Human Resources people to correlate substantially with other measures of attitudes toward the disabled (21). The correlations tend to be lower, however, once the ATDP is compared with measures designed to focus on specific subdimensions of attitudes toward the disabled. Their data indicates that acceptance as measured by the ATDP correlates positively to the acceptance of people who are different from the respondent, including such people as the mentally ill, the aged, and a variety of ethnic groups. Furthermore, non-authoritarian people and people who are intellectually oriented as opposed to being pragmatically oriented are more accepting of the disabled and thus score higher on the ATDP.

There is evidence that persons with positive attitudes as indicated by the ATDP tend to have less need for aggression or expressions of hostility. Finally, those people who have positive self-concepts or who tend to be lower in anxiety generally have higher scores on the ATDP as opposed to those who have negative self-concepts or those who are anxious (22).

The Population in the Study

The study was directed toward the investigation of attitudes of future teachers in agricultural education, home economics education, special education, and general education. There were 36, 38, 33, and 265 student teachers in the agricultural education, home economics education, special education, and general education departments, respectively. The population had completed their student teaching in the

Spring semester of 1974.

Gathering Data in the Study

While it would have been ideal to administer the questionnaire in the same manner to all four groups of student teachers, this was not possible. All the student teachers except the general education students were to meet again, on campus, for short seminars after completing their student teaching. So a different method was used to survey those individuals in general education.

The following several standards were established for the administration of the questionnaire to the agricultural, home economics and special education student teachers:

1. each educational group would be administered the opinionnaire on a date when their student teaching was almost over,
2. specific instructions would be given at the time of administration,
3. no discussion of the instrument was to be allowed among the respondents during the administration,
4. the opinionnaire would be administered by the researcher.

The instrument was mailed to the general education group, since many of them would not be returning to the campus. A random sample of 66 was picked from 265 general education student teachers using a random numbers table. A stamped self-addressed envelope was enclosed for their convenience in answering. The directions were self-explanatory. A cover letter found in Appendix C was also enclosed. Forty-five were returned. Two forms were incorrectly filled out leaving forty-three for analysis. This was a 65 percent return.

Handling the Data in the Study

There were three steps involved:

1. computation of the data,
2. presentation of the data,
3. analysis of the data.

The scoring of each questionnaire was done by hand. This produced a score for each respondent. Each student's form was then coded. Males were assigned the number 1, females the number 2 and so forth. The characteristics of each student were then keypunched onto one computer card along with his score. The Statistical Analysis System (SAS) was then used for the analysis of the data. The characteristics of each group was reported by SAS and can be found in Chapter IV. A one way analysis of variance was used in determining significant differences between certain dependent variables. Duncan's theory was used to determine where the significance was in the case of three or more dependent variables.

CHAPTER IV

PRESENTATION AND ANALYSIS OF DATA

Introduction

In this chapter, the researcher will present as a preliminary step the characteristics of the population in the form of tables. Data concerned with special problems, item analysis, comparisons with national norms, analysis of variance, and Duncan's test will subsequently be presented.

Tables I and II will describe the characteristics of all the student teachers combined. Tables III through X will describe the characteristics of each of the four academic areas represented by the student teachers.

The 150 Student Teachers of Oklahoma

State University

The student teachers, as shown in Table I, were primarily female, rural (city of less than 50,000), and have had only limited experiences with the disabled. The group was split evenly as far as marital and transfer status. Twenty percent had close contact with the disabled, while 58 percent had a little and 22 percent had none.

Table II shows that those who did have contact with the disabled enjoyed it and their contact was voluntary. Only 14 percent thought

TABLE I
CHARACTERISTICS OF THE 150 STUDENT TEACHERS

	Frequency	Percent
Male	52	34.7
Female	98	65.3
Rural	114	76
Urban	36	24
Single	86	57.3
Married	64	42.7
Transfer	63	42
Non-Transfer	87	58
Agricultural Education	33	22
Home Economics Education	38	25.3
Special Education	36	24
General Education	43	28.7
Mean Age - 23.3 years		
Mean number of semester hours in special education courses - 10.4 semester hours		

TABLE II
 QUESTIONS AND RESPONSES OF THE 150 STUDENT
 TEACHERS IN RELATION TO THEIR CONTACT
 WITH THE PHYSICALLY DISABLED

Questions	Responses	Frequency	Percent
1. Was your contact enjoyable?	Did not apply (Had no Contact)	44 ¹	29.3
	Yes	100	66.7
	No	6	4
2. Was your contact voluntary?	Did not apply	44 ¹	29.3
	Yes	79	52.7
	No	27	18
3. How much time was spent in your teacher preparation program on the subject of physical disabilities?	None	65	43.3
	Little	64	42.7
	Adequate	16	10.7
	Quite a bit	5	3.3
4. Were there physically disabled students in your classroom?	Yes	68	45.33
	No	82	54.7
5. Did you have any special problems with them?	Did not apply	56 ₂	37.3
	Yes	22 ₂	14.7
	No	72 ²	48

¹There were some students who had some contact with the disabled, but indicated that this question did not apply to them. Ideally this question should not have applied to the 33 who had no contact with the disabled. Subsequent footnotes will deal with similar discrepancies.

²Some students who had no disabled students in their classroom answered with yes or no here.

the time spent in their teacher preparation program on the subject of physical disabilities was adequate or better than adequate. About half had physically disabled students in their classroom. Of these same student teachers, most had no special problems with them.

The Agricultural Education Student Teachers
of Oklahoma State University

The mean semester hours in special education for agricultural education students in Table III can be misleading. One person said he had 5 semester hours while another said he had 15 semester hours in special education. The rest had none. Almost $2/3$ of these students were transfer students. While 60.6 percent of the students only had a little contact, 15.2 percent had close contact with the disabled and 24.2 percent indicated no contact. Table IV shows that it was enjoyable and voluntary. Twelve percent thought the time spent on disabilities was adequate or better. Of the 39.4 percent who had disabled students in their classroom, none admitted to having any special problems with them.

The Home Economics Education Student Teachers
of Oklahoma State University

In home economics (Table V), two students reported they had one semester hour in special education while two more said they had three semester hours. This explains the mean figure of .21 for semester hours in special education. The group was split evenly as far as marital and transfer status. Over $3/4$ were of a rural background. Seven and nine-tenths percent indicated they had close contact with the disabled while 57.9 percent indicated a little contact. Those who had

TABLE III
 CHARACTERISTICS OF THE 33 AGRICULTURAL
 EDUCATION STUDENT TEACHERS

	Frequency	Percent
Male	33	100.0
Female	0	0.0
Rural	33	100.0
Urban	0	0.0
Single	11	33.3
Married	22	66.7
Transfer	23	69.7
Non-Transfer	10	30.3
Mean Age - 22.5 years		
Mean number of semester hours in special education courses - .45 semester hours.		

TABLE IV
 QUESTIONS AND RESPONSES OF THE AGRICULTURAL
 EDUCATION STUDENT TEACHERS IN RELATION
 TO THEIR CONTACT WITH THE
 PHYSICALLY DISABLED

Questions	Responses	Frequency	Percent
1. Was your contact enjoyable?	Did not apply (Had no contact)	13 ¹	39.4
	Yes	18	54.5
	No	2	6.0
2. Was your contact voluntary?	Did not apply	13 ¹	39.4
	Yes	15	45.5
	No	5	15.2
3. How much time was spent in your teacher preparation program on the subject of physical disabilities?	None	17	51.5
	Little	12	36.4
	Adequate	3	9.0
	Quite a bit	1	3.0
4. Were there physically disabled students in your classroom?	Yes	13	39.4
	No	20	60.6
5. Did you have any special problems with them?	Did not apply	15	45.5
	Yes	0	0
	No	18 ²	54.5

¹Some students who had contact indicated that this question did not apply to them.

²Some students who had no disabled students in their classroom answered with yes or no here.

TABLE V
 CHARACTERISTICS OF THE 38 HOME ECONOMICS
 EDUCATION STUDENT TEACHERS

	Frequency	Percent
Male	0	0.0
Female	38	100.0
Rural	29	76.3
Urban	9	23.7
Single	22	57.9
Married	16	42.1
Transfer	18	47.4
Non-Transfer	20	52.6
Mean Age - 21.9 years		
Mean number of semester hours in special education courses - .21 semester hours		

contact thought it was enjoyable and voluntary (Table VI) for the most part. Thirty-four and two-tenths percent had no contact. All the students agreed that little or no time was spent in their program on disabilities. Of 31.6 percent who had disabled students, most indicated having no special problems with them.

The Special Education Student Teachers
of Oklahoma State University

The special education group had the highest mean as far as semester hours in special education. The mean figure given for semester hours in Table VII was distributed relatively evenly among all the students. As far as marital status, the group was split evenly. Over 3/4 were non-transfers. Most were rural, only one student reported no contact with the physically disabled. The rest were split almost evenly between close and little contact. They unanimously agreed as shown in Table VIII that their contact was enjoyable and primarily voluntary. Surprisingly, 63.9 percent thought that only a little time had been spent on disabilities. Twenty-five percent thought it adequate while 11.1 percent thought it was quite a bit. Of the 72.2 percent who had disabled students in their classroom, most seemed to have no special problems, although 42 percent of those who responded with "yes" or "no" to question 12 did have special problems.

The General Education Student Teachers
of Oklahoma State University

It should be remembered that the general education group was unique because the questionnaire was mailed to them while the other groups

TABLE VI
 QUESTIONS AND RESPONSES OF THE HOME ECONOMICS
 EDUCATION STUDENT TEACHERS IN RELATION
 TO THEIR CONTACT WITH THE
 PHYSICALLY DISABLED

Questions	Responses	Frequency	Percent
1. Was your contact enjoyable?	Did not apply (Had no contact)	17 ¹	44.7
	Yes	18	47.4
	No	3	7.9
2. Was your contact voluntary?	Did not apply	17 ¹	44.7
	Yes	14	36.8
	No	7	18.4
3. How much time was spent in your teacher preparation program on the subject of physical disabilities?	None	23	60.5
	Little	15	39.5
	Adequate	0	0
	Quite a bit	0	0
4. Were there physically disabled students in your classroom?	Yes	12	31.6
	No	26	68.4
5. Did you have any special problems with them?	Did not apply	10 ²	26.3
	Yes	4 ²	10.5
	No	24 ²	63.2

¹Some students who had contact felt this question did not apply to them.

²Some students who had no disabled students in their classroom answered with yes or no here.

TABLE VII
 CHARACTERISTICS OF THE 36 SPECIAL
 EDUCATION STUDENT TEACHERS

	Frequency	Percent
Male	0	0.0
Female	36	100.0
Rural	23	63.9
Urban	13	36.1
Single	20	55.6
Married	16	44.4
Transfer	8	22.2
Non-Transfer	28	77.8
Mean Age - 21.9 years		
Mean number of semester hours in special education courses - 42.6 semester hours		

TABLE VIII
 QUESTIONS AND RESPONSES OF THE SPECIAL EDUCATION
 STUDENT TEACHERS IN RELATION TO THEIR CONTACT
 WITH THE PHYSICALLY DISABLED

Questions	Responses	Frequency	Percent
1. Was your contact enjoyable?	Did not apply (Had no contact)	2 ¹	5.6
	Yes	34	94.4
	No	0	0
2. Was your contact voluntary?	Did not apply	2 ¹	5.6
	Yes	27	75
	No	7	19
3. How much time was spent in your teacher preparation program on the subject of physical disabilities?	None	0	0
	Little	23	63.9
	Adequate	9	25
	Quite a bit	4	11.1
4. Were there physically disabled students in your classroom?	Yes	26	72.2
	No	10	27.8
5. Did you have any special problems with them?	Did not apply	5 ²	13.9
	Yes	13 ²	36.1
	No	18 ²	50

¹Some students who had contact felt this question did not apply to them.

²Some students who had no disabled students in their classroom answered with yes or no here.

were administered the instrument under the researcher's supervision. The random sample of 65 was only 24.5 percent of the 265 possible general education student teachers. Of the 65, only 43 or 65 percent filled it out correctly and mailed it back. The mean number of semester hours in Table IX was not distributed evenly among the students. One person had one semester hour of special education. One had two semester hours and two had three semester hours. This particular group of students was split evenly on sex but over $3/4$ were single. Two thirds were non-transfers and two thirds were rural. Fourteen percent had close contact while 60 percent had a little. The rest had none. Their contacts were enjoyable and voluntary. Most agreed that little or no time was spent in their education programs preparing to cope with disabilities. Thirty-nine and five-tenths percent had the disabled in their classroom while most had no problems with them.

Special Problems Encountered During Student Teaching

The researcher prefaces this section with the warning that only 68 percent of all the student teachers had physically disabled students in their classrooms during their student teaching experience. Of these, approximately $3/4$ said they had no special problems with these same disabled students. Therefore the problems stated here pertain to only a small portion of the student teachers.

Beginning at an arbitrary point for discussion, one social studies teacher said she moved one student closer to the front because of a sight problem. Special lecture notes which had larger print were prepared for the student. Another girl's parents would not allow her to

TABLE IX
 CHARACTERISTICS OF THE 43 GENERAL
 EDUCATION STUDENT TEACHERS

	Frequency	Percent
Male	19	44.2
Female	24	55.8
Rural	29	67.4
Urban	14	32.6
Single	33	76.7
Married	10	23.2
Transfer	14	32.6
Non-Transfer	29	67.4
Mean Age - 22.9 years		
Mean number of semester hours in special education courses - .21 semester hours		

TABLE X
 QUESTIONS AND RESPONSES OF THE GENERAL EDUCATION
 STUDENT TEACHERS IN RELATION TO THEIR CONTACT
 WITH THE PHYSICALLY DISABLED

Questions	Responses	Frequency	Percent
1. Was your contact enjoyable?	Did not apply (Had no contact)	12 ¹	27.9
	Yes	30	69.8
	No	1	2.3
2. Was your contact voluntary?	Did not apply	12 ¹	27.9
	Yes	23	53.5
	No	8	18.6
3. How much time was spent in your teacher preparation program on the subject of physical disabilities?	None	25	58.1
	Little	14	32.6
	Adequate	4	9.3
	Quite a bit	0	0
4. Were there physically disabled students in your classroom?	Yes	17	39.5
	No	26	60.5
5. Did you have any special problems with them?	Did not apply	26	60.5
	Yes	5	11.6
	No	12	27.9

¹Some students who had contact felt this question did not apply to them.

participate in any physical activity according to a Health, Physical Education, and Recreation (HPER) student teacher. A young female library science student teacher had to cope with a hyperactive child who distracted the rest of the children. Time had to be used to ask the child to sit down, and when attention was called to the child, the other children would be cruel and make snide remarks.

Another social studies student teacher had a girl who was retarded and could barely think for herself. She was merely being passed through school. The student teacher had no idea why she was kept in school because she did not seem to accomplish anything.

A first grader with muscular dystrophy was one of the pupils of a library science student teacher. The boy would talk outloud in class and would cry when he didn't get his way. He tended to follow in line with the misbehavior of the other children.

In home economics, one girl had trouble with the sewing machine-- she couldn't stitch evenly because she would become tense and jerk so the student teacher sometimes had to stitch part of the garment for her.

One home economics student teacher simply said her special problem was finding enough time to devote to the individual. Another said her disabled students were slow to learn and comprehend and thus slowed the class down. One girl had cerebral palsy in another class and required extra help, but the student teacher indicated that she couldn't receive it in the classroom.

One class took a field trip which seemed to be going rather slow according to the special education student teacher. Yet the child with cerebral palsy still missed a lot because the trip went relatively fast from her own viewpoint.

Some had to have their medications at certain hours. Others wanted extra attention, while others worked at a slower rate. One had an emotional problem. The pupils with a hypertensive problem or who were partially deaf would not pay attention to the teacher.

Several students in one class were reported to have heart murmurs. The student teacher felt that these students were more irrational in their behavior, since they always started each day with arguments and fights.

A special education student wrote, "Some of them had so little coordination and little speech because of hearing problems that it was hard to integrate the students' activities with the rest of the class." Most of the problems required a one-to-one teaching and helping relationship.

Item Analysis of the ATDP

Although Yuker warns in the ATDP handbook that responses to single items should not be interpreted, the researcher felt some type of informal analysis would be valuable. The SAS was programmed to do the following for each of the twenty questions on the ATDP:

1. tabulate all the negative responses, i.e., -3, -2, and -1 as being on the negative side,
2. tabulate all positive responses, i.e., +3, +2, and +1 as being on the positive side,
3. report what percentage fell on the negative side and what percentage fell on the positive side for each question.

This procedure was done for all 150 student teachers and then tabulated for each of the four groups. Depending on the question, a positive

response could be either non-accepting or accepting. Primarily those questions where over 50 percent responded on the non-acceptance side will be discussed. Non-acceptance means the respondent answered the question in a manner which implies the disabled are "different."

As a group, 84.7 percent of all the student teachers disagreed that there shouldn't be special schools for disabled children. Fifty-four and seven-tenths percent of the 150 student teachers disagreed that severely disabled people are no harder to get along with than those with minor disabilities. All other questions were answered on the "accepting" side above the 50 percent mark.

Agricultural Education

The agricultural education student teachers were the most non-accepting group. Over 50 percent of the students answered on the non-accepting side in 8 out of 20 questions. The questions were 3, 4, 6, 9, 10, 12, 15, and 19. The exact percentages can be found in Appendix E. The student teachers were in effect agreeing with the following statements:

1. Disabled people are harder to get along with.
2. Most of them feel sorry for themselves.
3. There should be special schools for disabled children.
4. Most disabled people worry a great deal.
5. They should not be expected to meet the same standards set up for the non-disabled.
6. The severely disabled are harder to get along with than those with minor disabilities.
7. They tend to keep to themselves.

8. You have to be careful of what you say when you are with them.

Question 6 of the ATDP had the strongest non-accepting response with 84.8 percent disagreeing that there shouldn't be special schools for disabled children.

Home Economics Education

The home economics group was non-accepting in 3 areas (questions 3, 6, 12):

1. 52.6 percent agreed that disabled people are usually easier to get along with than other people.
2. 89.5 percent disagreed that there shouldn't be special schools for disabled children.
3. 60.5 percent disagreed that the severely disabled are no harder to get along with than those with minor disabilities.

The group was split 50-50 in deciding whether you have to be careful of what you say when you are with disabled people.

Special Education

The special education group was the most accepting group. They were non-accepting in only question 6: 77.8 percent disagreed that there shouldn't be special schools for disabled children. Amazingly, 100 percent of these student teachers did not agree with question 14 which says that you should not expect too much from disabled people.

General Education

In general education, 86 percent disagreed (question 6) that there shouldn't be special schools for disabled children. Fifty-one and two-

tenths percent agreed (question 10) that the disabled should not be expected to meet the same standards as the non-disabled. Fifty-one and two-tenths percent disagreed (question 12) that the severely disabled are no harder to get along with than those with minor disabilities. On the other hand, 93 percent disagreed (question 17) that a disabled person cannot lead a normal life and 97.7 percent disagreed (question 14) when asked if they should not expect too much from disabled people.

Comparison With National Norms

Table XI compares the mean scores of each group with those mean scores used as national norms. The national norms were derived from subjects tested by the Human Resources people combined with norms sent to them by other users of the ATDP. The norms were accepted only if the studies provided separate means, standard deviations, and sample sizes for males and females.

Consistent with the results Conine got in 1968, the student teachers came very close to the national norms developed by Yuker. The females in the general education group were the highest and the farthest (in a positive direction) from the national norm for females. Note that the lowest score was attained by the agricultural education group.

Hypotheses

The review of literature provided a foundation from which postulates could be formulated and subsequently used to generate hypotheses. The following hypothesis are based on those postulates. SAS provided the means to test each hypotheses and the results are reported here. In all cases, an analysis of variance was performed. The Duncan test

TABLE XI
COMPARED MEAN SCORES FOR FORM-O OF THE ATDP

Sex	National Norms	Total 150 Students	Agricultural Education	Home Ec. Education	Special Education	General Education
M.	72.8	71.4	69.21	0	0	75.2
F.	75.42	79.84	0	76.1	80.7	84.46

was performed in those instances where it was relevant.

I. Hypothesis

There will be no significant relationship to support the fact that the mean scores of each group will place the group into the following ordinal ranking: special education > general education > home economics > agriculture education.

Results

The analysis of variance (AOV) gave results of significance at the .005 level. Duncan's test showed at the .05 level of significance that the agricultural education student teachers had significantly lower scores than any of the other groups. The other groups did not show any difference among themselves at the .05 level.

Disposition of Hypothesis

Null: Rejected for the agricultural education student teachers.

Accepted for all other groups.

The mean scores for all four groups were these:

Special Education	80.7	Home Economics Education	76.1
General Education	80.4	Agricultural Education	69.21

Even though the agricultural education is the only group significantly different, notice that the prediction of ordinal ranking did come true.

II. Hypothesis

Females will not score significantly higher on the ATDP than males.

Results

A probability of less than .001 was found to be associated with

the rejection of the null.

Disposition of Hypothesis

Null: Rejected

III. Hypothesis

Urban people will not score significantly higher than those with rural backgrounds.

Results

An F ratio with an associated probability of more than .05 was found to exist.

Disposition of Hypothesis

Null: Not rejected

IV. Hypothesis

Those with more contact with the physically disabled than others will not have significantly higher scores on the ATDP.

Results

AOV rejected the null at the .001 level. Duncan's test showed the only significant difference at the .05 level was between those who had close contact versus those who had little or no contact. For those who only had a little contact, there was no significant difference between themselves and those who had no contact.

Disposition of Hypothesis

Null: Rejected for those with close contact. Accepted both for those with little or no contact.

V. Hypothesis

Those who had the disabled in their classroom will not score significantly higher than those who did not.

Results

AOV accepted the null hypothesis at the .05 level.

Disposition of Hypothesis

Null: Accepted

VI. Hypothesis

Those who enjoy their contact with the disabled will not score significantly higher than those who did not.

Results

AOV rejected the null at the .01 level. Duncan's test showed the only significant difference at the .05 level was between those who enjoyed their contact versus those who did not or for whom the question did not apply. There was no significant difference between those who did not enjoy their contact and those who felt the question did not apply.

Disposition of Hypothesis

Null: Rejected for those who enjoyed their contact. Accepted both for those who did not enjoy their contact and for those for whom the question did not apply.

VII. Hypothesis

Those who perceive their contact as being voluntary will not score significantly higher than those who do not.

Results

AOV rejected the null at .001 level. Duncan's test showed the only significant difference at the .05 level was between those who had voluntary contact versus those who had involuntary contact or for whom the question did not apply. For those for whom the question did not apply, there was no significant difference

between themselves and those who had involuntary contact.

Disposition of Hypothesis

Null: Rejected for those with voluntary contact. Accepted both for those with involuntary contact and for those for whom the question did not apply.

VIII. Hypothesis

Those with some semester hours in special education will not score significantly higher than those with none.

Results

The null was rejected at the .05 level.

Disposition of Hypothesis

Null: Rejected

Summary of the Presentation and

Analysis of the Data

The attitudes of the student teachers seemed to be similar to those attitudes which the nation has. This was seen from the mean scores which did not differ extremely from national norms.

As a group, the student teachers consistently disagreed that there shouldn't be special schools for disabled children. "Disagreed" here means more than 50 percent of the students fell on the non-accepting side of the Likert scale. All the groups, except the special education group, disagreed with the statement that "severely disabled people are no harder to get along with than those with minor disabilities." The agricultural education student teachers along with the home economics student teachers agreed (each at a level above the 50 percent mark) that disabled people are usually easier to get along with than other

people. The general education group thought that disabled people should not be expected to meet the same standards as the non-disabled persons.

The agricultural education student teachers scored significantly lower than the other groups. This would tend to indicate that they had attitudes that were less accepting than the attitudes of the other groups. Looking at the numbers themselves without regard for significance, the special education group scored the highest, the general education group the next highest, and the home economics group was third highest. Chance felt the general education group would beat the home economics students because the general educators are more urban and liberal. The general education students were 32.6 percent urban while the home economics student teachers reported that 23.7 percent were urban. This may have been one of the more important factors in comparing these two groups.

As a result of the tests of analysis of variance and Duncan's tests, many interesting results were seen. The females consistently scored significantly higher. Contact or experiences with the disabled was an important factor. Students with close contact were more accepting than those with either little contact or no contact. If their contact was enjoyable and/or voluntary then the student teacher was more accepting than those who felt the question did not apply to them or who did not enjoy the contact or who had involuntary contact. Students with some semester hours of special education scored higher than those with none. The individuals with urban backgrounds were not significantly different than those with rural backgrounds. Those students who experienced the physically disabled in their classroom were not

different than those who had no physically disabled students in their classroom.

While these results, which were generated by the ATDP and the SAS, might have been subject to rationalization and deception on the part of the students, as well as tending to be temporary and changeable in the first year of teaching, the information arrived at in this study was an indication of the attitudes held by the 150 subjects in the population at that time and at that phase of their educational development.

CHAPTER V

SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS

Introduction

The knowledge teachers have concerning exceptional students has an important effect on both the social and emotional adjustment of the students. This is true both in terms of the teacher-student interaction and the student-student relationship. The teacher needs this insight or knowledge to know the problems of disabled students in order to plan and to interpret what is going on in the classroom. Providing a setting where student teachers can come to grips with their own needs, conflicts, and attitudes requires careful consideration. Hopefully, this research project was one step in the answer to this call.

Summary

to study interest population

Dominated by a desire to have a body of knowledge on the attitudes of future teachers which could be utilized by the teacher education programs of Oklahoma State University, the study was directed toward the identification of the attitudes of agricultural education, home economics education, special education, and general education student teachers. A total of 150 student teachers at Oklahoma State University was the population.

Through the use of the Attitude Toward Disabled Persons (ATDP)

scale and a general information questionnaire, information on the attitudes of the student teachers was secured in 5 main areas:

1. Characteristics of the student teachers
 - a. In general
 - b. Of each of the four groups taken one at a time.
2. A summary of special problems encountered by the student teachers--which could be one factor in forming their attitudes.
3. An informal item analysis of the ATDP for all the student teachers and then by group.
4. Comparison of the mean scores with national norms, first for the whole population--then by group.
5. An analysis of some hypotheses generated by the review of literature.

Findings
The following is a brief summary of the findings presented in Chapter IV, in each of the five areas of concern. A more thorough presentation is in Chapter IV.

1. As a group, they were primarily female, rural, and had only limited experience with the disabled. The special education group had the most semester hours in special education.

Only 14 percent thought the time spent in their teacher education program on the subject of disabilities was adequate or better than adequate. About half had disabled students in their classroom, but most had no special problems with them.

2. The special problems of the student teachers with the disabled were varied. Most disabled students needed extra help and guidance on a one-to-one basis according to the student

teachers. Most student teachers felt they had too little time to devote to the disabled students.

3. The informal item analysis showed that all student teachers disagreed ("disagree" means more than 50 percent fell on the disagree side of the Likert scale) that there shouldn't be special schools for disabled children. All the groups, except the special education group, disagreed with the statement that severely disabled people are no harder to get along with than those with minor disabilities.
4. The comparisons of the mean scores showed that the student teachers of Oklahoma State University seemed to reflect the attitudes of the nation. The women of the general education group had the highest mean score: 9.04 points above the national norm for females.
5. The special education group scored the highest in their acceptance of the disabled. The following groups scored significantly higher: females, those with close contact or close experience with the disabled, those who enjoyed that contact, those who had voluntary contact with the disabled, and those with some special education courses. The students with urban backgrounds were not significantly different at the .05 level in their attitudes than those with rural backgrounds. Those with the disabled in their classroom were not significantly different at the .05 level than those who did not have the disabled in their classroom.

Conclusions and Recommendations

The tone with which the student teachers reported their special problems seemed to be one of desperation based on the data in Chapter IV. They felt that the disabled slowed the class down and caused a lot of disturbance. Most felt the problems were beyond their reach. There was the retarded girl who had been passed on by the other teachers and now could not function properly at the designated level given to her. Others needed special attention and obviously were not getting it because they were misbehaving or had already withdrawn into themselves. The student teachers seemed to be confused about what to do and rightfully so. Some felt that there simply was no time for the extra guidance and attention needed by the students. As one student said, it was hard to integrate the partially deaf and the students with lesser coordination into the activities of the others. These special problems the student teachers faced seem to reflect the reality shock other studies have talked about.

Questions 6 and 12 of the ATDP were unique for two reasons. First, they were two out of five items with positive wording. By definition, a positive item is one which indicates that disabled persons are not "different" from non-disabled persons. Secondly, as a general rule, the student teachers disagreed with these two questions. The questions were:

1. There shouldn't be special schools for disabled children, and
2. Severely disabled people are no harder to get along with than those with minor disabilities.

Further research is needed to determine whether the wording had any

effect on the responses of the student teachers in this area.

Nevertheless, it is recommended that these two areas be discussed with the student teachers. Kingsley's study, discussed in Chapter II, comes to mind here because his study showed that student teachers felt the severely retarded should be institutionalized. It seems that the Oklahoma State student teachers did not wish to deny the disabled children special schools or to deny the more severely disabled people from having more difficulty relating to people. Yet these are the very ideas which perpetuate prejudice and which stigmatize the disabled as being "different." It is important that the student teachers evaluate their thinking in these two areas.

The similarity between the mean scores of the student teachers with those generated for national norms was not expected. The expectation was that they would be more conservative and thus lower in mean scores being in one of the more conservative and rural states. This was obviously an unrealistic expectation and one which was probably adolescent. Hopefully, though, the teacher education programs can now attempt to improve the attitudes of the students so that they surpass national norms. Some methods for improving attitudes suggest themselves in looking at the hypotheses tested in Chapter IV.

One weakness in the programs is that almost no time is spent on the subject of physical disabilities. Many studies, including this, have shown that students who know more about the subject of physical disabilities and the problems that disabled people face, are more positive in their attitudes. This and other studies also agree that contact with the disabled will improve attitudes. These facts should be seriously considered by the teacher educators of Oklahoma State

University. If the disabled person is to achieve success within the regular school program, some effort must be made to alter the negative aspects of attitudes which student teachers have.

Efron and Holman indicated two methods for improving attitudes of educators toward the mentally retarded. Not surprisingly, their suggestions also ring true for attitudes toward the disabled once the word "disabled" is substituted for the word "retarded." After this word substitution has been completed, Efron (1967), Holman (1970), and this researcher indicate that (1) instruction in the causes, treatment, and social implications of physical disabilities and (2) opportunities for personal contact with the disabled should be part of the curriculum in all colleges preparing students for careers in health, social service, and teaching.

Recommendations for Further Study

Studies need to continue to investigate the attitudes of a greater number of student teachers at diversified universities with varying programs of teacher preparation. This would allow researchers the opportunity to compare programs relative to student teacher attitudes. Follow-up studies on the population in this study and future studies might be made to determine attitudes of the teachers after a year of experience. Further investigations could be made to determine the attitudes of established and experienced teachers within school systems to see if their attitudes are more positive than those of the student teachers.

The review of literature provides a wealth of ideas useful for ambitious researchers. In regard to status (Jacobson, et al. and

Bergan, et al.), a study could examine the status of the disabled students in relation to the attitudes of the student teacher. Methods of examining the goals of the disabled along with the goals of the student teacher could be developed, which would help in examining whether Allport's theory of mutual liking breeds more positive attitudes.

In effect, the research provides numerous avenues for pursuing the complexities of student teacher attitudes and the subtle components of their attitudes. Such components may include teaching them the authoritarian personality (Eiseman), testing the achievement of the retarded in special classes as opposed to their achievement in regular classes (Fine and Dunn), whether the student teachers' personal adjustment affects their attitudes (Ojemann) and whether better alternative rewards (Zetterberg) exist other than an impending relationship with a disabled person.

The use of four groups of student teachers in this study was an attempt to broaden the narrow base of populations previously used in attitudinal studies of Oklahoma State University student teachers. Although only simplistic variables, such as sex, amount of contact, and hometown size were examined, this study does provide a base upon which to investigate the more complex factors summarized at the end of the review of literature. Possibilities for researching further in other directions relative to student teacher attitudes seem unlimited.

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APPENDIX A

GENERAL INFORMATION QUESTIONNAIRE

The following information is completely confidential and anonymous. DO NOT sign your name. This simply gives us a description of the different people completing the questionnaire. Please answer all the questions.

1. Age: _____
2. Are you? Single _____ Married _____
3. Sex: Male _____ Female _____
4. Years of college completed at Oklahoma State University: _____
5. I consider myself coming from:
 - a rural background (less than 50,000) _____
 - an urban background (50,000 or more) _____
6. In what subject area did you complete your student teaching in?

7. How many semester hours in Special Education courses have you had?
none _____ number of hours _____
8. To what extent have you come in contact with the physically disabled?
close contact _____ only a little contact _____
no contact _____
9. In general, has your contact or experience with the physically disabled been satisfactory or enjoyable?
yes _____ no _____
10. Has your contact or experience been voluntary?
yes _____ no _____
11. How much time was spent in your teacher preparation program on the subject of physical disabilities?
none _____ little _____ adequate _____
12. Were there any physically disabled students in your classroom during your student teaching?
yes _____ no _____

13. Did you have any special problems with them?

yes _____ no _____

Please explain.

APPENDIX B

ATDP SCALE

Given below are 20 statements of opinion about physically disabled persons. Physically disabled, as used here, refers to those people with heart conditions, arthritis, hypertension, mental and nervous impairments of back or spine, impairment of lower extremities, hip impairments, and visual impairments. It also includes the deaf or partly deaf, the amputee, the spastic (or cerebral palsy) and the disfigured. We all think differently about disabled persons. Here you may express how you think by choosing one of the 6 possible answers for each statement. Mark each statement in the left margin according to how much you agree or disagree with it. Please mark every one. Write +1, +2, +3 or -1, -2, -3: depending on how you feel in each case.

+3: I AGREE VERY MUCH
 +2: I AGREE PRETTY MUCH
 +1: I AGREE A LITTLE

-1: I DISAGREE A LITTLE
 -2: I DISAGREE PRETTY MUCH
 -3: I DISAGREE VERY MUCH

-
- _____ 1. Parents of disabled children should be less strict than other parents.
 - _____ 2. Physically disabled persons are just as intelligent as non-disabled ones.
 - _____ 3. Disabled people are usually easier to get along with than other people.
 - _____ 4. Most disabled people feel sorry for themselves.
 - _____ 5. Disabled people are the same as anyone else.
 - _____ 6. There shouldn't be special schools for disabled children.
 - _____ 7. It would be best for disabled persons to live and work in special communities.
 - _____ 8. It is up to the government to take care of disabled persons.
 - _____ 9. Most disabled people worry a great deal.
 - _____ 10. Disabled people should not be expected to meet the same standards as non-disabled people.
 - _____ 11. Disabled people are as happy as non-disabled ones.
 - _____ 12. Severely disabled people are no harder to get along with than those with minor disabilities.
 - _____ 13. It is almost impossible for a disabled person to lead a normal life.
 - _____ 14. You should not expect too much from disabled people.

- 15. Disabled people tend to keep to themselves much of the time.
- 16. Disabled people are more easily upset than non-disabled people.
- 17. Disabled persons cannot have a normal social life.
- 18. Most disabled people feel that they are not as good as other people.
- 19. You have to be careful of what you say when you are with disabled people.
- 20. Disabled people are often grouchy.

APPENDIX C

COVER LETTER TO THE GENERAL EDUCATION

STUDENT TEACHERS

Richard I. Maynard
Stout Hall 227
Stillwater, OK 74074
(405) 377-3748

Dear Student Teacher,

I am working on a Master's thesis to study the attitudes of student teachers toward the physically handicapped. Your help in this matter is very important. I would appreciate it if you would complete the attached instrument. The directions are at the top. I have enclosed a stamped self-addressed envelop for your convenience in returning the form to me.

Please send it as soon as you can, so that I may tabulate your answers into a table for my thesis. Your answers will be anonymous.

Thank you,

A handwritten signature in cursive script that reads "Richard I. Maynard". The signature is written in dark ink and has a long, sweeping horizontal line extending to the right from the end of the name.

Richard Maynard

APPENDIX D

LETTER OF PERMISSION FOR THE USE OF THE ATDP

Human Resources Center

ALBERTSON, LONG ISLAND, N.Y. 11507 / 516 747-5400

February 22, 1974

Mr. Richard Maynard
Oklahoma State University
Stout Hall, Room 227
Stillwater, Okla. 74074

Dear Mr. Maynard:

In answer to your letter of February 18th, we are happy to give you permission to use the Attitudes Toward Disabled Persons Scale for your thesis.

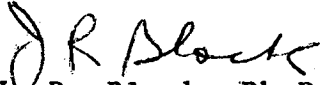
You will have to reproduce the forms as we do not have the equipment to do so here.

We would appreciate your keeping us informed of any results that you may obtain.

Dr. Harold Yuker or myself can be reached by phone or mail at Hofstra University, Hempstead, N.Y. if you should have any questions.

Good luck!

Sincerely yours,


J. R. Block, Ph.D
Chairman
Psychology Department
Hofstra University
Hempstead, N.Y. 11550

APPENDIX E

THE NON-ACCEPTING RESPONSES TO THE ATDP
OF THE AGRICULTURAL EDUCATION
STUDENT TEACHERS

THE NON-ACCEPTING RESPONSES TO THE ATDP
OF THE AGRICULTURAL EDUCATION
STUDENT TEACHERS

		Accepting	Non-Accepting
Question 3	Frequency	12	21
	Percent	36.4	63.6
Question 4	Frequency	15	18
	Percent	45.5	54.5
Question 6	Frequency	5	28
	Percent	15.2	84.8
Question 9	Frequency	16	17
	Percent	48.4	51.5
Question 10	Frequency	15	18
	Percent	45.5	54.5
Question 12	Frequency	13	20
	Percent	39.4	60.6
Question 15	Frequency	15	18
	Percent	45.5	54.5
Question 19	Frequency	12	21
	Percent	36.4	64

VITA 2

Richard Imri Maynard

Candidate for the Degree of

Master of Science

Thesis: THE ATTITUDES OF SELECTED STUDENT TEACHERS AT OKLAHOMA STATE UNIVERSITY TOWARD THE PHYSICALLY DISABLED

Major Field: Vocational-Technical and Career Education

Biographical:

Personal Data: Born in Flagstaff, Arizona, November 13, 1951, the son of Mrs. Refugio Maynard.

Education: Graduated from Regina Cleri Seminary, Tucson, Arizona in May, 1969; attended the Pontifical College Josephinum, Worthington, Ohio, in the school year 1969-1970; received the Associate of Arts degree from Arizona Western College, Yuma, Arizona in May, 1971; received the Bachelor of Arts degree in Secondary Math Education from Arizona State University, Tempe, Arizona, in December, 1972; completed requirements for the Master of Science degree in Vocational-Technical and Career Education at Oklahoma State University in Stillwater, Oklahoma in July, 1974.

Professional Experience: Student teacher of math at South Mountain High School, Phoenix, Arizona, 1973; administrative internship at the State Department of Vocational-Technical Education under Dr. William Stevenson, Assistant State Director and Head of the Division of Research, Planning, and Evaluation, Stillwater, Oklahoma, 1974.