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# An Exploration of the Relationships Between Gender and the Development of Graphic Representation in Children Between the Ages of Five and Thirteen Years

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#### **ABSTRACT**

The purpose of this study was to ascertain whether there was a relationship between gender and the development of graphic representation in children between the ages of five and thirteen years. A total of 180 children comprising 90 boys and 90 girls from a primary and a preschool in the city of Gweru in Zimbabwe and two teachers from the same institutions participated in the study. Ethnographic strategies were employed in the collection and analysis of data. Data were collected through two drawing tasks, observations, discussions and interviews. The children were given two drawing tasks, an open task to Draw What You Want and a common task to draw My Family at Home. The content, techniques and forms were analysed to find whether there were patterns in their development for each sex and whether there were similarities between boys and girls at each age level. The content of discussions and interviews held with the teachers and children were analysed for patterns in responses. The findings from the study showed that at five years, both boys and girls used the same techniques and drew the same forms representing the same content. From six years, there were differences in the techniques, form and content. The differences gradually increased as children increased in age. It is concluded that there is no relationship between gender and the development of graphic representation in five year old children but there is a relationship between gender and graphic representation in children between six and thirteen years. Teachers and other children appear to be the agents of genderisation.

#### INTRODUCTION

The study sought to establish whether or not there was a relationship between gender and graphic representation among boys and girls between the ages of five and thirteen years. The study focused on the technique, form and content of the children's art.

#### THEORETICAL FRAMEWORK

Research on child art can be traced as far back as 1885 when Ebenezer Cooke published an analysis of children's drawings that influenced educational practices and subsequent researches (Clark, 1985). Thereafter, all over Europe and America, art became the focus of research because it appeared as though all educational questions were hinged to the understanding of children's art. Research was focused on why children draw as they do, the meaning of their art and why children followed more or less predictable patterns of development in their artwork (Seefeldt and Barbour, 1986). The studies enabled art to be categorized into four perspectives or theories through which children's art can be understood.

#### Theories of Child Art

Cognitive theories of art are based on Luquet's assertion cited in Seefeldt and Barbour (1986) that children draw what they know and not what they see. As their knowledge and understanding increase, so will the accuracy, detail and complexity of their artwork. In other words, children's art is related to their level of intellectual functioning. This is also supported by Luquet (1912), Wallom (1951), Arnheim (1954, 1974) and Goodenough (1926) in Kindler and Darras (1995).

Psychoanalytic theories are based on the belief that children draw what they feel and not what they know. Feldman cited in Seefedt and Barbour (1986:276) asserts that "Children's art is a reflection of unconscious feelings rather than intelligence". As the child grows, it is believed that conscious thought suppresses the subconscious enabling the child to draw more realistically.

In direct contrast to the cognitive and psychoanalytic theories, perceptual theories are based on the belief that children do not draw what they know or feel but what they see. Children see perceptual wholes or total images structured by an active brain but because they are limited by their inability

to represent images, they end up inventing their own images. This observation is echoed by Wolf and Perry (1995), Goodnow (1977) and Gardner (1980).

Perceptual delineation theones are premised on the belief that children draw as they do, not because of any one factor, but because of several such as readiness, psychological environment, information handling, manipulation of media as well as creative and inventive ability (Mcfee, 1970 in Seefedt and Barbour, 1986). McFee believes art and the curriculum are part of culture in which the child lives and therefore culture has a definite effect on the child's graphic development. The aspect of culture is also reflected in Pariser (1995), Hargeaves and Galton (1994) and Gardner (1980).

#### **DEVELOPMENTAL THEORIES**

The most common finding since the genesis of the study of the art of children seems to be the realization that child art development follows a more or less predictable pattern. There appears to be a flux of terminology used to describe the patterns of development; Lowenfeldt and Brittan (1975) call them stages, Gardner (1980) calls them streams and waves Hargreaves and Galton (1994) call them phases, and Wolf and Perry in Pariser (1995) call them elements or abilities. The use of the terms 'child art' and 'children's art' in the description of the theories suggests the exclusion of any factors such as gender that might impinge on children when they are viewed as boys and girls. In other words, does an issue such as gender play no part in children's graphic development?

#### Feminist Ideology and Gender

Kenway and Modra (1992:139) say, "Feminism is premised on the recognition that gender is a phenomenon which helps to shape our society." Feminists see society as systematically discriminatory against women on account of gender. There appears to be a common feminist understanding that women are viewed as the other because men have the political and social power (Fox, 1996). Feminists generally work for the equality of men and women. Radical feminists see women's growth as best encouraged with a distinctly women's educational culture premised on women's characteristics (Kenway and Modra, 1992). Therefore, are girls viewed as the 'other' with reference to art and do they have a characteristic way of graphic development and representation?

#### Gender and Schooling

Gray (1986) sees education as the image and reflection of a society imitating and reproducing culture but not creating it. Gray goes on to say that education is a means by which society guarantees its own survival. In their work, teachers wittingly or unwittingly define the expectations of society. Teachers have different expectations of boys and girls in the classroom activities and their expectations are communicated to pupils (Gordon and Chimedza, 1993). Therefore, teachers have a profound influence in the gendering of children. Teachers seem to confirm rather than challenge conventional gender identities. It is therefore fitting to find out whether schools in any way have some influence on children's graphic development and representation.

#### Gender Socialisation

Gray (1986) and Durkheim (1982) in McNeil and Towney (1986) note that one is socialized into a gender role according to the norms of the culture. Initial gendering is in the form of giving names to children. Early in their lives, children are encouraged to imitate certain behaviours and discouraged from other forms of behaviours. In schools, there are subjects that girls or boys are labelled and expected to be less competent (Gray 1986, Kenway and Modra 1992). Therefore pressure is put upon the child to conform to certain norms as dictated by society.

#### The Problem

From the available literature and observation on Zimbabwean art, the researcher was struck by the insignificant number of women artists as compared to the number of male artists. The few established black Zimbabwean women artists are sculptors and not graphic artists. Zimbabwean black women artists seem to be more proficient in crafts rather than in fine art as compared to their male counterparts who sell both fine art and crafts at roadside stalls. Women sell crafts such as baskets, mats and crotchet work from house to house in urban residential areas. Where women have permanent stalls they still sell craftwork rather than graphic art. There is some relationship between craft and sculpture in that they are both three dimensional constructions. Therefore, even the few women sculptors are basically craftswomen. It can therefore be questioned whether it is by accident or by design that women prefer three dimensional art to two

dimensional art. Therefore, it seems as children grow, they are influenced by the gendered nature of society so that graphic development in boys and girls takes different courses in such a way that in adulthood, women become craftswomen and men become graphic artists.

In this light, the main problem which this study sought to investigate was whether there is a relationship between gender and the development of graphic representation in children between the ages of five and thirteen years. In an attempt to address the problem, the following research questions were used:

- 1. Are there any relationships between gender and the forms of children's artworks?
- 2. Are there any relationships between gender and the techniques children use in their graphic work?
- 3. Are there any relationships between gender and the content of children's art?

#### Significance

In the past, graphic development has been studied as a medium for understanding the cognitive and emotional functioning of the child (Mortensen, 1991; Aronsson and Anderson, 1994 and Kankkunen, 1998). Rarely have children's artworks been studied on a social perspective as though children lived in a gender free society. This study will contribute to our knowledge of gender and childhood and their place in education.

This study is also a response to national calls to prioritize the issue of gender in educational discourse. It is also a response to postmodern thinking within which children and childhood are beginning to be viewed as culture and given voice under the umbrella term 'Children's Rights'.

#### **DELIMITATIONS**

This study focused on children between five and thirteen years. This group is inclusive of children who possibly have had no formal educational influence and would give a clearer account of what gender influence the family might have in the early years of children's lives. The study sought to find out the content or 'what about', drawing techniques and forms of children's drawings so as to ascertain whether there was a relationship with gender.

The participants in this study were limited to the use of a lead pencil. This requirement excluded the use of color which could have been a source of knowledge of children's uses and preferences in relation to gender. The study also focused on the child in the formal school environment. The home was not directly used as a source of information.

#### **IMPORTANT TERMS**

#### Gender

In this study, gender refers to a social status ascribed to the individual at birth on account of the individual's sex. The ascription of gender assigns the individual to specific societal expectations, norms and roles which the individual acquires through socialization.

#### **Graphic Representation**

Graphic representation refers to that which we actually see which is the drawing and that which is being represented which is the message or story within the drawing. This is premised on Mortensen's (1991) two angles from which a drawing can be viewed; from the outside so that it expresses the drawer's visual perception and from the inside so that it is an expression of the drawer's inner feelings. Graphic representation is about the form which is visible and the content which is invisible.

#### METHODOLOGY

This study was a socio-cultural study because it involved human behaviour and its products. It therefore took an ethnographic orientation. Other ethnographic case studies in art on on gender as given by Stockrocki (1991) are: Stockrocki's (1986 b) research on grade twos' views of art, May's (1985) grade fours' views of art, Swan's (1986) pre-scholars' social nature of art and Emery's (1989) ten to twelve year olds power of peer group control.

The study dealt with art which is a product of human practices and a cultural product. Human behaviour according to Hammersly (1998) differs from physical objects in that it does not consist of fixed responses but involves interpretation and construction of meaning. The nature of human behaviour or the social world must be discovered and this can be achieved by first hand observation and participation in natural settings under the guidance

of an exploratory orientation (Hammersly, 1992). These characteristics typify ethnography (Hammersly, 1998).

#### Sample

This study focused on children between the ages of five and thirteen years. A total of ninety boys and ninety girls participated in the study as well as one female pre-school teacher and one male primary school teacher from Young Women's Christian Association pre-school and Bumburwi Primary school respectively in the city of Gweru in Zimbabwe. Children of these ages have been the focus of study from as far back as 1885 and characteristics of their pictorial development and representation are generally agreed upon. Examples of such studies are; Ebenezer (1885), Maitland (1895), Lukens (1896), Ballard (1913) in Clark (1985), Lowenfeld (1975), Kellog (1969), Gardner (1982) and Mortensen (1991). In addition, the selection of informants in ethnography is dictated by the nature of the field itself (Hitchcock and Hughes, 1994), the researcher's judgement as to the typicality of the sample (Robson, 1993) and the researcher's belief that the particular subjects can facilitate the development of a theory (Bogdan and Biklen, 1992).

#### Data Gathering Methods

As illustrated by Court (1989), it is not possible to study children's art in a culture-free way. "Ethnography is not far removed from the sort of approach we use in everyday life to make sense out of our surroundings" (Hammersley, 1998:2). In everyday life, we observe, talk to people, listen and analyse their talk, behaviour and possessions-these are activities whose syntheses are not readily quantifiable. Therefore, this study adopted a qualitative research methodology and used unstructured interviews, observations and discussions.

Kankkunen (1998), Flensborg (1998), Nielsen (1998), Aronsson (1998) in Lindstrom (1998), Goodnow (1977) and Court (1989) all relied on the same methodology. Court (1989:71) summarises the rationale for using interviews, observations and discussions as follows:

So often, researchers use the evidence in drawings (usually pre-school variables) as if the drawings were ventriloquist's dummy for the articulation of their specific interests. This kind of procedural foreclosing misses both

the meaning of the activity (to the child in culture) and meanings of whole drawings (such as symbolic content, kind of representation, formal and expressive qualities)... Thus, it is crucial to be open and responsive to data...

For data gathering, the researcher gave the participants two drawing tasks, the first was to *Draw What You Want* and the second to draw *My Family at Home*. The first task was to create an opportunity to study features of social phenomenon such as gender as reflected in children's graphic work. It is also possible to learn what importance children assign familiar figures in a relational way according to Anderson (1994). The first task was intended to elicit information from children about their pictures at different ages.

#### **ANALYSIS AND INTERPRETATION**

#### Relationship between Gender and Content of Drawings

In order to find out whether there was a relationship between gender and the content of the drawings, task 1 drawings, *Draw What You Want*, were used. Thorough scrutiny of the drawings elicited the following themes from both boys and girls: patterns, family, cars, transport, home, decoration, caring, travel and games. The themes related to what children drew and what appears to be happening in the drawings.

The appearance of patterns at five years may be attributed to the female pre-school teacher. She was pleased by the fact that children could make patterns and explained, "We teach them how to make patterns in preparation for writing". There were no differences between the subjects the boys and girls drew which centred on the home especially the mother and father. It appears therefore that there is no relationship between gender and what children at five years represent in their pictures such as our house, mother and father. The same cannot be said of about the succeeding years. From six years, boys' drawings are based more and more on out of the home activities. Their interest lies on fast moving things such as jets and police cars. There is also an interest in cats and dogs in both sexes. Girls resort more and more to home based subjects. It seems therefore that as soon as children start going to school, boys attain some measure of freedom of both thought and movement. Their subjects suggest interaction with people outside the family such as male drug smokers and street fighters whom they tend to admire. The nature of the African woman is that she sees herself as a caregiver and food provider and therefore more home bound than the

man, says Brain (1984). It is possible that the girls' drawings are influenced by the nature of their mothers' and sisters' activities especially in the kitchen as illustrated by drawings of utensils, flowers and food.

There was evidence of aggression in boys' drawings especially between nine and twelve years which is inclusive of what Lowenfeld and Brittain (1975) call gang age. Their interest in guns, fist fighting and wrestling was evidence enough to label their way of thinking aggressive. The preoccupation of girls in drawing flowers is in direct contrast to the boys' aggressive drawings. Such differences can be attributed to gender. Girls drew women playing netball and baby caring especially carrying the baby on the back. Girls between eleven and thirteen drew the symbol of the heart pierced with an arrow which is commonly associated with love. One cannot help but suspect that this symbol was sourced from elder sisters. Not a single boy drew the love symbol. The most interesting feature of the drawings was that houses disappear completely from the boys' drawings from around eleven years yet at the same ages, girls' drawings are focused on the home.

There appears to be no relationship between gender and the content of children's drawings around five years of age. However, from six years onwards, there were differences in themes and activities portrayed. Girls seem to be home bound while boys are outgoing and adventurous.

From discussions with children while they worked, data that the researcher collected was analysed and categorized into the following themes: family, home, likes, dislikes, play and other people.

At five years, children identified the mother and father and other members of the family such as brothers and sisters. However, some boys and girls found it very difficult to identify themselves in the drawings-a finding supported by Mortensen (1991). Court (1989) found the same thing in East Africa. As boys increased in age the family disappeared from their drawings altogether but girls still talked about 'mamma' and 'sisi' and one young girl even drew a queen. Generally, the self was not an important feature in all children's drawings.

The inability to identify themselves by five year olds can be attributed to children's ignorance of their sex or of the importance adults attach to sex. That they can suddenly identify themselves as boys and girls at six years

may be the result of attending primary school where separation of sexes is rigidly enforced through various procedures such as school uniforms, separation at assembly and competition between boys and girls. This is supported by Kenway and Modra (1992), Gray (1986) and Gordon and Chimedza (1993) who assert that teachers wittingly or unwittingly define the expectations of society and confirm rather than challenge conventional gender identities.

The disappearance of the family in boys' talk as they grow confirms the finding that boys become more inclined to out of the home activities. Girls too, are found to be more home inclined in both talk and drawings confirming their gradual alignment with their mothers. In relation to tastes, girls emphasize 'nice' or beauty yet boys marvel at beasts; thieves, wrestlers and gun totting people. This appears to confirm the adventurous nature of boys and the passiveness and docility of girls (Gray, 1986).

Love and care appears foreign to boys yet girls show motherly love, for example, through watering flowers, carrying babies, dislike for beating and drawing of the heart. The disappearance of houses in boys' drawings and the omission of the family in their talk are comparable to the girls' continued drawing of houses and kitchen utensils and their talk about home based activities. It is an illustration of vastly different worlds-worlds that seem to be determined by gender.

Task 1 (*Draw What You Want*) was an open assignment that gave children the freedom to express themselves freely. This task has limitations. It does not enable the comparison of drawings from a common position. Task 2, drawing about *My Family at Home*, was a common task for every child. It was intended to find the relationships between gender and the content of the drawings as in Task 1.

Based on previous studies such as Court (1989), Anderson (1994) and Mortensen (1991) a list of content elements specific to the task (identity, my family, home, activity and accessories) and their indicators were drawn up. The presence or absence of the indicators in the drawings was noted in each drawing at each age level and recorded against boys and girls separately. This facilitated the comparison of content at different ages and between boys and girls.

With reference to identity, it appears sexual identity is not well established in children by five years. Some of the boys and girls drew themselves in the form of the opposite sex. This observation collaborates the finding from discussions with children where they failed to identify themselves in their own drawings. Identifying with the same sex elders appeared well illustrated by the fact that more boys than girls showed brothers and more girls than boys showed sisters.

Lowenfeld and Brittain (1975) describe children around nine to twelve years as belonging to the gang age. They become rebellious and it appears their focus is the severance of the dependence on the home. This is in line with the observation that boys between nine and twelve years have little interest in the home.

#### Relationship between Gender and Forms of Artworks

The researcher analysed the drawings in order to find out how boys and girls create their art forms with a view to comparing the drawings to find out whether there are any differences in the forms and strategies they use to produce these forms. It was believed that the comparison would facilitate the establishment of whether gender was a factor in child art development.

The drawings were scrutinized to see how children formed their drawings using an instrument based on some of the characteristics researchers such as Court (1989), Kellog (1970) and Anderson (1994) used. The instrument considered; use of drawing surface, spatial orientation, composition, and strategies used in visual representation.

Children at five and six years used the word *kunyora* meaning to write instead of *kudrowa* meaning to draw. We write from left to right and from the top to the bottom of the paper. This could be one reason why some children drew horizontally at the top of the paper. To them, there was no difference between writing and drawing. There appears to be no link with gender but there is some development in both sexes because the tendency to use the top of the paper tapers off as children grow. There is also a notable increase in the use of the whole drawing surface as children grow.

In the management of occlusion and form, boys found solutions faster than girls. In relation to transparent images, children appear to develop at the same pace but boys become slightly faster in realizing the error than girls. The same can be said of multiple view images. There seems to be a difference in development pace between boys and girls in relation to linear and aerial perspective. Boys are faster in using linear perspective. Up to thirteen years, not a single girl had attempted aerial perspective. Boys were also faster than girls in making more organized compositions.

People consider the human figure as the most difficult subject to draw and no thirteen year old girl drew the human figure. In the drawing of feet, boys cease drawing feet in profile earlier than girls.

There appears to be no distinction between boys and girls in shading. The use of the eraser should be seen as a positive development. Erasing is some form of problem solving. It is an indication of the ability to identify mistakes. Therefore, the fact that more boys than girls used an eraser is an indicator of faster development in boys.

#### Styles of Working

Girls sought clarification and approval from the researcher. This could be an indication of lack of confidence in art. Girls also felt insecure if they worked individually and felt much safer in groups. It could be possibly safer to make mistakes as a group rather than as individuals. This observation seems to echo and validate an earlier observation that girls are less adventurous than boys. Signs of distinction are; working within a group of other girls and consulting other girls. Their lack of confidence is also confirmed by their attempts to hide their work from the researcher.

#### Views from Teachers

The teachers saw girls as less able in graphic art. The female teacher declared, *kudrowa ndekwevakomana*, drawing is for boys. She went on to say, in life certain activities are meant for boys while others are meant for girls. This view may be consciously or unconsciously communicated to the children. For example, that the twelve and thirteen year old girls hid their work from the researcher may be a result of the teacher's views communicated to the child wittingly or unwittingly. Therefore, the performance in the art of both boys and girls is viewed from a gendered point of view.

Both teachers viewed girls as confident in crafts. They therefore develop a negative attitude to graphic art which may be attributed to the requirements

of the home such as the need for door and table mats. The lady pre school teacher also said girls were better artists than boys. This should not be surprising because her class was composed of five year old children. This confirms an earlier finding that there is little difference between boys and girls in drawing at five years. She attributed the older girls' poor performance to *kushaya chido* or lack of interest.

Art was viewed differently by the two teachers. The male teacher viewed art from a broader perspective while the lady teacher saw only drawing and painting as art. In addition, the lady teacher herself was not confident in drawing. She had indicated during interviews that in drawing, she struggles and that she was a poor artist.

Both teachers felt that certain activities are for boys while others are for girls. Society was said by Gray (1986) to determine the allocation of activities and teachers, whose views appear gendered, are an element of society. Therefore, teacher influence in genderisation cannot be ruled out. This is in line with Gordon and Chimedza (1993) who say that teachers treat boys and girls differently and their expectations and attitudes are almost always communicated to the pupils.

#### CONCLUSIONS

This study has shown that at five years, there is no relationship between gender and children's graphic representation because children drew similar subjects using almost the same forms and strategies. But as children grow, boys tend to solve graphic problems faster than girls so that by the age of thirteen, boys are far ahead of girls in both the organization of the work and graphic problem solving techniques such as occlusion.

The study has also shown that at five years, the content of children's work is similar and therefore there is no relationship between gender and content. However, as children grow, boys tend to focus on the more 'masculine' out of home activities while girls focus on the more 'feminine' home bound activities and objects. The distinction in the nature of content is an illustration of the existence of a relationship between gender and children's graphic representation.

At five years, boys and girls are equally confident in art. Girls tend to lose confidence as they grow. They work in groups, consult other girls and hide

their work from other people. The loss of confidence in their drawing ability can be attributed to gender as illustrated by the teachers' views.

The study therefore concluded:

- that there is no relationship between gender and the development of graphic representation at the age of five but there is a growing relationship as children increase in age. In other words, there is a relationship between gender and graphic representation.
- that the primary school is an agent of genderisation because in preschool children were similar in their graphic representation and only differed as from entry into the primary school at six years.
- that teachers play a role in the gender socialisation of the child as illustrated by their views on children's art and art in general.

#### RECOMMENDATIONS

The study recommends that:

- girls should be given more assistance in art in order to help them solve graphic problems that seem unique to girls.
- more assistance is given to girls so as to build their confidence in graphic art.
- undirected or free choice topics should be minimized as they encourage convergence in girls.
- teachers should be gender sensitive in the selection of content for art lessons and in art criticism sessions.

A replication of this study can be carried out to establish the nature of development in art with children at secondary school. This is necessary for educational planning in order to find ways of encouraging girls to take up careers in art. A study can also be carried out with student teachers so that the findings would become useful in the preparation of teachers in the teaching of art.

#### REFERENCES

- Anderson, S. (1994) Social Scaling and Children's Graphic Strategies: A Comparative Study of Children's Drawings in Three Countries. Linkoping: Linkoping University.
- Bogdan, R. C. and Biklen, S. K. (1992) Qualitative Research for Education. London: Allyn and Bacon.
- Brain, R. (1980) Art and Society in Africa. London: Longman.
- Bullough, R.V. and Gitlin, A. (1995) Becoming a Student of Teaching. New York: Garland Publishing Company.
- Clark, G. A. "Early Enquiry, Research and Testing of Children's Art Abilities", in The History of Art Education. Pennsylvania State University: School of Visual Arts.
- Court, E, (1989) "Drawing on Culture: The Influence of Culture on Children's Drawing Performance in Rural Kenya". Journal of Art and Design Education. Vol. 8(1) pp 65-88.
- Eisner, E. (1979) The Educational Imagination. New York: Macmillan.
- Fox, E. "Feminist Philosophy", in Moore, B. N. and Bruder, K. (ed) (1986). Philosophy: The Power of Ideas. London: Mayfield Publishing.
- Freeman, N. H. and Cox, M. V. (1985) Visual Order: The Nature of Development of Pictorial Representation. Cambridge: Cambridge University Press.
- Gardner, H. (1982) Artful Scribbles: The Significance of Children's Drawings. New York: BasicBooks.
- Gardner, H. (1982) Art, Mind and Brain: A Cognitive Approach to Creativity. New York: BasicBooks.
- Goodnow, J. (1977) Children's Drawings. New York: Open Books.
- Gordon, R. and Chimedza, R. (ed) (1993) "Equity in Education". Teacher Education Packages: Harare: UNESCO.
- Gray, C. "Gender" in McNeill, P. and Towney, C. (ed) (1986) Fundamentals of Sociology. Cheltenham: Stanley Thorpes.
- Hammersley, M. (1992) What's Wrong with Ethnography. London: Routledge.
- Hammersley, M. (1998) Reading Ethnographic Research: A Critical Guide. London: Longman.

- Hargreaves, D. J. and Galton, J. G. "Aesthetic Learning: Psychology and Educational Practice", in Olson, R, (ed) (1994) Media and Symbols: The Forms of Expression, Communication and Education. 7<sup>3rd</sup> Yearbook of N.S.S.E.
- Hinton, P. R. (1995) Statistics Explained. London: Routledge.
- Hitchcock, G. and Hughes, D. (1995) Research and the Teacher. London: Routledge.
- Kankkunen, T. "Gender Play in Students' Artistic Expression", in Lindstrom, L. (ed) (1998) Nordic Visual Arts Research: A Theoretical and Methodological Review: Stockholm: Institute of Education Press.
- Kellog, R. (1970) Analysing Children's Art. California: Mayfield Publishing Company.
- Kenway, J, and Modra, H. "Feminist Pedagogy and Emancipatory Possibilities", in Luke, C. and Gore, I. (ed) (1992) Feminist Critical Pedagogy. London: Routledge.
- Kindler, A.M. and Darras, K. (1995) "Artistic Development in Context: Emergence and Development of Pictorial Imagery in Early Childhood Years". Journal of Art and Design Education. Vol. 20(2) Issue 40.
- Lindstrom, L. (ed) (1998) Nordic Visual Arts Research: A Theoretical and Methodological Review. Stockholm: Institute of Education Press.
- Lowenfeld, V. and Brittain, W. L. (1975) Creative and Mental Growth. New York: Macmillan.
- Marshall, C. and Rossman, G. B. (1999) Designing Qualitative Research. London: Sage Publishers.
- McNeill, P. and Towney, C. (ed) (1986) Fundamentals of Sociology. Cheltenham: Stanley Thorpes.
- Mortensen, K. V. (1991) Form and Content in Children's Human Figure Drawings. New York: University Press.
- Nielsen. M. "Empirical Research on Children's Pictorial Activity", in Lindstrom, L. (ed) (1998) Nordic Visual Arts Research: A Theoretical and Methodological Review. Stockholm: Institute of Education Press.
- Seefeldt, C. and Barbour, N. (1986) Early Childhood Education: An Introduction. London: Charles E. Merril Publishing Company.
- Stockrocki, M. (1991) "A Decade of Qualitative Research in Art Education: Methodological Expansions and Pedagogical Explorations". Visual Arts Research. Illinois: University of Illinois.



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