AN INQUIRY INTO THE CREATIVITY OF
PRESCHOOL AND PRIMARY GRADE CHILDREN

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by
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I recommend this thesis for acceptance for graduation with honors.

[Signature]

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# TABLE OF CONTENTS

<table>
<thead>
<tr>
<th>CHAPTER</th>
<th>PAGE</th>
</tr>
</thead>
<tbody>
<tr>
<td>I. THE PROBLEM AND DEFINITIONS OF TERMS USED</td>
<td>1</td>
</tr>
<tr>
<td>The Problem</td>
<td>1</td>
</tr>
<tr>
<td>Statement of the problem</td>
<td>1</td>
</tr>
<tr>
<td>Importance of the study</td>
<td>1</td>
</tr>
<tr>
<td>Definitions of Terms Used</td>
<td>3</td>
</tr>
<tr>
<td>Creative expression</td>
<td>3</td>
</tr>
<tr>
<td>Creative thinking</td>
<td>3</td>
</tr>
<tr>
<td>Creative process</td>
<td>3</td>
</tr>
<tr>
<td>Organization of the Study</td>
<td>4</td>
</tr>
<tr>
<td>II. REVIEW OF RELATED LITERATURE</td>
<td>5</td>
</tr>
<tr>
<td>The Nature of Creativity and its Components</td>
<td>5</td>
</tr>
<tr>
<td>Research Related to Creativity in Young Children</td>
<td>9</td>
</tr>
<tr>
<td>Summary</td>
<td>20</td>
</tr>
<tr>
<td>III. TEACHING FOR CREATIVITY</td>
<td>21</td>
</tr>
<tr>
<td>Can Creative Thinking Be Taught?</td>
<td>21</td>
</tr>
<tr>
<td>Suggestions For Parents and Teachers</td>
<td>22</td>
</tr>
<tr>
<td>Guidance Roles</td>
<td>26</td>
</tr>
<tr>
<td>IV. CONCLUSIONS</td>
<td>27</td>
</tr>
<tr>
<td>BIBLIOGRAPHY</td>
<td>32</td>
</tr>
</tbody>
</table>
CHAPTER I

THE PROBLEM AND DEFINITIONS OF TERMS USED

During the past several years creativity has become a topic of major interest in educational literature and discussions. Educators have come to believe that creativity and originality need to be fostered and encouraged in order to better prepare the nation's children and youth for the complex world of which they will be a part. The realization that, as a general rule, originality has been and is being repressed in our schools has caused concern. Conformity has been found to be the major value.

I. THE PROBLEM

Statement of the problem. It was the purpose of this study to determine how creativity develops in the preschool and primary grade child and to suggest how parents and classroom teachers may aid the child in developing and maintaining his creativity.

Importance of the study. The importance of encouraging creativity has recently begun to receive widespread publicity. It is now realized that the act of creation contributes to the development of a healthy, well-rounded personality.

The place of creative thinking in the elementary
school needs to be considered. Schools have been more concerned with preserving the nation's culture than in contributing to it. There has been an overemphasis on memorization with a resulting neglect in teaching pupils to think critically and creatively. Attitudes, concepts, and appreciations cannot be memorized. They result when a person assimilates and evaluates his experiences.\(^1\)

Everyone possesses to some degree the ability involved in being creative. This ability can be increased or decreased by the way children are treated. Therefore, it is a legitimate function of the home and the school to provide the experiences and guidance which will enable the children to achieve their greatest creative potential. The way children pursue their creative ability and the tendency to give up or continue the search for creative expression is largely a matter of the way their needs are handled by their parents and teachers.\(^2\)

There have not been many studies dealing with creativity in young children. Most experimenters seem to concentrate on older individuals. Also lacking have been

\(^1\)James A. Smith, "Teaching Creative Thinking," \textit{Frontiers of Elementary Education IV} (Syracuse, New York: Syracuse University Press, 1957), p. 76.

suggestions for parents and teachers for how to best encourage the child.

II. DEFINITIONS OF TERMS USED

Creative expression. Creative expression may be defined as the production of something new, unique, or not previously existent.3

Creative thinking. Torrance defines creative thinking as "the process of sensing gaps or disturbing, missing elements; forming ideas or hypotheses concerning them; testing these hypotheses; and communicating the results, possibly modifying and retesting the hypotheses."4

Creative process. Many writers have tried to describe the creative process, and these descriptions show a great deal of agreement. Most analysts (Wallas, 1926; Patrick, 1955) identify four steps: preparation, incubation, illumination, and revision. Apparently the process flows something like the following. First, there is the sensing of a need or a deficiency, random searching, and a clarification of the problem. There follows a period of reading, discussing, searching, and formulating many possible

3Smith, op. cit., p. 75.
4Torrance, op. cit., p. 16.
solutions to the problem. These solutions are analyzed for advantages and disadvantages. Out of all this comes the birth of a new idea. Finally, there is experimentation to determine which of the possible solutions is the most promising for the perfection of the idea. Such an idea may result in inventions, scientific theories, improved products or methods, novels or other writings, musical compositions, paintings, or new designs.5

III. ORGANIZATION OF THE STUDY

This study was developed around the nature of creativity and how it is developed in the child of preschool and early elementary school age. Also considered was the question of how parents and teachers can best contribute to the development of the creative potential of their children and pupils.

5Torrance, op. cit., p. 17.
CHAPTER II

REVIEW OF RELATED LITERATURE

This chapter will review the literature pertinent to the study of the nature of creativity and its components. Secondly, research relating specifically to creativity in young children will be investigated.

I. THE NATURE OF CREATIVITY AND ITS COMPONENTS

Many authorities believe that creative talent is to be accounted for in terms of high intelligence or IQ. Guilford, however, held this conception to be inadequate and greatly responsible for the lack of progress in understanding creativity. He found that the factor analysis conception of personality led to a new way of thinking about the creative process. According to this point of view, creativity represents patterns of primary abilities. These patterns can vary with different spheres of creative activity. Each primary ability is a variable along which individuals differ as on a continuum. Guilford proposed that a successful exploratory approach to the various aspects of creativity could be achieved through an application of factor analysis to the problem. The study was begun with carefully considered hypotheses concerning the
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possible primary abilities and the properties of each. He hypothesized that certain kinds of factors would be found, including sensitivity to problems, ideational fluency, flexibility of set, ideational novelty, synthesizing ability, analyzing ability, reorganizing or redefining ability, span of ideational structure, and evaluating ability.¹

Subsequent research has borne Guilford out in most of his hypotheses, with the exceptions of the synthesizing and analyzing abilities.²

Lowenfeld reported the basic findings of seven years of research on creativity by the Department of Art Education of Pennsylvania State University. The study was an attempt to find criteria which might significantly differentiate between creative and less- or non-creative people in the arts. The study was compared with that of Guilford and his staff at the University of Southern California. The two studies came up with eight similar criteria which it was believed did differentiate between the creative and the less- or non-creative individual.


These criteria are:

1. Sensitivity to problems.
2. Fluency of ideas.
3. Flexibility.
4. Originality.
5. Redefinition and the ability to rearrange.
6. Analysis or the ability to abstract.
7. Synthesis and closure.
8. Coherence of organization.

The last four items were named differently in the two investigations. After close study, it has been found that they tested similar attributes. ³

Strang listed twelve suggested major characteristics of the creative person. These are:

1. Sensitive perception of details in the world of nature and the world of man.
2. Awareness of, and concern about, unsolved problems.
3. Fluency of thought.
4. Concentration.
5. Integration.
6. Flexibility and spontaneity guided by a goal or purpose.
7. Originality and individuality.
8. Ability to analyze and abstract, and also to synthesize.
9. Ability to go beyond the facts and discern new implications, to imagine more than the evidence obviously shows, to speculate on relations that may not at present be verifiable.
10. Keen satisfaction in creative activities.
11. Superior abstract and verbal intelligence.
12. Motivation, character traits, and emotional factors as well. ⁴


In addition to studies concerning the nature of creativity, several writers have stated what they feel is necessary as a part of the creative individual's environment.

According to Wilt, a child must have a rich experiential background and rich sensory experiences in order to be able to create. In addition he must have exposure to great art in all its forms in order to develop respect for original ideas and for the self-discipline which is necessary if a person is to create. He must be exposed to the work of other children, and he must have ample opportunities to discuss ideas and to express himself in oral language.5

In order to think creatively each child must identify himself with his own experiences. He must experience intensely. The easier it is for him to become involved in any given situation, the higher is his motivation to create from it.6

Creative production seems to depend upon a background of related experiences, the development of an urge to express oneself, the accessibility of a wide variety of materials, ample time, a permissive atmosphere for creative work, and a teacher who has had experiences in


6Smith, op. cit., p. 76.
creative activities.7

It is now generally assumed that all individuals, especially children and youth, have some degree of creativity in one or more of a wide range of activities. The highly creative person possesses special sensitivity and a superior quality of mind which relates and organizes experiences.8

II. RESEARCH RELATED TO CREATIVITY IN YOUNG CHILDREN

Krishnaiah conducted sociometric studies of creative individuals as one approach to the study of peer sanctions against highly creative persons. The sociometric data were obtained in thirty-three classrooms in four schools. Children were asked to nominate three classmates in each category: best friends, those who most aggressively state their ideas, those who have the most good ideas, those who think of the most ways to be naughty, those who think of the most wild or silly ideas, and those who hold back their ideas. Some of the general trends of the study can be summarized by grade levels.

In the first two grades there was a general tendency for pupils with moderate creativity scores to be chosen frequently on the good-ideas criterion; whereas highly


8Strang, op. cit., p. 20.
creative boys in particular were chosen as having silly and naughty ideas to a marked degree. Otherwise, there were few consistent patterns. In general, it was observed that children in these grades are able to perceive the same child as having good, naughty, and silly ideas.

Highly creative girls tended to be chosen frequently on the good-ideas criterion in the third grade but the boys did not fare as well. The most often chosen children on this criterion tended to nominate one or more of the most creative but not frequently chosen children. In most cases, pupils nominated as having ideas for being naughty or having silly ideas were not chosen on the good-ideas criterion.9

McMillan identified three stages in the development of the imagination. During the first stage, the young child has a sense of beauty which serves as a sort of shortcut to knowledge. As she says, "the city of gold with pearly gates, with crystal fountains and unblackened skies" is real to the child at this time. In the second stage, he comes to grip with the realities of life. He begins to inquire into the reasons for things and to ask "why there are so many streets that are not golden, so many fountains

that are turbid with filth, and so many skies that are blackened all the time." During the third and final stage, he begins to figure out for himself the ideal of his first vision of the world.\(^\text{10}\)

Andrews used a variety of methods and observations in attempting to study a variety of types of imaginative and creative activity. He presented three tests tachistoscopically with the task one of forming new products (transformations). He observed the following kinds of imaginative play in children from two to six years of age: imitation, experimentation, transformations of objects and animals, acts of sympathy, dramatizations, appropriate quotations, leadership with plan, and aesthetic appreciation.\(^\text{11}\)

Andrews discovered that total imaginative scores were highest between the ages of four years and four years, six months. There was a sudden drop at about age five when children enter kindergarten. The peak of the ability to redefine, restructure, and recombine was reached between three and four years. From then on it decreased. Analogy reached a peak during the fourth year and then declined during the fifth year. "Don't know" responses decreased

\(^{10}\)Torrance, *op. cit.*, p. 36.

\(^{11}\)Ibid., p. 25.
steadily with chronological age up to five years when they started to increase. The more creative types of imagination reached a high point from the ages of three years and a half to four years and a half. Their lowest ebb was found to occur during the fifth year.12

Andrews also described some of the unpublished work of Martha Beckman Ransohoff. She used a series of standardized inkblots and a picture test as stimuli for her study. The pictures for the test were taken from current magazines and were "typical of modern advertising art." Her methods of assessing responses reflected what Torrance believed to be serious misconceptions regarding the nature of creative imagination. Answers to the pictures were scored in terms of accuracy on a scale ranging from zero to two. In evaluating the inkblot test, she gave the top score to those children who responded with the same answer five times out of five. Torrance stated that these would both appear to be measures of convergent thinking. It is therefore not surprising that she concluded that the imagination of young children increases with age. Her study included only twenty-two children.13

Markey found that the total of imaginative behavior

12Ibid., p. 86.
13Ibid., p. 25.
increased with age throughout the preschool period. She employed methods of observation to evaluate the performance of children on various standardized tasks, such as a housekeeping game, the fanciful naming of visual stimuli, leadership in imaginative play, and block-building. She concluded that no single test taps all of a child's imaginative abilities and that the same test is not equally valid at various age levels. She felt that the younger children made better scores on the housekeeping game because they were more interested in that type of activity. The older children were more apt to respond to the visual stimuli in realistic terms because they knew the correct terms for the items.  

Grippen's study included children's paintings and their verbalizations while they were painting. He found the following to be sources of children's imaginative ideas: incidents in their immediate environment, physical aspects of the environment, books, magazines, pictures, and their experiences with travel. He concluded that "except in rare instances creative imagination does not function in children below the age of five years, but some children at the age of five exhibit a degree of it comparable to children seven years old." Grippen's study was limited to forty-eight subjects.15

15Ibid., p. 24.
Ruth Griffiths identified eleven stages in the creative drawings of children. She felt that these somewhat parallel the development of the imagination of the young child. These stages are:

1. A stage of undifferentiated scribble.
2. Rough geometrical shapes, usually circles and squares, with names such as doors, windows, apples, applied.
3. Making of additional objects by combinations of lines and squares and by single circles.
4. Combinations of circles and lines to make many other objects, with human figure as one of the prime interests.
5. Juxtaposition of many objects rapidly drawn and named.
6. Concentration on one object at a time, bolder work, care taken, and degree of detail present.
7. Further juxtaposition, but clear subjective association, work recognizable.
8. Partial synthesis, some items being shown in definite relationship to each other.
9. Pure picture, one picture only.
10. Multiplication of pictures, joy of representation.
11. Development of a theme by means of a series of pictures.\(^\text{16}\)

McDowell and Howe found that among children of two to four years of age IQ was correlated positively with the degree of creative use of certain play materials (blocks, clay, and paints).\(^\text{17}\)

There is rather general agreement that the years of elementary school are critical in the development of creative talent. The rise and decline of the child's creativity during this period have been noticed and regretted by many educators.

\(^{16}\text{Ibid.}, \text{p. 87.}\)

\(^{17}\text{Ibid.}, \text{p. 26.}\)
More varied materials and methods have been used in studying the creative powers of children during the elementary school period than during the preschool years. This is possible because of the child's increased ability to communicate through speech and writing.

Typical of many of the early efforts was Kirkpatrick's work with four inkblots. He reported that children in the first three grades are more imaginative than those in grades four, five, and six. He found an increase in imagination in seventh and eighth grade students.\(^\text{13}\)

Colvin used composition, noticing invention, sense of humor, feeling, and imaginative and perceptive power. Simpson used fifty sets of four small dots, representing the four corners of squares. These served as stimuli for drawings. He assessed fluency, originality, and flexibility. Harms used a test requiring the subjects to represent words (mostly various actions) by the use of single lines. Stephenson used a Poetry-Writing Test and an Art Form Test.\(^\text{19}\)

Mearns maintained that it was common knowledge that creative activity enjoys free expression in the first three grades with some freedom remaining in grades four and five. He stated that there was a rapid decline in grades six and seven and that eighth graders enjoy creative

\(^{18}\text{Ibid.}, p. 91.\)

\(^{19}\text{Ibid.}, p. 28.\)
expression in secret but eventually give it up. He felt that it could be revived at any time.²⁰

Barkan made a number of interesting observations concerning the development of creativity. He observed a small number of elementary art teachers. He found that children show greater spurts of growth at some ages than at others. The amount of growth from first to second grade seemed to be more dramatic than that from kindergarten to first grade. He stated that the intense curiosity of second-graders about the "why" and "how" of things changed into a concentrated quest for explanations among pupils in the third grade.²¹

Torrance conducted a study which revealed that when children first begin to notice sex differences—some activities are suitable only for boys and others only for girls—their ability to think creatively takes a sharp drop. Usually this is around the age of five when the child enters kindergarten. Another drop in the creative powers of American children occurs at about the end of grade three or the beginning of grade four—about age nine. It is believed that this drop may be due to increased desire for peer acceptance and approval which comes at

²⁰Ibid., pp. 91-92.
²¹Ibid., p. 92.
about this age. 22

In another study, Torrance discovered three characteristics which seemed to stand out among creative children. He compared the most creative boy and girl in several classrooms with classmates who had the same measured IQ. There was a tendency for the creative children to have a reputation for wild and silly ideas. This was especially true of the boys. The work of the creative children was characterized by a large number of ideas "off the beaten track." Their drawings were characterized by playfulness and humor. 23

Developers and users of imaginative and creative thinking tests for children in elementary school have consistently found little or no relationship between the scores on these tests and the scores achieved on tests of intelligence. 24

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As a part of the Union College Character research Project, Ligon attempted to establish age-level characteristics for the development of the imagination from birth to age sixteen.

Birth to age two. Ligon maintained that children begin developing their imagination during their first year of life. The child questions the names of things and begins to attempt to reproduce sounds and rhythms that he hears. When he creates something, he generally names it after its completion, rather than before. He begins to anticipate daily routines, and by the time he is two, he has begun to look forward to special events. He is eager to experience everything through the mediums of touch, taste, and sight. He is very curious, but each child expresses this curiosity in a different way.

Ages two to four. During the time from two to four the child learns about the world through direct experience. He then repeats his experiences in verbal and imaginative play. He is thrilled about the wonders of nature. He continues to be curious about his environment and he often asks questions which are embarrassing to adults. Fearful experiences are likely to shake the child's confidence in new discoveries. The child often overreaches his capacities and is likely to respond with anger when he is frustrated.
Ages four to six. Ligon and his associates say that most children from four to six years of age have a good imagination. They make no statement about a decline in the imagination at about the age of five. During this time the child first learns the skills of planning. He begins to enjoy planning anticipated play and "work." He learns adult roles and experiments with many types of roles through his imaginative play. He becomes able to relate isolated events, although he may not understand the reason for the relationship. At this age, he begins to become aware of the feelings of others and considers how his actions will affect them.25

Ages six to eight. According to Ligon, the creative imagination of the child takes a turn toward realism between the ages of six and eight. He tries to reproduce details, even in play. Drawings become more representative, although the tendency is to draw what one thinks, rather than what is seen. Curiosity continues to develop, unless it is severely restricted by adults.26

Torrance states that it has been his observation that many children in the first and second grades reject

26Ibid., p. 96.
all fantasy and are very impoverished in the realm of the imagination.27

III. SUMMARY

This chapter has presented a review of the major literature relating to the nature of creativity. Creativity as found in the young child has been emphasized. From the review the following conclusions are relevant to the present investigation:

1. Creativity is a process that can be divided into component parts.
2. Environment is a very important influence on the development of creativity in children.
3. The preschool period and the primary grades are of vital importance if creativity is to be developed.
4. Parents and teachers in working with children need to be aware of the stages children follow in learning to think creatively.

27Ibid., p. 96.
CHAPTER III

TEACHING FOR CREATIVITY

This chapter will present guidelines and suggestions for parents and teachers to follow in attempting to help their children and pupils develop their creative potential as fully as possible.

I. CAN CREATIVE THINKING BE TAUGHT?

If creative thinking results in something new and unique, parents and teachers need to be concerned with the best methods for encouraging children to come up with new ideas, new ways of communicating, new ways of problem-solving, and new ways of self-expression. Can creative thinking be taught? Findings in this area are rather scarce, but there are indications that creative thinking can be successfully taught. A few criteria have emerged from the research as guides for such teaching:

1. Creative activity follows developmental stages. Whether the child is working or playing with paint, clay, blocks, rhythms, words, or other children, he tends to manipulate and explore any particular media first, then to experiment or communicate with it, and finally to gain aesthetic satisfaction from his use of it.

2. Creative thinking and self-expression is a normal characteristic of desirable living.

3. Creative production requires an environment which expects and encourages it.

4. Creative thinking is no sudden burst of insight; it requires carefully planned techniques to bring it about.

5. Creative thinking can never be considered
a purely intellectual process for it involves emotional and personal factors as well.

6. Creative thinking results from the related experiences and concerns of children.

7. Creative thinking develops or results from an urge or need to express oneself.

8. There is no one way to think creatively; the process differs from person to person and problem to problem.

9. Creativity in all forms depends upon interrelated factors of heredity, background, training, and temperament.1

Burton has also listed a few guides as important general characteristics of creative activity:

1. Creative expression is uncertain at any one time; it comes or it does not come.

2. Creative expression is easily stimulated, repressed, or destroyed with finality in little children.

3. Creative expression is favored as a rule by freedom from compulsion, but this is not universal.

4. Creative expression is aided by order and regularity of effort once production is under way; by a place and facilities for work.

5. Creative periods of work are marked by intense concentration and absorption; sometimes by complete dissociation.2

II. SUGGESTIONS FOR PARENTS AND TEACHERS

In his Union College Character Research Ligon made suggestions to parents as to how they could best encourage the growth of creativity in their children. From birth to

1Smith, op. cit., p. 77.

age two, creative growth can be stimulated in a variety of ways. Imagination can be stimulated by such things as dolls, large blocks, and simple games. The child's desire to explore should be encouraged by making his environment safe for him to do so. It is suggested that parents play simple games with children this age. Parents should enjoy the child's verbal play and accept without question his names for his creations.

Ligon and his associates suggested that the two-to-four year old be provided with toys which can "become" a number of things. They pointed that blocks or clay can stimulate more imagination than structured toys can. Parents should encourage children to do things on their own as much as possible. The child's curiosity can be encouraged by being delighted with him over the new things he discovers or creates.

Confidence during the four to six year period can be developed through creative arts, word games, and new experiences of various types. Children's creations should not be evaluated by adult standards. Children should be permitted to contribute their own ideas in planning sessions. It is important that their questions receive simple but direct and honest answers.3

Ligon recommends the encouragement of role-playing and participation in adult activities during the period from

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3 Torrance, op. cit., pp. 87-89
six to eight years of age. It is important that children be allowed to continue as long as possible without help on their various projects. Successful efforts should be displayed. It is important that adults continue to answer questions impartially and directly.4

Strang also offers suggestions for the encouragement of creativity. The influence of the attitude of the child's culture toward creativity must be recognized. Creativity requires quiet for contemplation, a democratic home and school atmosphere, and good timing of the needed encouragement and reinforcement. The teacher should build a background of knowledge and skill in the child, offer opportunities and materials for exploration, and maintain an attitude of inquiry herself.5

Wilt describes the role of the teacher in the fostering of creative thinking. There must be no judgment of right or wrong, good or bad in the products created. The creator must find his own way and make his own judgment. The teacher should ask questions to encourage the child along the lines of his own thinking. The teacher must accept whatever the child expresses and must above

4Ibid., pp. 95-96.

5Strang, op. cit., pp. 24-29.
all value the original idea. The expression of ideas must always take precedence over the correct form. The creative process is of far more consequence than the product. 6

There seems to be rather general agreement that creativity is best fostered in a permissive atmosphere, an environment that encourages a flow of new ideas and independence of thought. If this is true, classroom climates must foster psychological safety and freedom, and encourage individual and varied responses. The child should be free from fear of criticism as far as possible. 7

Haney writes of the classroom in which creativity plays an important part:

The teacher's primary concern in such a classroom is to provide rich experience. There must be percept before concept, impression before expression. Too often children express little because they have little to say. 8

Haney also offers a few suggestions of classroom activities which seem to help foster creativity.

1. Read aloud to the class; urge the pupils to read.
2. Quote the line that fits the mood of the moment.
3. Use pictures freely.
4. Take note of the world around you as a group.

6 Wilt, op. cit., p. 8.


5. Do things with the intention of studying your reactions. For instance, take a walk together and keep note on what is seen.  

III. GUIDANCE ROLES

Torrance feels that teachers may be of valuable assistance to the creative child by assuming some of the roles of guidance workers in schools where there are none. These guidance roles must be differentiated from the other roles of the teacher. She may serve as an occasional "refuge" for the child from the problems which he is likely to encounter in his daily life. She may serve the child as sort of a "sponsor" or "patron". The teacher needs to do her best to help the child understand his divergence from his classmates. She provides the child with a place where he may communicate his ideas without fear of ridicule. The teacher should see to it that the child's creative talent is recognized by others. She may play a most important part by helping parents and others to understand the creative child.  

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9Ibid., p. 179.
10Torrance, op. cit., pp. 7-8.
CHAPTER IV

CONCLUSIONS

This study was undertaken for the purpose of determining the way creativity develops in young children and how parents and teachers may best aid this development. Creative expression was defined as the "production of something new, unique, or not previously existent."

The major literature in the field of creativity was reviewed. From Guilford's factor analysis study and Lowenfeld's research the components of creativity were found to be:

1. Sensitivity to problems.
2. Fluency of ideas.
3. Flexibility.
4. Originality.
5. Redefinition and the ability to rearrange.
6. Analysis or the ability to abstract.
7. Synthesis and closure.
8. Coherence of organization.

Strang listed twelve similar factors.

Several writer's opinions on necessary aspects of the creative person's environment were given. Included were such things as a rich background of experiences, exposure to great art, exposure to the work of other children, and a wide variety of materials with which to experiment.
A review of creativity research relating specifically to young children was presented. Krishnaiah studied peer sanctions against the highly creative child through the use of sociometric techniques. Andrews observed various types of imaginative play in children from two to six. He noticed such things as imitation, experimentation, transformations, and dramatizations. Markey found that the total of imaginative behavior increased with age throughout the preschool period. In his study of children's paintings and their verbalizations while painting, Grippen concluded that creative imagination does not often function in children below the age of five years. Griffiths identified eleven stages in children's creative drawings which she felt somewhat parallel the development of the imagination. Barkan found that there was a greater spurt of growth in art between first and second grade than between kindergarten and first grade. Second-graders were intensely curious about the "why" and the "how." Third-graders wanted more complete explanations. Torrance discovered a decline in creativity of children at about age five and age nine. In another study he pointed out three common characteristics of creative children; they tend to have a reputation for wild and silly ideas, they have a number of unusual ideas, and their work is characterized by playfulfulness and humor. Ligon attempted to establish certain
age-level characteristics for the development of the imagination in children.

Some guidelines for teaching in such a manner as to encourage creativity were given. Creative activity is developmental. It is a normal aspect of desirable living. The environment needs to expect and encourage creativity. Emotional factors are involved as well as intellectual ones. Creativity results from children's experiences. There must be an urge to express oneself. The creative process differs from person to person. Ligon made suggestions to parents and teachers in his study. He listed such things as direct answers, creative toys, encouragement of curiosity, and freedom to work on their own. Wilt stated that teachers must make no judgment on creative projects. They must allow the expression of ideas to take precedence over the correct form. The process is more important than the product. Torrance felt that teachers might fill a vital need by serving as substitute guidance workers where there are none.

From this study it seems that creativity is developmental and that it must be encouraged at each stage. If the child does not receive respect and encouragement for his creative efforts, he will learn to conform in order to avoid being different. Therefore, it seems that providing the necessary respect and encouragement
are the most important tasks of parents and teachers in fostering creativity. It is also important that the child be enabled to experience widely and to experiment with a wide variety of media.

The role of the parents and the kindergarten teacher are highly important, for studies have shown that a child's highest peak of creativity comes before he enters school. During the fifth year, while the child is in kindergarten, creativity reaches a very low point. It is imperative that parents and educators be made aware of this so that so much of our nation's creative potential will not be lost.

It seems appropriate to conclude with a passage from Miriam E. Wilt's book *Creativity in the Elementary School.*

Experimentation is the keynote. For every successful invention there are probably a hundred tries. For every poem, story, oil painting, building design or ballet there is usually a history of years of experimenting and putting different elements together to make a satisfying whole. Children must try things out. They must test the medium, whatever it is, to discover its limits, its possibilities. How will they know it won't work if they don't try? Don't fancy that your own personal experiences will prove a thing to them. Naturally they build on what others have discovered to some extent, but plucking the strings of the violin, discovering pitch in various sizes of nails or water glasses, rolling words around on their tongues, testing liquids and solids and temperatures, finding the use of tools—these and many other things they must do for themselves. School isn't the
only place most of them will experiment, but it will be the only place where some children will have this opportunity.¹

If the child is to be creative, and it is now believed that all children have some creative potential, he must be allowed to do, to learn, to discuss, to think, and to discover for himself in an atmosphere of respect and encouragement.

¹Wilt, op. cit., p. 66.
BIBLIOGRAPHY

A. BOOKS


B. ARTICLES IN COLLECTIONS


C. PERIODICALS


D. PAPERS
