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EDUCATIONAL CONCEPTS WHICH HOME ECONOMICS
TEACHERS IN NORTH CAROLINA ACCEPT
AND BELIEVE THEY APPLY

by

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H. M. G.

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CHAPTER I

INTRODUCTION

Home economics educators have given much thought to the problems of what and how to teach, how to evaluate results and the place of home economics in the total school program. They have recommended changes in methods of teaching and in evaluation which should parallel the changing trends in the home economics curriculum.

Social and economic conditions have changed at an accelerated rate; yet, during this period of rapid change, classroom practices have lagged far behind the beliefs of leaders in the field of education. "Thinking" has pushed ahead of "practice." The closing of this gap depends heavily on pre-service and in-service education.

Study of the above problem led a group of home economics educators to express this view:

This lag is probably not a result of rejection of the theories or beliefs by students of education; it is, rather, a result of incomplete or partial understanding and of honest inability to put into practice what professors have tried to teach. Undoubtedly there are many educational theories which home economics teachers would like to apply more consistently or with greater success.¹

Bayles delineated the function of theory as the provision of a sense of direction. He expressed the following relation between theory and practice:

¹Hildegard Johnson, Louise Lowe, Rebecca Smith, and Vergie Lee Stringer, "Our Educational Beliefs," Journal of Home Economics, 53 (March, 1961), p. 175.

Theory and practice should join hands and work together. Successful practice is the measure of good theory, and consistently successful practice is hardly possible unless it is based on theory. Theory is no better than the practice which it implies, and practice is no better than the theory upon which it is based.²

Statements of the concepts which are basic to the achievement of educational objectives are made by such a large number of educators and have such varying implications in the differing areas of study that it is important to identify those which are most important in a field such as home economics. One effort that has been made recently to identify currently accepted concepts was a study initiated last year at Woman's College by members of the home economics education staff. This project was financed by the Woman's College Research Council. The purpose was to determine which educational beliefs authorities in home economics education accept as important. Educational theories believed to be important in home economics were used in a questionnaire which was submitted to a sample of 76 authorities in the field of home economics education. The respondents of the study were asked to check on the questionnaire whether each belief was very important, of lesser importance, or that she did not consider the belief to be true. There was an indication of general agreement by authorities of home economics education on the importance of beliefs stated in the questionnaire.³

Purpose of Study

The primary purpose of this study, which is a follow-up of the above

²Ernest E. Bayles, The Theory and Practice of Teaching, Harper and Brothers, New York, 1950, p. 9.

³Johnson, op. cit., pp. 175-178.

study, was to identify home economics education concepts which teachers in North Carolina believe to be important, and to identify concepts with which they recognize the need for further help. The study was designed to determine if there are significant differences in responses to items among teachers of varying amounts of teaching experience and among teachers having different professional preparation. Some comparisons between the responses of teacher educators in the earlier study and the responses of teachers in the present study were also desired.

This investigator made use of the same stated beliefs used in the previous study with minor revisions in wording. The questionnaire was designed for responses of teachers which would indicate whether they believed they understood and applied these educational theories.

The following assumptions were made relative to the purposes of the study: (1) it was assumed that teachers would give honest reactions concerning their understandings of concepts if the questionnaires were anonymous; (2) the development of an in-service education program based on expressed needs of teachers is one of the most effective means of bridging the gap between theory and practice.

Related Studies Currently Being Conducted

At the time of this study, two other studies by Cooper and Clawson were being conducted in the area of home economics education which also made use of certain of the stated beliefs of the original study. Cooper constructed a short-answer test to measure understandings of certain educational beliefs and ability to apply these beliefs in classroom situations.

Clawson used three of the educational beliefs, attempting to appraise the teacher's practice of these within the classroom. Her

methods included: (1) observation of the teacher's application of the three selected theories in the classroom, (2) administration of a questionnaire to pupils, and (3) interview with the teacher, using a tape recorder to record responses. The three beliefs selected for this study were:

Classroom activities should be provided which can carry over into the pupil's personal and home life.

Democratic procedures should be used in the homemaking classroom.

Discussions and other learning experiences in homemaking classes should help pupils to better understand their own behavior and the behavior of other people.

Findings of these studies should give some indications of the understanding of home economics teachers in North Carolina concerning the beliefs said to be important by authorities in home economics education. These studies are a part of a larger study to discover discrepancies between educational beliefs and practices of home economics teachers.

The chapter reviewing related studies follows.

CHAPTER II

REVIEW OF RELATED LITERATURE

Studies reviewed in this chapter are concerned with problems and professional needs of home economics teachers and basic concepts of home economics education. Included in this review is the study carried out last year at Woman's College by the home economics education staff.

Studies of Recognized Problems of Beginning Teachers

These studies identifying the problems of beginning teachers point out strengths and weaknesses of the home economics curriculum and indicate a need for a study of concepts basic to the teaching of home economics at the secondary level.

Spillers¹ devised a questionnaire which was sent to a sample of beginning vocational home economics teachers in a midwestern area of six states to identify activities which they recognized as problems with which they needed help. Activities and functions of teaching recognized as presenting the most difficulty included: working with an F.H.A. chapter, arousing and maintaining pupil interest, obtaining help from parents in unit planning, adapting material for pupils who are slow learners, organizing advisory councils, finding time to plan adequately, and leading a class in constructive self-evaluation.

It is noteworthy that most of the teachers did not recognize as

¹Barbara Jeanne Spillers, "Problems Recognized by Beginning Vocational Home Economics Teachers in a Midwestern Area" (unpublished Master's thesis, Iowa State College, Ames, 1958).

problems the activities included in the questionnaire which dealt with interpersonal relationships. Obtaining films and filmstrips and staying within the budget completed the list of activities not recognized by many beginning teachers as problems causing difficulty.

About one-half of the respondents indicated that they were not responsible for each of the following activities: guiding homeroom activities, taking charge of a study hall, planning a year's budget, organizing an advisory council, and working with an adult program. Less than one-fourth of the teachers did not take or have responsibility for: an F.H.A. program, selection of equipment, obtaining help from parents in unit planning, other activities related to summer employment, records of pupil conferences, pupil files, field trips, and budgeting. This survey by Spillers indicated that these teachers recognized some of their problems but that they had additional problems which may be apparent only to supervisors and administrators.

Coleman's² study of beginning home economics teachers had a three-fold purpose: (1) to analyze the responsibilities of first year homemaking teachers, (2) to discover the areas of their greatest strengths and weaknesses, and (3) to prepare recommendations for the improvement of teacher education programs.

Teachers participating in the study were asked to keep a log of their school responsibilities for six days. These six days were distributed over a three-month period. A questionnaire to the teachers was

²Margaret A. Coleman, "An Analysis of the Responsibilities of the First Year Homemaking Teachers with Implications for Teacher Education" (unpublished Doctor's dissertation, Teachers College, Columbia University, New York, 1951).

included in the study. Of the two hundred teachers who were invited to participate in the study, sixty-three teachers (32 per cent) accepted the invitation. Fifty of them (79 per cent) participated all three months.

Coleman, analyzing a random sample of class periods, found that teachers felt inadequately prepared to handle guidance responsibilities, and that 52 per cent experienced perplexing conduct situations. One-third of the teachers felt inadequately prepared to advise their F.H.A. chapters. This analysis revealed that the teachers devoted an average of 48 per cent of their class time to the skills and techniques of foods and clothing. The other 52 per cent was spread through eight remaining areas.

Findings showed that when accepting the invitation to participate in the study many of the teachers sought specific help. Implications drawn from the analysis of the responsibilities of the first year homemaking teachers gave rise to specific recommendations for help with their problems. Therefore, Coleman concluded her study by incorporating specific suggestions in the form of a letter to the beginning homemaking teacher.

An abstract of a study made by Roskie³ but not reviewed reported that the phases in which the beginning teachers in the Pacific region were not successful were those involved in the understanding of the social and economic problems in communities, in working cooperatively with the parents in the homes, and in helping to extend the homemaking program to elementary pupils, boys, and adults.

³Gertrude Roskie, "The Homemaking Program for Beginning Teachers" (unpublished Doctor's dissertation, Stanford University, Palo Alto, 1953).

Study of Recognized Professional Needs of Teachers

Laws⁴ surveyed home economics teachers and supervisors in Delaware for the purpose of determining the need for in-service education. On the survey form she itemized a list of general professional needs of teachers. The teachers were asked to rank these items in the order of importance to them in their work. The list of professional needs ranked in order of importance to the teachers was as follows;

1. Improved teaching procedure in line with current practice.
2. Better understanding of the concept of family-centered teaching.
3. Understanding of planning curriculum content.
4. Better understanding of educational evaluation procedures and techniques.
5. Better understanding of child and adolescent psychology, and information on how children grow and develop.
6. Better understanding of techniques for cooperative planning with parents and pupils.
7. Better understanding of educational and vocational guidance procedures.
8. Better understanding of the philosophy and aims of homemaking education.
9. Better understanding of the philosophy and aims of present day education.
10. Better understanding of group processes in education.
11. Better understanding of audio-visual aids for use in homemaking instruction.
12. Better understanding of basic human relationships and working with others.
13. Better understanding of contemporary national and international problems, their social, economic, and educational implications for home economics education.
14. Better understanding of techniques for guiding youth organizations.⁵

⁴Ruth Mitchell Laws, "A Study of the In-service Education Needs of Homemaking Teachers in Delaware" (unpublished Doctor's dissertation, Columbia University, New York, 1956).

⁵Ibid., pp. 79-80.

The professional need listed most frequently (number 1 above) by teachers - "Improved teaching procedure in line with current practice" - is evidence that many teachers recognize this as one of their major problems. It was interesting to note that data secured in the present study may be used as a guide in the effort to bring home economics teaching in North Carolina closer to accepted educational theory.

Study of Current Beliefs Concerning Educational Objectives

Buchanan⁶ defined concepts as follows:

Concepts are generalized beliefs or understandings evolved through experience. They lack the dynamic qualities of attitudes or values.⁷

Buchanan developed a list of concepts of home economics education and divided them into four basic areas. They included: (a) understandings concerning the relationship of homemaking to the total school program, (b) understandings concerning the democratic process, (c) understandings concerning education for home and family living, and (d) understandings concerning the personal adjustment of the home economics teacher. The purpose of this study was to determine the concurrence among state supervisors of home economics education, college teachers of home economics education, school administrators, and secondary homemaking teachers relative to selected concepts in home economics education. Her sample was drawn from an area consisting of four midwestern states. There was more concurrence between supervisors and administrators on the selected

⁶Bonnie Belle Buchanan, "An Analysis of Opinions Concerning Selected Concepts of Home Economics Education" (unpublished Doctor's dissertation, University of Oklahoma, Norman, 1959).

⁷Ibid., p. 11.

concepts than among other groups.

Buchanan further stated, "Concept formation should be a major objective of the home economics teacher education program."⁸

Study of the Preparation of Homemaking Teachers

Grant⁹ made a survey of graduates of a ten-year period and their administrators to collect evidences of the effectiveness of the home economics curriculum. A questionnaire was devised, adapting some parts of the instrument used in a national study of home economics teachers. The teachers participating in the study represented 91 per cent of the graduates of New York State College for Teachers who were still teaching and 91 per cent of their administrators.

Responses of administrators were quite favorable toward the supervisory follow-up work of the college with beginning teachers. They rated the teachers high in assuming responsibility in the school program as a whole and in cooperation within the school.

Long term planning was reported by 21 per cent as their most difficult problem while other numerous mentioned problems related to equipment, management of time, social control, and evaluation. One problem which was mentioned by 20 per cent of the teachers concerned their responsibilities in connection with the school lunch program. It is not a direct teaching problem, but teachers feel inadequately prepared to handle this, and they believed the time required for this made their teaching

⁸Ibid., p. 62.

⁹Margaret A. Grant, "The Preparation of Homemaking Teachers: Ten Years of Experience at the New York State College for Teachers at Buffalo, New York" (unpublished Doctor's dissertation, University of Buffalo, New York, 1951).

less effective.

The teachers surveyed by Grant reported that the greatest value realized from student teaching was in learning cooperation while working with individuals and groups in planning learning experiences. They mentioned other items as strengths of the student teaching program such as conferences with the supervising teachers, establishing relationships within the schools, and developing a philosophy of homemaking education.

Teachers said they felt insecure in teaching family life courses but regarded the courses helpful to them personally. One out of five teachers reported feeling insecure in teaching management. The greatest feeling of security in teaching methods was in use of discussion and laboratory techniques.

The greatest number of suggestions for improving the curriculum were for more elective courses in the field of specialization and general education. Almost three-fourths of the teachers believed that social studies courses had been least helpful.

Some of the suggestions made regarding the curriculum could be put into practice without too much difficulty but some would require more time than is available in a four-year pre-service training period.

Study Preliminary to the Present Study

Reference was made in the first chapter of this thesis to a study conducted by the staff¹⁰ in home economics education at Woman's College of the University of North Carolina. The first phase of this study, which was completed in the spring of 1960, had as its purpose the identifying

¹⁰Hildegard Johnson, Louise Lowe, Rebecca Smith, and Vergie Lee Stringer, "Our Educational Beliefs," Journal of Home Economics, 53 (March, 1961), pp. 175-178.

of educational beliefs considered to be important by leading home economics educators. Findings of this study indicate general agreement of authorities in home economics education on this body of educational theory.

Of the 37 beliefs stated in the questionnaire, 20 were considered to be very important by more than 90 per cent of the home economists. All but seven were considered very important by at least 75 per cent of the home economics educators.

The 30 statements of educational beliefs which were considered very important were grouped into categories which have implications for: (1) teacher objectives and for content of home economics courses at the high school level, (2) methods of teaching high school classes, (3) evaluation in the high school program, (4) pupil participation in learning experiences, and (5) extra-class responsibilities of the teacher and the physical facilities of the home economics department.

The present study is a follow-up of this study.

CHAPTER III

PROCEDURES

Questionnaires were mailed to leading educators in home economics throughout the United States in a previous study at Woman's College referred to in Chapter I. These educators were asked to respond to concepts stated therein. These concepts of home economics education were formulated from study of reports of previous research, homemaking teaching guides, articles in professional literature, and interviews with teachers, supervisors, and administrators.¹

The purpose of the present study was to secure the responses of high school teachers to a similar list of basic concepts of home economics education.

The first step was to restate the concepts in the questionnaire so that terms used in the concepts were understood by teachers on the secondary level. For example, a concept in the original study which stated: "In homemaking teaching, the national background and cultural level of each parent should be accepted where it is and its customs dignified," was re-worded to state: In homemaking teaching, classroom experiences should be geared to customs and practices in the school community. The investigator interviewed an experienced teacher and an inexperienced teacher to learn which statements they understood. Other suggestions for changes were made by the state supervisor of home economics education and the

¹Hildegard Johnson, Louise Lowe, Rebecca Smith, and Vergie Lee Stringer, "Our Educational Beliefs," Journal of Home Economics, 53 (March, 1961), pp. 175-178.

assistant state supervisors of home economics education in North Carolina.

The sample for this study was drawn from the population of home economics teachers in North Carolina listed in the 1960-61 Directory of Homemaking Teachers of the State Department of Public Instruction. The population of teachers was stratified by race prior to the use of a table of random numbers to draw sample members. There were 582 teachers in the population of vocational teachers. Drawn for the sample were 150 white and 44 Negro teachers, one third of the number in each stratum. The questionnaires (Appendix A) were mailed to 194 vocational home economics teachers in the sample.

Accompanying each questionnaire was a cover letter (Appendix B) which gave an explanation of the study and included a request for cooperation. Since the questionnaires were to be anonymously returned, a postal card was enclosed for respondents to sign and mail back to the investigator, indicating that she had complied with the request. Follow-up letters (Appendix C) were sent to teachers who had not returned a signed card within approximately two weeks. Three-fourths of the questionnaires had been returned at the end of three weeks. Teachers, who had failed to respond, were then mailed a double postal card (Appendix D) asking for a check mark to determine the status of participation or non-participation. A total of 170 questionnaires were returned which is 87.6 per cent of those mailed out. Approximately equal percentage of return was made by the Negro and white teachers.

No names of teachers were placed on the questionnaires since identification of the respondents was unnecessary for the purpose of the study. Personal data were requested pertaining to (1) the status of professional preparation of the respondent, and (2) the numbers of years

of teaching experience. It was believed that this information might be helpful in interpretation of the teachers' responses to the other items.

The respondents were asked to check each of the thirty-eight home economics education concepts stated in the questionnaire at one of four levels which best represented her thinking about it. The possible replies included: Column I, I do not believe this to be important; Column II, I do not understand this; Column III, I attempt to apply this but need further help; Column IV, I believe I can and do adequately apply this.

At the end of the stated concepts, the respondents were asked to write the numbers of the three concepts which they believed they applied most successfully and the numbers of the three concepts which they believed they applied least successfully.

A program had been prepared by a member of the staff of the Computation Center at the University of North Carolina in Chapel Hill which could be used to analyze contingency tables which were not larger than ten by ten. A chi-square value for each contingency table was computed as a part of this program. Arrangements had been made to use this program in processing the present data.

Compilation of the data was begun three weeks after the second follow-up mailing had been made. All data were placed on IBM cards and mailed to Chapel Hill for processing. Computations were made by the Univac 1105 Computer.

The following data were prepared for presentation in the findings:

- (1) Total number of responses in each of the four columns for each of the 38 concepts listed in the questionnaire.
- (2) Totals from (1) converted to percentages.

- (3) A contingency table for each item comparing responses of teachers in three educational levels: nothing beyond bachelor's degree, one to five courses, six or more courses.
- (4) A contingency table for each item comparing responses of teachers in five categories of teaching experience: zero to three years, four to nine years, 10 to 14 years, 15 to 20 years, and 21 years and up.

After the tabulations of data were completed, they were analyzed further. These findings are discussed in the following chapter.

CHAPTER IV

FINDINGS

The responses to the questionnaires by 168 vocational home economics teachers in North Carolina provided the data for this study. The teachers checked their reactions to 38 concepts which were accepted as important by leading home economics educators. The data they provided were analyzed for the following information and the discussion will be presented in this sequence:

- (1) The description of the teachers in the sample.
- (2) The responses of the teachers to items as checked in the four columns of the questionnaire, Column I, I do not believe this to be important; Column II, I do not understand this; Column III, I attempt to apply this but need further help; and Column IV, I believe I can and do adequately apply this.
- (3) The concepts grouped according to their implications for the teaching of home economics at the secondary level.
- (4) The concepts which teachers believed they applied most successfully, and concepts which teachers believed they applied least successfully.
- (5) Analysis of contingency tables showing differences in responses among teachers grouped according to three levels of professional preparation and varying teaching experience.
- (6) The comparison between the concepts authorities in home economics education and concepts teachers believed to be of lesser importance.

A. Description of Teachers in Sample

All of the teachers in the population from which the sample was drawn were vocational home economics teachers in North Carolina. The teachers were asked to return the questionnaires anonymously, but it was desirable to have them give some personal data as a basis for describing the group of teachers and so that some comparisons could be made among sub-groups. Two kinds of information were secured, the amount of education beyond the bachelor's degree and the amount of teaching experience.

The data requested of the teachers about their professional preparation were classified in three categories. The percentage of teachers in the sample in each category was as follows;

Nothing beyond bachelor's degree	17.5 per cent
One to five courses	24.5 per cent
Six or more courses	58.0 per cent

More than half of the teachers had completed six or more courses of two semester hours each. This is the equivalent of two summers of study for a six-week period of time each summer.

Teaching experience of the teachers reporting varied from zero to 36 years with a mean of 12.4 years. There were four teachers who reported more than 30 years of teaching experience, 16 teachers (9.5 per cent) reported 25 years or more of experience, and 42 (25 per cent) reported 20 years or more of teaching experience. Only 12 reported that they were beginning teachers.

B. Responses of Teachers to Columns

The teacher was asked to react to each stated concept in the

questionnaire by placing one check in the column which best represented her response to the statement. The following discussion will describe the teachers' responses to each of the four columns.

Concepts Considered Least Important

The number of teachers checking each item in Column I, "I do not believe this to be important," was in general very small. The teachers considered most of the concepts to be important. The largest percentage of teachers who did not believe any one item to be important was 38.0 per cent, item three. This item is stated below.

Five items were checked in Column I by 10 per cent or more of the teachers. These items were:

<u>Item Number</u>		<u>Per Cent</u>
3	Parents of present and parents of former homemaking pupils should participate in planning the homemaking program.	38.0
29	Classroom instruction in homemaking should be available to boys as well as girls.	25.0
20	In homemaking teaching, classroom experiences should be geared to customs and practices of the school community.	10.8
7	Grades of pupils should be based on how well pupils have attained the objectives which were set up at the beginning of the unit.	10.7
11	Adult homemaking education should be available in each community in which there are high school homemaking classes.	10.7

If educators believe these concepts to be important to the success of the homemaking program, they should plan in pre-service and in-service education of teachers to help teachers to understand their importance.

Concepts Which Teachers Did Not Understand

There were relatively few teachers who checked many items in Column II, "I do not understand this." This might be due to the fact that an effort was made to restate the items prior to sending the questionnaire to teachers so that they would be more easily understood.

Eight of the items showed no response in this column so it would seem that the teachers felt secure in their understanding of these concepts. The items were:

Item Number

- | | |
|----|--|
| 2 | Pupils should participate in planning unit goals, experiences which will help them to reach these goals, and methods of evaluating their progress. |
| 12 | Visits should be made to the home of pupils as a basis for program development and for understanding the pupil. |
| 14 | Classroom activities should be provided which can carry over into the pupil's personal and home life. |
| 15 | Discussions and other learning experiences in homemaking classes should help pupils to better understand their own behavior and the behavior of other people. |
| 26 | Pupils should be taught to make the best use of resources in their own homes. |
| 27 | Pupils should learn in homemaking classes to make good use of such resources of the school as; class time, equipment, money, and special abilities of the group members. |
| 30 | In all areas of the homemaking program pupils should be stimulated to independent thinking. |
| 32 | The homemaking teacher should plan for conferences with pupils to give individual help and counseling. |

Five concepts were not understood by 10 per cent or more of the teachers. They were as follows in decreasing order:

<u>Item Number</u>		<u>Per Cent</u>
33	Pupils should be helped to integrate or synthesize their learning to come to an understanding of the principles involved and to state these principles.	23.2
23	Pupils should use the problem solving method and be given help in understanding the steps in this method.	16.1
21	Skills, facts, and basic principles should be used in connection with solving immediate problems of pupils	13.1
7	Grades of pupils should be based on how well pupils have attained the objectives which were set up at the beginning of the unit.	11.3
3	Parents of present and parents of former homemaking pupils should participate in planning the homemaking program.	9.5

It was interesting to note that these five concepts were given a large response in Column III by other teachers. Many teachers who understood these concepts recognized the need for further help in applying them.

Concepts Which Teachers Attempt To Apply

Teachers checked in Column III those concepts which they were attempting to apply but with which they also recognized a need for further help. At least 18 per cent of the teachers checked each item in Column III. The percentage ranged to 67 for concept 31. Concepts receiving a large response of 50 per cent or more were:

<u>Item Number</u>		<u>Per Cent</u>
31	In addition to applying what they believe about home economics to their daily living, homemaking teachers and pupils should interpret the program to the community in a variety of ways.	67.3
19	Homemaking teachers should emphasize how the additional leisure time available in our present culture should be used in better personal, family, and community development.	64.9

<u>Item Number</u>		<u>Per Cent</u>
34	Pupils should be encouraged to apply principles to new situations.	60.7
35	The homemaking teacher should attempt to guide each pupil in such a way that his progress is satisfactory in relation to his initial skill and ability.	58.9
21	Pupils should participate in planning unit goals, experiences which will help them to reach their goals, and methods of evaluating their progress.	58.3
23	Pupils should use the problem solving method and be given help in understanding the steps of this method.	58.3
33	Pupils should be helped to integrate or synthesize their learning to come to an understanding of the principles involved and to state these principles.	54.2
27	Pupils should learn in homemaking classes to make good use of such resources of the school as: class time, equipment, money, and special abilities of the group members.	53.0
21	Skills, facts, and basic principles should be used in connection with solving immediate problems of pupils.	50.6
10	F.H.A. should be an integral part of the homemaking program.	50.6
30	In all areas of the homemaking program pupils should be stimulated to independent thinking.	50.0

The need recognized by the North Carolina home economics teachers for help in applying these concepts should certainly be given consideration in the planning of in-service education programs for the classroom teacher of homemaking. Such programs are more functional when the goals come from the classroom teachers as they recognize their problems and needs. The findings identify several areas in which teachers stated they need help.

Concepts Which Teachers Believed They Applied

By checking Column IV the teachers expressed the belief that they could adequately apply the concept within their teaching situations. This column received a majority of the total responses, many of the items being checked by 50 per cent or more of the teachers. These data do not attempt to prove that, because of a high percentage of responses in this column, these are actual practices in the classroom.

The concept which the highest percentage (84.5) of teachers said they believed they applied was: Visits should be made to the homes of pupils as a basis for program development and for understanding the pupil. All teachers believed this concept to be important and said that they understood it.

The concepts which most teachers believed they could and did adequately apply were:

<u>Item Number</u>		<u>Per Cent</u>
12	Visits should be made to the homes of pupils as a basis for program development and for understanding the pupil.	84.5
37	Democratic procedures should be used in the homemaking classroom.	79.2
28	The homemaking department should be attractive and as homelike as possible while still being effective for use by groups for instruction.	71.4
36	A variety of teaching methods should be used.	69.6
22	The homemaking curriculum at any grade level should start with present needs and interests of the pupils but must remain flexible to expected change and new needs.	67.9

The concepts receiving least response concerning their application by the teachers were:

<u>Item Number</u>		<u>Per Cent</u>
3	Parents of present and parents of former homemaking pupils should participate in planning the homemaking program.	7.1
29	Classroom instruction in homemaking should be available to boys as well as girls.	15.5
33	Pupils should be helped to integrate or synthesize their learning to come to an understanding of the principles involved and to state these principles.	17.9

Concepts three and 29 received large responses under Column I, I do not believe this to be important, whereas, concept 33, had heavy responses under Columns I and III, I do not believe this to be important and I attempt to apply this but need further help.

C. Concepts Grouped According to Implication

Educational concepts stated in the questionnaire have been grouped according to their implications for teaching at the secondary level. They will be discussed in these categories: (1) concepts which have implications for teacher objectives and for content of home economics courses at the high school level, (2) concepts which have implications for methods of teaching high school classes, (3) concepts which have implications for evaluation in the high school program, (4) concepts which have implications for pupil participation in learning experiences, and (5) concepts which have implications for extra class responsibilities of the teacher and the physical facilities of the home economics department. In some instances, items belonged in more than one of these categories. Item 29 is omitted as it did not fit into any of these categories.

Data will be presented in tables showing the number and percentage

of responses given by the teachers. In the tables, percentages were figured to the nearest whole number and column headings have been shortened. Each concept has been given the same number in the discussion and tables as the item number in the questionnaire.

Implications For Teacher Objectives and Course Content

Teachers expressed the belief that they could apply the concepts which dealt with the importance of starting with present needs and interests, and teaching for carryover into pupil's personal and home life, items 14 and 22 in Table I. Teachers said they need help in gearing learning experiences to the customs and practices of the community, item 20 in Table I. It seems that teachers should be helped to see that one must build on community customs and practices in the classroom if we are to successfully teach for carryover into the pupil's home life. Over half of the teachers expressed need for further help in teaching the use of additional leisure time and in guiding pupil progress in relation to initial skill and ability. Teachers also desire further help in teaching the broad program in home economics, item 25 in Table I, and in dealing with intangible things such as attitudes, item 17.

Teachers did not believe to be important the concept which states that program planning should involve parents of present and former home-making pupils. It may be that some misinterpretation was given to this concept, as teachers believed they applied the concept of home visitation and this usually results in informal involvement of parents in program planning. Also, it may be a rejection of the involvement of parents of former pupils in program planning.

It might be noted that many teachers attempt to apply these

TABLE I

RESPONSES OF TEACHERS TO CONCEPTS WHICH HAVE IMPLICATIONS FOR TEACHER OBJECTIVES AND CONTENT OF HOME ECONOMICS COURSES AT HIGH SCHOOL LEVEL

Item Number	Concept	Do Not Believe		Do Not Understand		Need Further Help		Adequately Apply	
		n	%	n	%	n	%	n	%
14	Classroom activities should be provided which can carry over into the pupil's personal and home life.	0	0	0	0	51	30	117	70
22	The homemaking curriculum at any grade level should start with present needs and interests of the pupils, but must remain flexible to expected change and new needs.	2	1	21	1	50	30	114	68
15	Discussions and other learning experience in homemaking classes should help pupils to better understand their own behavior and the behavior of other people.	2	1	0	0	64	38	102	61
38	Teaching methods should be selected on the basis of their effectiveness in bringing about desired pupil development.	0	0	2	1	67	40	99	59
1	Since homemaking is made up of many and varied kinds of activities and responsibilities, the high school homemaking program should include vital experiences in all areas of family living.	2	1	2	1	66	39	98	58

TABLE I (Continued)

Item Number	Concept	Do Not Believe		Do Not Understand		Need Further Help		Adequately Apply	
		n	%	n	%	n	%	n	%
13	The homemaking program should focus attention upon the individual in relation to the entire family.	2	1	4	2	64	38	98	58
16	The homemaking curriculum at any grade level should help pupils to make a better contribution toward living in their parental family and should help them in their personal growth toward maturity.	1	1	4	2	64	39	98	58
26	Pupils should be taught to make the best use of resources in their own homes	0	0	0	0	75	45	93	55
25	Broad areas of home responsibility such as relationships, safety, management, and art should be a part of all units of work.	2	1	2	1	72	43	91	55
20	In homemaking teaching, classroom experiences should be geared to customs and practices of the school community.	18	11	14	8	47	28	88	53
17	The homemaking program should deal with attitudes, interests, values, habits, understanding and appreciation, as well as abilities.	1	1	6	4	81	48	80	48

TABLE I (Continued)

Item Number	Concept	Do Not Believe		Do Not Understand		Need Further Help		Adequately Apply	
		n	%	n	%	n	%	n	%
35	The homemaking teacher should attempt to guide each pupil in such a way that his progress is satisfactory in relation to his initial skill and ability.	1	1	3	2	99	59	65	39
19	Homemaking teachers should emphasize how the additional leisure time available in our present culture should be used in better personal, family, and community development.	1	1	3	2	109	65	54	32
3	Parents of present and parents of former homemaking pupils should participate in planning the homemaking program.	64	38	16	10	76	45	12	7

concepts but need further help. These expressed needs by the teachers merit the attention of persons who can give such help through in-service education, and pre-service education for future teachers.

Implications for Teaching Methods

Teachers stated in general that they applied the teaching methods suggested by these concepts as listed in Table II. A large percentage recognized the need for further help in applying concepts including the

TABLE II

 RESPONSES OF TEACHERS TO CONCEPTS WHICH HAVE IMPLICATIONS
 FOR METHODS OF TEACHING HIGH SCHOOL CLASSES

Item Number	Concept	Do Not Believe		Do Not Understand		Need Further Help		Adequately Apply	
		n	%	n	%	n	%	n	%
37	Democratic procedures should be used in the homemaking classroom.	0	0	3	2	31	19	133	80
36	A variety of teaching methods should be used.	0	0	1	1	50	30	117	70
38	Teaching methods should be selected on the basis of their effectiveness in bringing about desired pupil development.	0	0	2	1	67	40	99	60
18	Homemaking teaching should emphasize benefits derived from labor-saving materials and methods.	2	1	3	2	79	47	83	49
30	In all areas of the homemaking program pupils should be stimulated to independent thinking.	0	0	0	0	84	50	83	49
24	Pupils should be guided into problem situations in the classroom as nearly like those they find at home as possible.	7	4	8	5	79	47	73	44
34	Pupils should be encouraged to apply principles to new situations.	3	2	6	4	102	61	57	34

TABLE II (Continued)

Item Number	Concept	Do Not Believe		Do Not Understand		Need Further Help		Adequately Apply	
		n	%	n	%	n	%	n	%
21	Skills, facts, and basic principles should be used in connection with solving immediate problems of pupils.	3	2	22	13	85	51	56	33
23	Pupils should use the problem solving method and be given help in understanding the steps of this method	6	4	27	16	98	58	37	22
33	Pupils should be helped to integrate or synthesize their learning to come to an understanding of the principles involved and to state these principles.	8	5	39	23	91	54	30	18

problem solving method, and its use, the transfer of learning to new situations, guiding the students to do independent thinking, and the planning of learning experiences which bear directly on the immediate problems of pupils.

Certain concepts with which teachers expressed need for further help, items 21, 23, and 33, also received appreciable responses by teachers in Column II, I do not understand this. Teachers recognize their lack of understanding and need for further help in teaching pupils to inductively arrive at their own generalizations and use these in problem solving.

Implications for Evaluation

Teachers expressed the belief that they can successfully apply the concept that the class should evaluate its progress toward group goals. As shown in Table III, over a third of the teachers would like further help in applying the concepts of self-evaluation, pupil decision-making as an individual and group process, pupil participation in unit planning and evaluation, and evaluation of pupils resulting in grades being based on achievement of unit objective.

More than 40 per cent of the North Carolina home economics teachers need further help in guiding pupils in self-evaluation, and 8 per cent did not understand this concept, item 5 in Table III.

Teachers feel more confident in evaluation of their own personal progress than evaluating pupil progress or guiding pupils in self-evaluation. They have not understood the importance of pupil objectives and have probably thought of grading in terms of recall of subject matter. It seems that supervisors who wish to help teachers with evaluation might well start by helping them to better understand and use pupil-parent planning, and help them to guide pupils to set their own personal goals. These abilities are basic to development of a good program of evaluation and almost 50 per cent of the teachers recognized they needed help in these areas. Undoubtedly these areas should receive special attention in the methods courses.

Implications for Pupil Participation

The concepts in Table IV have implications for pupil participation in learning experiences. A high percentage believed that their classroom procedures were democratic. The researcher realizes that persons have

TABLE III

 RESPONSES OF TEACHERS TO CONCEPTS WHICH HAVE IMPLICATIONS
 FOR EVALUATION IN THE HIGH SCHOOL PROGRAM

Item Number	Concept	Do Not Believe		Do Not Understand		Need Further Help		Adequately Apply	
		n	%	n	%	n	%	n	%
6	A class should evaluate from time to time its progress toward goals set for the group.	2	1	13	8	54	32	109	65
8	A teacher should continuously evaluate her own progress as a person and as a teacher.	1	1	4	2	61	36	102	61
4	In all areas of the homemaking program pupils should be given opportunities to make individual and group decisions and to evaluate these decisions in terms of their values and goals.	3	2	6	4	62	37	97	58
5	Pupils should be encouraged and guided to evaluate their own progress toward personal goals.	0	0	14	8	74	44	80	48
2	Pupils should participate in planning unit goals, experiences which will help them to reach these goals, and methods of evaluating their progress.	1	1	0	0	98	58	69	41
7	Grades of pupils should be based on how well pupils have attained the objectives which were set up at the beginning of the unit.	18	11	19	11	63	38	67	40

TABLE IV

RESPONSES OF TEACHERS TO CONCEPTS WHICH HAVE IMPLICATIONS
FOR PUPIL PARTICIPATION IN LEARNING EXPERIENCES

Item Number	Concept	Do Not Believe		Do Not Understand		Need Further Help		Adequately Apply	
		n	%	n	%	n	%	n	%
37	Democratic procedures should be used in the homemaking classroom.	0	0	3	2	31	19	133	79
6	A class should evaluate from time to time its progress toward goals set for the group.	2	1	13	8	54	32	109	65
4	In all areas of the homemaking program pupils should be given opportunities to make individual and group decisions and to evaluate these decisions in terms of their values and goals.	3	2	6	4	62	37	97	58
27	Pupils should learn in homemaking classes to make good use of such resources of the school as: class time, equipment, money, and special abilities of the group members.	1	1	0	0	89	53	78	46
2	Pupils should participate in planning unit goals, experiences which will help them to reach these goals, and methods of evaluating their progress.	1	1	0	0	98	58	69	41

varying interpretations of what may be democratic procedures in the classroom.

Educators have talked a long time about teacher-pupil planning. Teachers believe in this but more than half of them express the need for further help in this area, item 2.

Implications for Extra Class Responsibilities

Almost 85 per cent of the teachers believed they applied the concept of the home visit as an underlying factor in program development and as an aid to understanding pupil behavior. This was the largest percentage responding in this way to any item, item 12 in Table V. This is a desirable situation. Teachers who did not believe they were adequately applying this concept checked the response, indicating they were attempting to apply it but needed further help, Column III.

Responses of teachers would suggest that they desire further help with activities such as program interpretation with the community, the integration of F.H.A. and home experiences into the homemaking program, counseling of pupils through conferences, and adult homemaking education. Forty or more per cent of the teachers desired further help in each of these areas.

Of these concepts with implications for extra class responsibilities, only one was believed to be unimportant by 10 per cent or more of the teachers. This concept, item 11 in Table V, concerned the availability of adult homemaking classes in each community where there are high school homemaking classes. A number of teachers do not understand the importance of adult education, and more than a third of the teachers express the need for further help with their adult teaching.

TABLE V

RESPONSES OF TEACHERS TO CONCEPTS WHICH HAVE IMPLICATIONS
FOR EXTRA CLASS RESPONSIBILITIES OF THE TEACHER AND THE
PHYSICAL FACILITIES OF THE HOME ECONOMICS DEPARTMENT

Item Number	Concept	Do Not Believe		Do Not Understand		Need Further Help		Adequately Apply	
		n	%	n	%	n	%	n	%
12	Visits should be made to the homes of pupils as a basis for program development and for understanding the pupil.	0	0	0	0	26	15	142	85
28	The homemaking department should be attractive and as homelike as possible while still being effective for use by groups for instruction.	1	1	2	1	45	27	120	71
32	The homemaking teacher should plan for conferences with pupils to give individual help and counseling.	0	0	0	0	67	40	101	60
9	Home experiences should be interwoven into classwork and all parts of the homemaking program.	1	1	4	2	77	46	86	51
11	Adult homemaking education should be available in each community in which there are high school homemaking classes.	18	11	2	1	67	40	80	48
10	F.H.A. should be an integral part of the homemaking program.	10	6	10	6	84	50	60	36

TABLE V (Continued)

Item Number	Concept	Do Not Believe		Do Not Understand		Need Further Help		Adequately Apply	
		n	%	n	%	n	%	n	%
31	In addition to applying what they believe about home economics to their daily living, homemaking teachers and pupils should interpret the program to the community in a variety of ways.	0	0	1	1	113	67	54	32

Persons responsible for pre-service and in-service education should be alert to this problem.

Many of the teachers wrote in unsolicited subjective responses to item 29 "Classroom instruction in homemaking should be available to boys as well as girls." It was the only statement to which some of the teachers found it difficult to respond in the way prescribed by the column headings. Some teachers who believed this item to be true stated that within their teaching situation there was no opportunity to apply this. There were fifteen responses written by teachers stating their belief concerning the concept. Typical of such comments were:

"I believe it should be, but I do not have opportunity to try it."

"I think it should, but I do not teach boys."

"I do believe that boys should be taught at least part of our program, since they will be future husbands and fathers."

Other comments such as "Yes" and "True" were noted on several questionnaires.

From reading these comments it was not possible to tell whether

classes for boys in homemaking had any place in the school curriculum as a regular class or were exchange classes of short term. Some teachers expressed approval of such classes with reservations. Typical of these comments were:

"Important if they (boys) are not just a problem group."

"Relations, yes, but not skills."

"I do, provided they are not given to us because there is no other course for them."

"It depends on the interest of the boys."

Some teachers expressed disapproval of such classes with 25 per cent responding that they did not believe this concept to be important.

D. Concepts Least and Most Successfully Applied

On the last page of the questionnaire (Appendix A) teachers were asked to write the numbers of the three concepts which they felt they applied most successfully. The concepts the teachers listed were those which were most frequently checked in Column III, I attempt to apply but need further help, and Column IV, I believe I can and do adequately apply this. The five concepts which were most frequently mentioned were:

<u>Item Number</u>		<u>Per Cent</u>
12	Visits should be made to the homes of pupils as a basis for program development and for understanding the pupil.	34.5
36	A variety of teaching methods should be used.	21.4
1	Since homemaking is made up of many and varied kinds of activities and responsibilities, the high school homemaking program should include vital experiences in all areas of family living.	19.0

<u>Item Number</u>		<u>Per Cent</u>
37	Democratic procedures should be used in the classroom.	16.1
14	Classroom activities should be provided which can carry over into the pupil's personal and home life.	16.1

Teachers expressed the belief they could more adequately apply these concepts than others. Also it was noted ~~that~~ these concepts were believed to be important and were understood by the teachers.

The teachers were also asked to write the numbers of the three concepts they felt they applied least successfully. In answer to this request the teachers listed frequently the numbers of concepts which had also been frequently checked in Column I, I do not believe this to be important, and Column II, I do not understand this.

The five concepts which teachers mentioned as the ones they believed they applied least successfully were:

<u>Item Number</u>		<u>Per Cent</u>
3	Parents of present and parents of former homemaking pupils should participate in planning the homemaking program.	34.5
29	Classroom instruction in homemaking should be available to boys as well as girls.	26.2
33	Pupils should be helped to integrate or synthesize their learning to come to an understanding of the principles involved and to state these principles.	26.2
10	F.H.A. should be an integral part of the homemaking program.	22.0
11	Adult homemaking education should be available in each community in which there are high school homemaking classes.	22.0

Since teachers recognized their inability to apply these concepts

and since these concepts were not understood or believed to be important by some of the teachers, they should be included in educational programs which are planned to help teachers. Ability to apply educational concepts is based on understanding of them.

E. Analysis of Contingency Tables

Teachers were grouped into five categories according to teaching experience; (1) zero to four years, (2) five to nine years, (3) ten to 14 years, (4) 15 to 20 years, and (5) 21 years or more. Responses to each item among teachers in the categories were compared. The teachers were also grouped into three categories according to three levels of professional preparation and responses to items compared. The professional groupings included: (1) nothing beyond bachelor's degree, (2) one to five courses, and (3) six or more courses.

Seventy-six contingency tables were tabulated in the Univac program and a chi-square value computed by the machine. When these tables were examined, many of them contained two columns of very small numbers, since there were, in general, few responses in the first two columns. Computations of chi-square are not considered reliable when large numbers of expected values are less than five. Dixon and Massey¹ recommend the suitability of chi-square distribution computed for tables in which not more than 20 per cent of the expected frequencies are less than five and

¹Wilfred Dixon and Frank Massey, Introduction to Statistical Analysis (second edition; New York: McGraw-Hill Book Company, 1957), p. 225.

none less than one. If this criterion is accepted, none of the 76 chi-square values computed by Univac are acceptable. However, in cases where tables cannot be analyzed because of small numbers in rows and columns, these may be combined so that larger expected values are secured. This is only possible where combining rows and columns is meaningful in interpretation of the table. A few scattered responses lying outside the body of the table are sometimes omitted in computing a chi-square value.

The 76 tables were examined and those with chi-square values above 10 were selected for further consideration, assuming that those less than 10 were quite unlikely to be significant after combining certain columns or omitting a few cases which were unlike most of the responses. This left only 20 tables for consideration. Chi-squares values for these 20 tables were recomputed after combining Columns I and II., or omitting Columns I and II in cases where the combined responses to these columns were still extremely small. Only four of the 20 tables were significant at or beyond the .05 level. Responses of items 6, 17, 36 and 39 were significant beyond the .05 level.

The first contingency table, Table VI, to be discussed is item 6. This concept states: "A class should evaluate from time to time its progress toward goals set for the group." Responses were significant among teachers having varying professional preparation. More teachers with one to five courses beyond the bachelor's degree did not believe or understand this concept than was expected from responses of the entire group of teachers as expressed in the column total, whereas fewer cases of the teachers having six or more courses were reported not to believe or understand this than was expected. More teachers whose preparation was a bachelor's degree only said they attempted to apply this concept but

TABLE VI

CONTINGENCY TABLE: A CLASS SHOULD EVALUATE FROM TIME
TO TIME ITS PROGRESS TOWARD GOALS SET FOR THE GROUP

Educational Level	Not Important, Not Understood	Attempt to Apply	Can and Do Apply
Nothing beyond Bachelor's Degree	3	15	12
One to Five Courses	8	10	23
Six or More Courses	4	29	64
Total	15	54	99

$$\chi^2 = 14.79$$

$$\chi^2 = 13.28$$

.01

TABLE VII

CONTINGENCY TABLE: THE HOMEMAKING PROGRAM SHOULD DEAL WITH
ATTITUDES, INTERESTS, VALUES, HABITS, UNDERSTANDING AND
APPRECIATION AS WELL AS ABILITIES

Educational Level	Not Important, Not Understood	Attempt to Apply	Can and Do Apply
Nothing beyond Bachelor's Degree	3	18	9
One to Five Courses	3	21	17
Six or More Courses	1	42	54
Total	7	81	80

$$\chi^2 = 10.74$$

$$\chi^2 = 9.49$$

.05

needed further help and fewer of these teachers than expected said they could adequately apply this. Teachers with undergraduate preparation only, need more help with class evaluation of group processes.

The concept in item 17 is stated: "The homemaking program should deal with attitudes, interests, values, habits, understanding, and appreciation as well as abilities." In Table VII, more teachers with bachelor's degree only did not understand this than was expected from responses of the entire group. These teachers said they attempted to apply this concept but needed further help while fewer of these teachers believed they could adequately apply it than was expected. Fewer cases than expected of the teachers having six or more courses responded that they did not believe this concept. These teachers with advanced preparation felt more secure in their application of this concept than was expected.

Table VIII shows the responses of teachers grouped according to educational level to concept 36: "A variety of teaching methods should be used." A case was omitted from the table and the responses to be discussed were those given in Columns III and IV.

More teachers with bachelor's degree only and those having one to five courses beyond the bachelor's degree said they needed help with application of this concept than was the expected number. Fewer teachers at bachelor's level believed they could adequately apply this. Teachers with six or more courses of graduate study believed they could apply this concept adequately.

The last contingency table to be discussed, Table IX, shows the responses of teachers grouped according to years of teaching experience to the concept which states: "Since homemaking is made up of many and varied

TABLE VIII

CONTINGENCY TABLE: A VARIETY OF TEACHING METHODS SHOULD BE USED

Educational Level	Attempt to Apply	Can and Do Apply
Nothing Beyond Bachelor's Degree	15	14
One to Five Courses	16	25
Six or More Courses	19	78
Total	50	117

$$\chi^2 = 11.8$$

$$\chi^2_{.05} = 9.49$$

TABLE IX

CONTINGENCY TABLE: SINCE HOMEMAKING IS MADE UP OF MANY AND VARIOUS KINDS OF ACTIVITIES AND RESPONSIBILITIES, THE HIGH SCHOOL HOMEMAKING PROGRAM SHOULD INCLUDE VITAL EXPERIENCES IN ALL AREAS OF FAMILY LIVING

Teaching Experience	Attempt to Apply	Can and Do Apply
0 to 3 years	24	17
4 to 9 years	14	20
10 to 14 years	7	20
15 to 20 years	10	23
21 years and up	11	18
Total	66	98

$$\chi^2 = 9.54$$

$$\chi^2_{.05} = 9.49$$

kinds of activities and responsibilities, the high school homemaking program should include vital experiences in all areas of family living." The table has four cases in Columns I and II omitted.

The two groups who deviate from the pattern of the entire group are those teachers in the first and third categories of teaching experience. More beginning teachers (zero to three years) than expected and fewer teachers in the category of ten to 14 years of teaching experience than expected are attempting to apply this concept but need further help. Beginning teachers expressed the need for help in planning a broad program in home economics.

The fact that very few of the contingency tables were significant indicates that amount of teaching experience and amount of graduate training do not have much influence on the responses of teachers to these items.

F. Concepts Believed Less Important by Teacher Educators and by Teachers

The survey of leading home economics educators and the present survey secured reactions to the same concepts of home economics education, with minor revisions in wording of the concepts in the present study. However, the levels of response were stated entirely differently in the two studies. For this reason comparisons between the two studies must be carefully interpreted. Home economics educators responded that they believed the concepts to be very important, of lesser importance, or not true, whereas home economics teachers responded that they did not believe the concepts to be important, did not understand the concepts, attempted to apply the concepts but need further help, or believed they could

adequately apply the concept.

Findings showed that all but seven of the theories were considered very important by at least 75 per cent of the home economics educators. All but one of the concepts were believed to be important by at least 75 per cent of the home economics teachers. Five of the concepts were not believed to be important by 10 per cent or more of the high school teachers. In Table X, a comparison is made of responses to concepts which these two groups did not believe to be important. Even though the purposes and criteria for the two studies were not identical, some interesting points were noted.

Both teachers and leading educators in the field of home economics considered one concept to be of lesser importance than the other concepts. This concept is stated: "Parents of present and former homemaking students should be participants in program planning." Fewer high school teachers than educators believed concept 11 to be not important or of lesser importance. This concept is concerned with the availability of adult homemaking classes in each community. About one-third of the educators believed this concept to be of lesser importance. Teachers and educators agreed in their thinking about the unimportance of certain concepts, items three, seven, and 20.

Four of the concepts, items 10, 18, 19, and 21 were believed to be of lesser importance by 27 per cent or more of the educators. These same concepts were believed to be important by teachers.

An equal percentage (11) of teachers and home economics educators responded that concept seven was unimportant. This concept was stated: "Grades of pupils should be based on how well pupils have attained the objectives which were set up at the beginning of the unit." One concept

TABLE X

COMPARISON OF RESPONSES BY TEACHERS AND AUTHORITIES ON HOME ECONOMICS EDUCATION TO CONCEPTS NOT BELIEVED TO BE IMPORTANT

Item Number	Concept	Teachers		Authorities			
		Do not Believe		Of Lesser		Not	
		Important		Importance		True	
		n	%	n	%	n	%
3	Parents of present and parents of former homemaking pupils should participate in planning the homemaking program.	64	38	34	47	2	3
29	Classroom instruction in homemaking should be available to boys as well as girls.	42	25	18	25	1	1
7	Grades of pupils should be based on how well pupils have attained the objectives which were set up at the beginning of the unit.	18	11	8	11	1	1
11	Adult homemaking education should be available in each community in which there are high school homemaking classes	18	11	25	34	7	10
20	In homemaking teaching, classroom experiences should be geared to customs and practices of the school community.	18	11	9	12		
10	F.H.A. should be an integral part of the homemaking program	10	6	21	29	2	3
19	Homemaking teachers should emphasize how the additional leisure time available in our present culture should be used in better personal, family, and community development.	1	1	21	29	4	6
18	Homemaking teaching should emphasize benefits derived from labor-saving materials and methods.	2	1	20	27		
21	Skills, facts, and basic principles should be used in connection with solving immediate problems of pupils.	3	2	11	15	34	47

which 46 per cent of the educators did not believe to be true was stated: "skills, facts, and basic principles should be used only in connection with solving immediate problems of pupils." For use of this concept in the questionnaire to the high school teachers, the word "only" was omitted, item 21. In response to this less strongly worded concept, very few teachers said they did not believe this concept to be important.

CHAPTER V

SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS

Closing the gap between accepted educational theory and actual practice within the classroom has been a concern of educators in recent years. This concern has focused attention on programs of in-service education as a help for meeting the needs of teachers, and has brought about evaluation of pre-service training. If programs designed to help teachers are to be functional, they must include goals based on the recognized needs of teachers. It is believed by educators that many teachers would like to apply accepted educational concepts with greater success.

A previous study was made at the Woman's College of the University of North Carolina by the home economics education staff to determine which educational concepts authorities in home economics education throughout the United States accept as important. The concepts selected were the result of thorough reviewing of many recent publications, and they were recorded in the form of a questionnaire. The authorities in home economics education agreed that most of the selected educational concepts in the questionnaire were very important.

The purpose of the present study was to identify home economics education concepts which teachers in North Carolina believe to be important, and to identify concepts with which they recognize the need for further help. The study was designed to determine if there are significant differences in responses to items among teachers having varying amounts of teaching experience and among teachers having different professional

preparation. It was also desired that some comparisons be made between the responses of home economics educators and high school teachers.

The questionnaire used in the current investigation included the selected educational concepts of the earlier study with some minor revision. The high school teachers were asked to respond to the selected concepts by checking one of four columns whose headings read as follows: (1) I do not believe this to be important, (2) I do not understand this, (3) I attempt to apply this but need further help, and (4) I believe I can and do adequately apply this. Teachers returned the questionnaires anonymously, but, as requested, they gave personal data about their professional preparation and teaching experience.

A random sample of one-third (194) of the vocational home economics teachers in North Carolina was drawn. Of the questionnaires mailed out, there was a return of 87.6 per cent (170). The summary of the personal data indicated that more than half of the teachers responding had completed six or more courses beyond the bachelor's degree and had had a mean of 12.4 years of teaching experience.

The findings of this study suggest several areas in which teachers in North Carolina need help. They may be used as a guide in the effort directed toward bringing practice in line with accepted theory.

The teachers considered most of the concepts to be important, as the number of teachers checking each item in Column 1, "I do not believe this to be important," was, in general, very small. Over one-third of the teachers did not believe the concept to be important which would involve parents of present and former homemaking pupils in planning the homemaking program. Also, one-fourth of the teachers did not believe that classroom

instruction in homemaking should be available to boys.

Few teachers checked many items in Column II, "I do not understand this," and eight items in the questionnaire showed no response in this column. Concepts which teachers said they did not understand were those which dealt with helping pupils to generalize their learning and to apply the learning to new situations, use of the problem solving method by pupils, and understanding of the steps in the problem solving method. Some teachers said they did not understand the concepts which state that skills, facts, and basic principles taught in the homemaking program should be used in connection with solving immediate problems of pupils, and that grades of pupils should be determined by pupil achievement of unit objectives. It was interesting to note that items checked in Column II by 10 per cent or more of the teachers received large response in Column III, "I attempt to apply this, but need further help."

Eleven items were checked by 50 per cent or more of the teachers in Column III, "I attempt to apply this but need further help." Concepts with which teachers expressed a need for help were those concerning program interpretation within the school community; teaching the use of additional leisure time in our present culture; helping pupils to generalize their learning; guiding individual pupil progress; teacher-pupil planning of unit goals and experiences; use of the problem solving method; helping pupils learn management of school resources; use of skills, facts, and basic principles for solving immediate problems of pupils; integration of F.H.A. into the homemaking program; and the ability to stimulate pupils to do independent thinking.

By checking an item under Column IV, the teacher indicated her belief

that she adequately applied the concept. Teachers felt secure in their application of democratic procedures and teaching methods suggested by certain of the concepts. Teachers have accepted the concept of the home visit as a basis for program development. Almost 85 per cent of the teachers believed they applied this concept and the remainder of the teachers said they attempted to apply this concept but needed further help. Teachers also believed that they adequately applied the concepts which have implications for the physical facilities of the home economics department and the homemaking curriculum.

The need is indicated for emphasis in pre-service and in-service education on preparation of teachers for work with adults - to help teachers understand the needs of adults for educational help with problems in our present culture. While teachers accept the concept of home visits, they do not believe in the inclusion of parents of present and former homemaking pupils in program planning - or they desire further help in applying this. Teachers need help with integration of F.H.A. and home experiences into the homemaking program, planning of conferences with pupils to give individual help, and program interpretation within the school community.

The concepts which have implications for evaluation received responses which indicated that over a third of the teachers desired further help with pupil participation in the evaluative process, group evaluation as well as evaluation of individual progress, evaluation in terms of progress toward goals which had previously been stated, and self-evaluation by the teacher of her own progress.

Some of the conclusions reached as a result of this study of

concepts in home economics education are:

1. In general, high school teachers in North Carolina accept the the concepts that leading home economics educators believe and stress.
2. Teachers believed many of the concepts to be important which educators have stressed for many years, but they expressed a need for further help in applying them. Examples of these were: teacher-pupil planning, program interpretation by teacher and pupils within the school community, and teaching pupils to inductively arrive at their own generalizations and use them in problem solving.
3. There are few significant differences in responses to items among teachers of varying amounts of teaching experience or among teachers having had varying numbers of graduate courses. Since some of the concepts were formulated in recent years in the field of education, it is evident that teachers with long years of experience have acquired their acceptance of them through reading; studying, possibly in summer school sessions; and through in-service training programs.
4. As indicated by their responses to the questionnaire, teachers in high schools do recognize some of their needs for further help. Concepts which were not understood by 10 per cent or more of the teachers were those which also received large responses in Column III, "I attempt to apply this but need further help." There were relatively many responses in Column III.

In order to meet the expressed needs of North Carolina home economics teachers, the use of the findings from this study are recommended for programs designed to encourage growth of teachers. Long-time and short-time goals should be planned so that progress through pre-service and in-service education programs may be continuous.

Recommendations for Further Study

The present study was limited to what high school teachers believed concerning selected concepts accepted as important by authorities in home economics education. Suggestions for other studies to be made toward the overall objective of bringing practice in line with accepted theory are:

1. A study to determine the breadth of content of the home economics program being taught in the North Carolina high schools.
2. A study of evaluative practices used by high school home economics teachers.
3. A study to determine the kinds of help teachers desire most and the kinds of help teachers have found most helpful to them.
4. A study of methods teachers are using to interpret the home economics program to the community.

BIBLIOGRAPHY

BIBLIOGRAPHY

A. BOOKS

- Bayles, Ernest E. The Theory and Practice of Teaching. New York: Harper and Brothers, 1950.
- Dixon, Wilfred, and Frank Massey. Introduction to Statistical Analysis. Second edition. New York: McGraw-Hill Book Company, 1957.

B. PERIODICALS

- Johnson, Hildegard, Louise Lowe, Rebecca Smith, and Vergie Lee Stringer. "Our Educational Beliefs," Journal of Home Economics, 53:175-177, March, 1961.

C. UNPUBLISHED MATERIALS

- Buchanan, Bonnie Belle. "An Analysis of Opinions Concerning Selected Concepts of Home Economics Education." Unpublished Doctor's dissertation, University of Oklahoma, Norman, 1959.
- Coleman, Margaret A. "An Analysis of the Responsibilities of the First Year Homemaking Teacher with Implications for Teacher Education." Unpublished Doctor's dissertation, Teachers College, Columbia University, New York, 1951.
- Grant, Margaret A. "The Preparation of Homemaking Teachers: Ten Years of Experience at the New York State College for Teachers at Buffalo, New York." Unpublished Doctor's dissertation, University of Buffalo, Buffalo, 1951.
- Laws, Ruth Mitchell. "A Study of the In-service Education Needs of Homemaking Teachers in Delaware." Unpublished Doctor's dissertation, Columbia University, New York, 1956.
- Roskie, Gertrude. "The Homemaking Program for Beginning Teachers." Unpublished Doctor's dissertation, Stanford University, Palo Alto, 1953.
- Spillers, Barbara Jeanne. "Problems Recognized by Beginning Vocational Home Economics Teachers in a Midwestern Area." Unpublished Master's thesis, Iowa State College, Ames, 1958.

APPENDIX

- A. Questionnaire
- B. Cover Letter
- C. First Follow-up: Letter
- D. Second Follow-up: Double Postal Card

"THIS I BELIEVE"

Statements such as the ones in this questionnaire are frequently made by educators in the field of home economics. Some of them will seem to you to be unimportant for the classroom teacher. Some of the things you firmly believe are nevertheless difficult to apply in your classroom situation. Please react to each item by placing one check in the column which best represents your response to this statement.

Column I	I do <u>not believe</u> this to be <u>important</u>
Column II	I do <u>not understand</u> this
Column III	I <u>attempt to apply</u> this but need <u>further help</u>
Column IV	I believe I <u>can</u> and <u>do adequately</u> apply this

- | I | II | III | IV | |
|-------|-------|-------|-------|--|
| _____ | _____ | _____ | _____ | 1. Since homemaking is made up of many and varied kinds of activities and responsibilities, the high school homemaking program should include vital experiences in all areas of family living. |
| _____ | _____ | _____ | _____ | 2. Pupils should participate in planning unit goals, experiences which will help them to reach these goals, and methods of evaluating their progress. |
| _____ | _____ | _____ | _____ | 3. Parents of present and parents of former homemaking pupils should participate in planning the homemaking program. |
| _____ | _____ | _____ | _____ | 4. In all areas of the homemaking program pupils should be given opportunities to make individual and group decisions and to evaluate these decisions in terms of their values and goals. |
| _____ | _____ | _____ | _____ | 5. Pupils should be encouraged and guided to evaluate their own progress toward personal goals. |
| _____ | _____ | _____ | _____ | 6. A class should evaluate from time to time its progress toward goals set for the group. |
| _____ | _____ | _____ | _____ | 7. Grades of pupils should be based on how well pupils have attained the objectives which were set up at the beginning of the unit. |
| _____ | _____ | _____ | _____ | 8. A teacher should continuously evaluate her own progress as a person and as a teacher. |

Column I I do not believe this to be important
 Column II I do not understand this
 Column III I attempt to apply this but need
 further help
 Column IV I believe I can and do adequately apply
 this

I II III IV

- | I | II | III | IV | |
|-----|-----|-----|-----|---|
| --- | --- | --- | --- | 9. Home experiences should be interwoven into classwork and all parts of the homemaking program. |
| --- | --- | --- | --- | 10. F.H.A. should be an integral part of the home-making program. |
| --- | --- | --- | --- | 11. Adult homemaking education should be available in each community in which there are high school homemaking classes. |
| --- | --- | --- | --- | 12. Visits should be made to the home of pupils as a basis for program development and for understanding the pupil. |
| --- | --- | --- | --- | 13. The homemaking program should focus attention upon the individual in relation to the entire family. |
| --- | --- | --- | --- | 14. Classroom activities should be provided which can carry over into the pupil's personal and home life. |
| --- | --- | --- | --- | 15. Discussions and other learning experiences in homemaking classes should help pupils to better understand their own behavior and the behavior of other people. |
| --- | --- | --- | --- | 16. The homemaking curriculum at any grade level should help pupils to make a better contribution toward living in their parental family and should help them in their personal growth toward maturity. |
| --- | --- | --- | --- | 17. The homemaking program should deal with attitudes, interests, values, habits, understanding and appreciation as well as abilities. |
| --- | --- | --- | --- | 18. Homemaking teaching should emphasize benefits derived from labor-saving materials and methods. |
| --- | --- | --- | --- | 19. Homemaking teachers should emphasize how the additional leisure time available in our present culture should be used in better personal, family, and community development. |

Column I	I <u>do not believe</u> this to be important
Column II	I <u>do not understand</u> this
Column III	I <u>attempt to apply</u> this but need further help
Column IV	I believe I <u>can</u> and <u>do adequately apply</u> this

I II III IV

- | | | |
|-------|-----|--|
| _____ | 20. | In homemaking teaching, classroom experiences should be geared to customs and practices of the school community. |
| _____ | 21. | Skills, facts, and basic principles should be used <u>in</u> connection with <u>solving</u> immediate problems of pupils. |
| _____ | 22. | The homemaking curriculum at any grade level should start with present needs and interests of the pupils, but must remain flexible to expected change and new needs. |
| _____ | 23. | Pupils should use the problem solving method and be given help in understanding the steps of this method. |
| _____ | 24. | Pupils should be guided into problem situations in the classroom as nearly like those they find at home as possible. |
| _____ | 25. | Broad areas of home responsibility such as relationships, safety, management, and art should be a part of all units of work. |
| _____ | 26. | Pupils should be taught to make the best use of resources in their own homes. |
| _____ | 27. | Pupils should learn in homemaking classes to make good use of such resources of the school as: class time, equipment, money, and special abilities of the group members. |
| _____ | 28. | The homemaking department should be attractive and as homelike as possible while still being effective for use by groups for instruction. |
| _____ | 29. | Classroom instruction in homemaking should be available to boys as well as girls. |
| _____ | 30. | In all areas of the homemaking program pupils should be stimulated to independent thinking. |

- Column I I do not believe this to be important
 Column II I do not understand this
 Column III I attempt to apply this but need
 further help
 Column IV I believe I can and do adequately apply
 this

I II III IV

- | | | | | |
|-------|-------|-------|-------|--|
| _____ | _____ | _____ | _____ | 31. In addition to applying what they believe about home economics to their daily living, homemaking teachers and pupils should interpret the program to the community in a variety of ways. |
| _____ | _____ | _____ | _____ | 32. The homemaking teacher should plan for conferences with pupils to give individual help and counseling. |
| _____ | _____ | _____ | _____ | 33. Pupils should be helped to integrate or synthesize their learning to come to an understanding of the principles involved and to state these principles. |
| _____ | _____ | _____ | _____ | 34. Pupils should be encouraged to apply principles to new situations. |
| _____ | _____ | _____ | _____ | 35. The homemaking teacher should attempt to guide each pupil in such a way that his progress is satisfactory in relation to his initial skill and ability. |
| _____ | _____ | _____ | _____ | 36. A variety of teaching methods should be used. |
| _____ | _____ | _____ | _____ | 37. Democratic procedures should be used in the homemaking classroom. |
| _____ | _____ | _____ | _____ | 38. Teaching methods should be selected on the basis of their effectiveness in bringing about desired pupil development. |

Please write the numbers of the three beliefs stated in this questionnaire which you feel you apply most successfully.

Write the numbers of the three beliefs you feel you apply least successfully.

Place a check in the blank before the response which best describes your training since college graduation.

- Nothing beyond bachelor's degree
- One to five courses
- Six or more courses

Number of years of teaching experience: _____

Won't you please check your paper just to be sure no item has been overlooked or checked more than one time?

THE WOMAN'S COLLEGE
OF THE UNIVERSITY OF NORTH CAROLINA
GREENSBORO

62

SCHOOL OF HOME ECONOMICS

January 31, 1961

Dear Home Economics Teacher:

Yes, before you become involved with school affairs again after the close of first semester, may we ask you for a little help on a research project?

Last year state supervisors and college teachers in home economics education told us what they thought were the most important educational theories or principles to apply in high school home economics classes. This year we would like to learn from you what the teachers themselves believe to be important. Dr. Catherine T. Dennis has given her whole-hearted approval to this study. On the enclosed questionnaire a number of beliefs have been stated so that you can react to them quickly and choose from among them those that you believe to be the most important.

After the data have been summarized, we hope to be able to pinpoint some of the areas where teachers, as a group, have difficulty in putting into practice the things they believe. Identification of these will be of much help to college staff members and state supervisors as they work with future teachers and to supervisors as they plan the state program.

It isn't necessary to sign your name to the enclosed questionnaire. Just so we won't wonder if yours has been returned, would you sign the post card and mail it when you send the questionnaire so that we'll know you have done so? We should like to have this returned by February 15th.

Thank you for your cooperation.



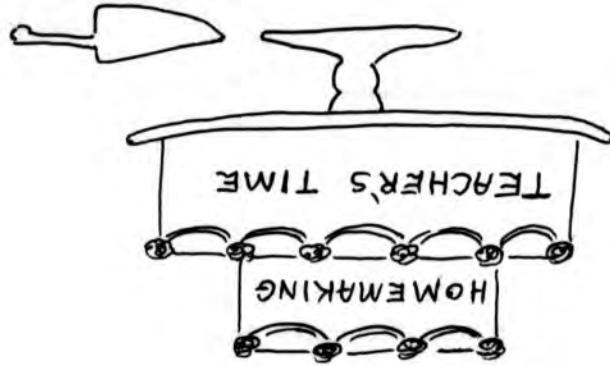
Sincerely yours,

Helen M. Godwin

Helen Godwin
Graduate Student

Hildegarde Johnson

Hildegarde Johnson, Professor
Home Economics Education



"Please, just
a small slice."

Dear Ho

Two we
Do you

Perhaps
slipped
been lo
another

The que
check t
possibl

Thank y

P. S.

SCHOOL OF HOME ECONOMICS



PLEASE HELP SOLVE THIS ONE!!!

February 20, 1961

Dear Homemaking Teacher:

Two weeks ago you were sent a questionnaire entitled "This I Believe". Do you remember?

Perhaps the questionnaire reached you at an "extra-busy" time and has slipped beneath some papers on your desk. Or maybe your copy may have been lost. If lost, please write me a postcard and you will receive another.

The questionnaire may appear lengthy but it doesn't take very long to check the responses. Will you please send it back as quickly as possible?

Thank you for your help.

Sincerely yours,

Helen M. Godwin

Helen M. Godwin
Graduate Student

P. S. Please disregard this if your questionnaire has already been returned.

APPENDIX D: FACSIMILE OF SECOND FOLLOW-UP, A DOUBLE POSTAL CARD

Dear Homemaking Teacher:

Several weeks ago you were mailed a questionnaire entitled "This I Believe." Won't you please take a moment to check the response of the attached postal card which represents your reply?

Thank you very much for helping to make this study a success.

signed

address

Side 1

_____ I have already returned the questionnaire.

_____ Today I am placing it in the mail.

_____ I will plan to respond to the questionnaire within two days and return it.

_____ Something happened to my copy. Send me another and I will respond.

signed

address

Side 2