ABSTRACT
              Under the Kentucky Education Reform Act, public
schools in Kentucky were required to restructure the traditional
kindergarten through third-grade classes into a multi-age and
multi-ability level, ungraded primary program during the 1993-1994
school year. Classrooms that once contained children at relatively
the same age have been replaced with groups of children of varied
ages and abilities; sedentary seat work has been replaced by concrete
learning activities and cooperative learning opportunities; report
cards have been replaced by narrative progress reports, portfolios,
and more frequent teacher conferences with students and parents. A
study assessed teacher perceptions about the effectiveness of the
ungraded primary program as a strategy for educating young children.
It was hypothesized that the program would be perceived positively by
a majority of the primary teachers in one county-wide district. A
total of 37 teachers from 27 schools were surveyed using likert-scale
questions about implementing developmentally appropriate practices
with multi-age and multi-ability groups. Results showed that the
majority of teachers did not appear to have difficulty allowing their
students to learn in a developmentally appropriate manner, and that
they thought the program provided an enjoyable atmosphere for
teachers and students, where both were excited about learning. Some
commented that teaching split grades was more difficult than teaching
in a traditional classroom. Most indicated that the number of
students was too high to successfully implement working with the
students in small groups and in teaching to the whole group. Subjects
were also divided on the use of computers and other technologies in
their classrooms. (HTH)

Developmentally Appropriate Practices in the Primary Program:
A survey of Primary School Teachers

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Public schools in Kentucky were required to restructure the traditional Kindergarten, First, Second and Third grades into a multi-age and multi-ability level, ungraded primary program under the Kentucky Education Reform Act (K.E.R.A.) (Legislative Research Commission, 1990). All Kentucky public schools were required to fully implement this program during the 1993-94 school year (Kentucky Department of Education, 1991).

The implementation of the ungraded primary program will require a great deal of effort and time from primary educators. Classrooms that once contained children that were relatively the same age have been replaced with groups of children of varied ages and abilities. Ditto pages and sedentary class work have been replaced by concrete learning activities and cooperative learning opportunities. Report cards have been replaced by narrative progress reports, portfolios, and more frequent parent-teacher and student-teacher conferences.

The Central Kentucky Cluster of School Districts (1991) stated that the implementation of the ungraded primary program will "...considerably effect the philosophy of teaching, school organization, assignment of students, teaching strategies, curriculum, student assessment, instructional planning and management, and parental involvement (Central Kentucky Cluster of School Districts, 1991, p. 2)."

Statement of the Problem

The purpose of this study was to assess teacher perceptions pertaining to the effectiveness of the ungraded primary program as a strategy for educating young children in Kentucky's Public Schools. The focus of the study was placed on teacher attitudes towards multi-age, multi-ability grouping and on developmentally appropriate practices for working with students in the ungraded primary program.

Definitions

The ungraded primary program was defined as a multi-age, flexible system of grouping children where much emphasis is placed on the accommodation of individual differences in children (Kentucky Department of Education, 1991).

Developmentally appropriate practices was defined as procedures which are consistent with the developmental needs of young students and accommodates their social, physical, emotional, intellectual and artistic needs (Kentucky Department of Education, 1993).

Statement of the Hypothesis

Research suggests that the ungraded primary program is an effective strategy for educating young children. Therefore it is hypothesized that the implementation of developmentally appropropriate teaching practices for working with children in multi-age, multi-ability groups in ungraded primary

programs will be perceived positively by a majority of Fayette County Public School Teachers.

Review of Related Literature

Pavan (1992) studied standardized achievement test scores of children obtained from 57 research studies conducted between 1968 and 1990. The scores of the children in non graded primary classrooms were compared with the scores of children in traditional classrooms. The study indicated that a majority of non graded groups perform better or as well as traditional groups on standardized achievement tests.

Other research (Martin & Pavan, 1976) concluded that classroom grouping with varied age levels promoted social growth, positive attitudes and more academic growth in young children. Goodlad et. al. (1987) stated that primary schools allow for individual differences in children; ungraded primary programs allow for the individual to intellectually develop at a rate that is appropriate for them.

The Central Kentucky Cluster of School Districts (1991) investigated and developed a framework for the implementation of the Primary Program in compliance with K.E.R.A. The rationale for the development of the ungraded primary program was to make education a more holistic experience for children, allow children to make continuous progress in the classroom, provide appropriate social settings for children, foster more

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positive attitudes in children, and provide increased opportunities for children to learn by actively experiencing their environment (CKCSD, 1991).

Hayden and King (1974) concurred with the CKCSD rationale, but included the following advantages: non graded programs provide more opportunities for individual instruction, alleviate retaining a child in a grade, elimination of boredom, and provide more opportunities for the child to succeed in school.

Even though there have been favorable views of the ungraded primary program, some barriers have been identified by an informal survey conducted by the Kentucky Department of Education (1992). The barriers identified included: inadequate training of primary teachers prior to placement in primary classrooms, confusion with assessment and exit criteria, poor attitudes of teachers, administrators and parents, teacher stress, inadequate materials/furniture, and lack of focus on learning goals. Hayden and King (1974) listed disadvantages of ungraded classrooms which were similar to the Kentucky Department of Education (1992) survey.

Summary of Literature Review

Several studies suggest that the ungraded primary program is an effective strategy for educating young children. Allowance for differences in children's learning styles, elimination of boredom, and increased opportunities for children to experience success in school are some of the

advantages of implementing an ungraded primary program.

Other studies indicate that lack of adequate training, confusion in determining grading and exit criteria, poor parent and teacher attitudes towards the ungraded primary, and teacher stress are among the barriers preventing successful implementation of the ungraded primary program in Kentucky's public schools.

METHOD

Subjects

The subjects of the study were primary teachers in the Fayette County Public School System. Two primary teachers from each of the thirty-two public schools in Fayette County were selected according to random sampling guidelines. Out of a total of sixty-four teachers, thirty-seven teachers from 27 Fayette County public schools participated in the study. Teacher experience ranged from three to 34 years. The average years of teaching experience was 15.7 years. Thirteen teachers had less than ten years experience; 13 of the teachers had 11 to 20 years of teaching experience, ten teachers had 21 to 30 years of teaching experience; and one teacher had over 30 years of experience in teaching.

Thirty five percent of the teachers participating in the study had a Bachelor's Degree in Education, 49% had obtained a Master's Degree, and 16% of teachers had obtained Rank 1 status (15 hours beyond a Master's Degree).

Instrumentation

A survey was devised for the study. The survey contained items pertaining to suggested practices outlined by the Kentucky Department of Education (1993). The survey focused on implementing developmentally appropriate practices with multi-age and multi-ability groups. The survey contained likert-scale questions with a comment area for teachers to make additional notes.

The items for the Developmentally Appropriate Practices Survey (DAPS) were based on regulations and guidelines provided by the Kentucky Department of Education (1993). According to these guidelines, primary programs are required by law to provide a curriculum which is consistent with the developmental needs of students, and accommodates the social, emotional, physical, intellectual and artistic needs of students, and allows progress at individual rates. Implementation of this philosophy included the following suggestions:

- allow the child to explore the environment through concrete interactions

- integrate the curriculum by usage of theme units/projects

- utilize whole language experiences, integrated reading and language arts

- integrate writing across the curriculum

- utilize manipulatives, multi-sensory materials and technology

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- plan cooperative learning experiences

- utilize learning centers in the classroom to emphasize concepts

- use child-initiated activities

- use teacher-directed activities

- provide experiences which emphasize varied learning styles and
  multiple intelligences

- focus on the six learning goals: communication, basic skills, self-
  sufficiency, cooperation in groups, higher thinking skills, apply
  learning to real-life situations

- allow children to experience a variety of cultures

- allow the children to learn in a manner which is developmentally
  appropriate

Additionally, the Kentucky Department of Education requires that

primary students be grouped according to differing abilities and ages; and

students may remain with the same teacher for longer than one school year.

Suggested procedures for grouping children in primary programs included:

- problem solving & cooperative learning groups

- grouping according to instructional need

- grouping for reinforcement of skills

- interest groups

- peer tutoring groups

- grouping according to multiple intelligences

Design

Two primary teachers from each public elementary school in Fayette County were selected by random sampling procedures to participate in the survey. The participants received a Developmentally Appropriate Practices Survey (DAPS) by mail. The returned surveys were analyzed to assess how the teachers perceived the effectiveness of multi-age, multi-ability grouping in primary classrooms.

Procedure

Sixty four teachers received an introductory letter and the Developmentally Appropriate Practices Survey (DAPS). Thirty seven teachers returned the survey yielding a return rate of 57.8%. Twenty seven of the 32 public elementary schools in Fayette County were included in the study. Community, rural and inner city public schools were represented in the study.

Results

The results of the study are displayed in tables 1.1 and 1.2. A majority of the teachers responding to the survey indicated that children in their classrooms were learning through direct interaction and discovery activities. Additionally, the teachers indicated that thematic units and activities were being utilized in their classrooms. The majority of respondents indicated that reading and writing were integrated with other subject areas. All of the teachers were utilizing multi-sensory materials in their teaching. Most of the

teachers agreed that there were opportunities for children to learn through teacher directed instruction and child-directed activities. Teachers agreed that activities were planned with consideration to multiple intelligences and learning styles. The teachers responding to the survey agreed that students were exposed to a variety of cultural experiences. Most of those surveyed indicated that the six goals of K.E.R.A. were occurring in the classroom. The majority of teachers indicated that a variety of grouping strategies were occurring in the classroom.

Teachers were divided as to the usage of computers and other technologies in their classrooms. Teachers were divided on the usage of learning centers in the classroom. The majority of teachers indicated that the number of students in their classrooms inhibited small group instruction and that working in small groups was not manageable. Additionally, a majority of teachers indicated that the number of students in the classroom inhibited whole group instruction. Teachers commented that there were too many students per classroom and not enough adults to implement work in small groups or maintain the attention of the whole group. Some teachers commented that it was difficult to instruct varied attention spans, while others commented that age differences made no difference at all, as there are differences in ability in any classroom.

Among the stronger points of primary grouping, teachers indicated that the primary program provided an enjoyable atmosphere for teachers

and children, where both are excited about learning. Team teaching provided teachers with a variety of resources and experiences to draw upon when teaching young children. Placing students with the same teacher over a period of years provided continuity and stability. Several teachers indicated that labelling of children was reduced and mainstreaming of special education students is beneficial.

Some teachers commented that teaching split grades was more difficult than teaching in a traditional elementary classroom. One fourth of the primary teachers surveyed stated that they did not have enough help to implement working in small group settings or to maintain the attention of the whole group. Some teachers indicated that they were inadequately prepared for working in the ungraded primary school.

Discussion/Conclusions

The majority of teachers participating in the survey did not appear to have difficulty allowing their students to learn in a developmentally appropriate manner. The use of multi-sensory materials, hands-on exercises, whole language experiences and integration of curriculum have all been tried by a majority of teachers participating in the survey.

There were two areas of concern based on the results of the study. A majority of teachers indicated that the number of students was too high to successfully implement working with the students in small groups and in teaching to the whole group. Young students need additional adult supervision and guidance to ensure the success of the small group activities. One teacher cannot be expected to adequately provide feedback, reinforcement and guidance to 24 students ages five to eight years in the same classroom. In order to alleviate this problem, one of two things must occur. Either the classroom size of 24 students to one teacher (Kentucky Department of Education, 1993) needs to be lowered or more teachers, aides or volunteers are needed to help in the classroom. If the teacher-student ratio does not change, then volunteers are needed to make working in small groups and whole groups manageable. Parents are a valuable resource and are too often overlooked when trying to find adequate help for classrooms. Teachers need to welcome parental participation in their classrooms. Primary teachers need to be able to instruct parents in assisting in their classrooms so that the objectives of small group and whole group work are met.

Secondly, the primary teachers surveyed were divided on the use of computers and other technologies in their classrooms. It is imperative that young children experience practical applications of computers in the classroom. In order to compete in the employment market of tomorrow, children will need a working knowledge of computer technology. Since the

use of computers in the classroom environment is a relatively new concept in education, it is a possibility that veteran teachers have not received training in using computers and cannot implement the technology in their curriculum. It is also possible that there is no computer in the classroom to be used by primary students. Administrators, teachers and parents can work together in order to obtain computers for primary classrooms. Computers can be obtained by fundraising efforts, donations, and by making allotments in the school's operating budget for the purchase of computers.

In order to solve these and other difficulties primary teachers face in primary classrooms, teachers, parents and administrators must be willing to work together as a team for the benefit of the students. There is much research needed to analyze the ungraded primary school and others areas of K.E.R.A. legislation and implementation. In order to identify problem areas and strengths, teachers from all regions in Kentucky need to provide their perceptions and assessments of curriculum guidelines. In this manner the primary program can be monitored and modified as necessary.

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Table 1.1 <u>Developmentally Appropriate Practices Survey (DAPS) Results - Continued</u>
N = 37

Question	Strongly Disagree	Disagree	Somewhat Agree	Agree	Strongly Agree
The number of students is low enough so that working in small groups is manageable.	35	16	19	16	14
The number of students in a class does not inhibit whole group instruction.	38	24	5	19	14
The differing ability levels of students does not inhibit workin_ 'n small groups.	14	16	19	32	19
The differing ability levels of students does not inhibit whole group instruction.	16	16	30	22	16
Planned activities emphasize basic skills.	0	5	22	54	19
Planned activities allow adequate communication between students.	0	0	17	44	39
Planned activities allow adequate communication between teacher & students.	0	6	17	33	44
Planned activities allow opportunities for higher thinking to occur.	0	5	16	41	38
Planned activities/units emphasize applying skills to real-life situations.	0	6	14	33	47
Planned activities allow children to become self sufficient.	0	3	19	38	41
Planned activities provide opportunities for students to cooperate as a group.	0	0	14	38	49
Peer tutoring occurs in the classroom.	0	0	30	27	43
Learners who need additional instruction may be grouped together as necessary.	5	3	22	22	49

Table 1.1 - <u>Developmentally Appropriate Practices Survey (DAPS) by Percent Results</u>
N = 37

Question	Strongly Disagree	Disagree	Somewhat Agree	Agree	Strongly Agree
Planned Activities allow the child to be directly involved through interaction exploration and discovery.	0	3	8	27	62
The classroom curriculum is integrated through thematic units and projects.	0	2	8	41	49
Whole Language experiences are implemented in the room.	0	0	3	27	70
Reading is integrated with other subjects	0	0	2	30	68
Writing is integrated across the curriculum	0	0	0	24	77
Planned activities involve a variety of manipulatives & multisensory materials	0	0	8	30	62
Computers & other technologies are utilized in the classroom	8	5	30	32	24
There are learning centers emphasizing concepts learned in the classroom	8	2	14	41	35
There are many opportunities for the children to learn through child directed activities.	3	0	19	30	49
There are many opportunities for the students through teacher directed activities.	0	0	11	46	43
Planned activities take into account multiple intelligences and learning styles of students.	0	0	11	41	49
Activities expose students to a variety of cultural experiences.	0	3	16	41	41
The classroom environment is consistent with the developmental levels of students.	0	0	8	28	64

Table 1.1 <u>Developmentally Appropriate Practices Survey (DAPS) Results - Continued</u>
N = 37

Question	Strongly Disagree	Disagree	Somewhat Agree	Agree	Strongly Agree
Problem solving groups permit students to work together to formulate plausible solutions.	3	3	14	35	46
Pupils may be grouped according to instructional need.	5	3	22	30	41
Students are given opportunities to utilize multiple intelligences (mathematical, social, linguistic) in group situations.	0	3	16	43	38

Table 1.2 - <u>Teacher Comments on Strengths and Weaknesses of Primary Grouping</u>

Strengths:

- Thematic Teaching

- Writing across the curriculum

- Mainstreaming beneficial

- enjoyable atmosphere

- teachers and students excited about learning

- flexible grouping

- fosters self efficiency in students

- team teaching helps provide a variety of ideas, materials, experiences

- parental involvement beneficial

- continuity of being placed with the same teacher over a period of years

- labeling reduced

Weaknesses:

- Older children do not like tutoring younger students

- Teaching split grades is more difficult

- Teacher Frustration Level Higher

- Discipline Problems

- 1/4 of the teachers surveyed indicated they did not have enough help in the classroom

- Number of Students per classroom is too high

- hinders younger students

- differing attention spans make teaching difficult

- special education students seem to have more difficulty

- unable to meet expectations of the program due to inadequate preparation, etc.