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Teacher Response to Aggressive Behaviors in Preschool Boys and Girls

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Teacher Response to Aggressive Behaviors in Preschool Boys and Girls

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by

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ACCEPTANCE PAGE

THESIS ACCEPTANCE

Acceptance for the faculty of the Graduate College, University of Nebraska, in partial fulfillment of the requirements for the degree, Master of Science, University of Nebraska at Omaha.

Committee

Name	Department
Jan Lubar	Special Education
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Chairman

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Date

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Abstract

This study was conducted to determine if inner city preschool boys and girls differed in either the type or amount of aggressive behaviors displayed. The question of whether teachers differed in their responses to preschool boys and girls when they behaved aggressively was also studied. A total of 180 children and 14 teachers were observed in two Head Start centers in a Midwestern city. The naturalistic observational study was conducted over a period of approximately 18 hours. Results of the study showed that boys, while making up 46% of the population, committed two-thirds of the aggressive acts. Boys and girls, however, displayed similar types of aggressive behaviors. Teacher response varied between girls and boys. Girls received no response to their aggressive acts three-fourths of the time, while boys received more frequent responses. The most common response for both boys and girls was a loud reprimand, but boys received a higher proportion of this response than girls. It is possible that such variance in teacher response could maintain or encourage different rates of agression in boys and girls.

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CHAPTER I

INTRODUCTION

The aggressive behaviors of young children often cause parents and teachers concern. Fagot & Hagan (1985) contend, however, that such behavior makes up a small percentage of total behavior and is merely the way a child attempts to gain control over the environment. As such, they argue, this behavior is more assertive than aggressive. For example, hitting or yelling may be the way a young child communicates feelings because he as yet lacks the ability to express himself in a more acceptable manner. Although this behavior is not usually pathological in nature, it is nevertheless undesirable.

Parents have traditionally held the job of helping their young children to express their negative feelings in healthy, non-hurtful ways. As more women enter the workforce, however, teachers in preschool and daycare centers more frequently take the place of parents in teaching appropriate behaviors as alternatives to hitting, kicking, and yelling. How children are taught to cope with their aggressive feelings should not vary according to gender. The acquisition of appropriate alternatives to aggressive behavior is a part of the

healthy emotional development for both boys and girls.

Statement of the Problem

Many research studies have shown that boys are more aggressive than girls (Barrett, 1979; Fagot & Hagan, 1985; Hyde & Schuck, 1977; Lyons, Serbin, Marchessault, 1984; Maccoby & Jacklin, 1980; Serbin, O'Leary, Kent & Tonick, 1973; Tieger, 1980). At the same time, other studies have shown that adults expect and encourage different behaviors from boys and girls (Fagot, 1978; 1984; Serbin et al., 1973). How these different expectations may affect sex differences in the aggressive behaviors of young children is vigorously debated in the literature. In those studies which accept the premise that boys are more aggressive than girls, a sort of nature-nurture controversy rages (Maccoby & Jacklin, 1980; Tieger, 1980).

Researchers do not agree on whether the edge given to boys in aggressive behavior is a result of social training or merely a reflection of biological or psychological differences between boys and girls. Further study is required to determine how large a role teacher response to aggression plays in creating or maintaining different behaviors in boys and girls.

Purpose of the Study

Preschool teachers serve both as role models for preschoolers and reinforcers for their behaviors and as such play a large role in increasing or decreasing aggressive behaviors. If young boys are truly more aggressive than young girls, are teachers consciously or unconsciously reacting in such a way as to maintain or increase this behavior?

The purpose of this study was to compare the aggressive behaviors of inner city preschool boys and girls. Furthermore the purpose of this study was to examine teacher response to these aggressive behaviors in order to determine whether they responded differently to boys and girls.

Questions for Study

The following questions will guide this study:

1. Do preschool boys and girls differ in the amounts of aggressive behavior they exhibit?

2. Do preschool boys and girls differ in the types of aggressive behaviors they exhibit?

3. Does teacher response to the aggressive behaviors of preschool boys and girls differ?

Definitions in This Study

For the purposes of this study, any adult who

works with students in a direct teaching or supervisory position was observed. This included head teachers, assistant teachers, aides and van drivers. Preschool children observed included all students enrolled in the observed Head Start centers.

Previous studies on aggressive behaviors in preschoolers have used different definitions of aggressive behaviors. Some definitions used were open to different interpretations requiring the observer to judge intent (Bandura, 1973; Fagot & Hagan, 1985) and therefore were not congruent with the purposes of this study. An adaptation of Fagot & Hagan's (1985) categories were used. These particular behaviors (hit, push, kick, verbal assault) were selected for their ease of observation and because they were the behaviors most commonly used in aggressive behavior checklists. Only observable behaviors with definite beginning and ending times were recorded. The following behaviors were defined as <u>aggressive behaviors</u>:

1. hit
2. kick
3. bite
4. pinch
5. hair pull

6. grab (object or person)
7. push
8. yell, shout, scream
9. name-call

(see Appendix A for specific behavioral definitions)

The categories of teacher responses used in this study also included observable, measurable actions that were also used frequently in previous research (Fagot & Hagan 1985; Hyde & Schuck, 1977: Serbin et al, 1973). The following behaviors made up teacher responses:

1. physical restraint
2. loud reprimand
3. soft reprimand
4. time-out
5. stimulus removal
6. distraction
7. proximity control
8. non response

(see Appendix B for specific behavioral definitions)

Both teacher response and agressive behaviors were limited only to observable, measurable actions. Subjective behaviors (e.g., threats or stares) and subjective responses (e.g., incompatible alternatives, restructuring of classroom routine) were not measurable and were, therefore, not recorded in this study.

CHAPTER II

REVIEW OF LITERATURE

This chapter will look, first of all, at studies of gender differences in the aggressive behavior of young children. Many studies which have examined adult bias in perception of boys and girls will also be presented, as well as some specific studies on how adults react to and interact with boys and girls behaving aggressively. Finally, there will be discussion on some of the flaws to be found in the available literature.

Gender Differences in Aggression

Aggressive behavior, in general, has been found to be more prevalent in males than in females (Hyde, 1984; Maccoby & Jacklin, 1980; Tieger, 1980). There has been some disagreement as to whether or not this fact holds true for very young children as well as for older children. Tieger (1980) has contended that sex differences in aggression in children aged six and under are not significant. In a meta-analysis of studies observing children from this age group (previously cited in Maccoby & Jacklin, 1974), Tieger found non-significant gender differences in aggression. Maccoby & Jacklin (1980), on the other hand, noted

"aggressive behavior is clearly sex-differentiated by the age of six and under" (p. 976). They found highly significant gender differences in aggression for younger children, with higher male aggression found in 24 studies, while eight studies found no differences in the rates of male and female aggression. No study found the rate of female aggression to be higher than the rate of male aggression.

Individual studies of groups of children observed in their natural settings have studied the existence of true differences in aggressive behavior. (Each of these studies will be presented in more detail later.) Serbin et al. (1973) studied preschool boys and girls in 15 different classes and found boys to be significantly more aggressive than girls, but did not differentiate between physical and verbal aggression. Hyde and Schuck (1977), in a study of 157 preschoolers and kindergarteners, also found boys to be significantly more physically aggressive than girls. More recently, Lyons et al. (1984) found boys to be more aggressive and active on the playground. Fagot and Hagan (1985) observed higher physical aggression among boys in their study with toddlers. Fagot, Hagan, Leinbach and Kronsberg (1985) found no sex differences

in physical aggression for infants 13 to 14 months old. When studying the same group nine to 11 months later, however, they found that while the boys had maintained approximately the same levels of aggressive behavior, the girls emitted significantly less aggressive behavior than previously.

Adult Bias in Their Perception of Children

Studies have found that adults view children differently according to the gender of the child, actual or perceived. This bias begins in infancy (Beeson & Williams, 1982; Miller, 1987). Connor-Greene (1988) found that when subjects viewed the same baby designated at random as either boy or girl, the baby was significantly more likely to be seen as less sturdy and more delicate when the subjects believed the baby was a girl.

Condry and Ross (1985) conducted a study showing a videotape of two preschoolers wearing snowsuits which effectively masked their gender. On the tape, the children are playing in a rough and tumble manner in the snow--one child hits, jumps on, and throws snowballs at the other child. One hundred seventy-five college students were asked to rate the aggressiveness of the target child. The college students were divided

into four groups--one group was told that it was observing two boys; another group--two girls; the third group--a boy playing with a girl; and finally the last group--a girl playing with a girl. Condry and Ross found that the group which was told that it was observing two boys rated their behavior as significantly less aggressive than did the other three groups. Researchers were surprised at the direction the observer bias took. In their opinion, if this bias were corrected, there would be a higher incidence of aggressive behavior in males than previously indicated in the literature.

Lyons and Serbin (1986) asked a group of 40 men and women to look at line drawings of children interacting in large groups. Two traced versions of two scenes were used. Each scene showed a playroom setting with 12 to 13 children engaged in different activities. The traced versions of the scenes differed only in the sex of the children involved in the aggressive interaction depicted--pushing and kicking. One scene showed two boys while the other scene showed two girls. A significant number of the observers (11 of 40) rated the boys as being aggressive, but not the girls, even though the drawings depicted identical behaviors.

The observers were then asked to look at ten sets of drawings showing two same-sexed children in an aggressive interaction. Five sets of pictures showed boys and five sets of pictures showed girls in otherwise identical settings. The results of this experiment showed that men were significantly more likely to rate boys as more aggressive.

These studies of bias in observational studies of aggressive behavior are important because they highlight the lack of objectivity with which adults perceive behavior, aggressive or not, in children. Reasonably, it can be assumed that if adults perceive differences in behaviors, they may then respond differently to boys and girls; thus setting up different expectations and standards of behavior for each sex.

Adult Reaction to Aggressive Behavior in Children

Evidence has suggested that parents as well as teachers treat children differently on the basis of the child's gender (Condry & Ross, 1985; Fagot, 1978; Serbin et al., 1973; Tieger, 1980). Parents have been found to encourage large motor play and rough and tumble games in boys, while encouraging nurturing dependent behavior in girls (Fagot, 1984). Smith and

Lloyd (1978) found that women who believed that they were playing with boy babies gave more verbal encouragement for gross motor activities than when they believed they were playing with girl babies.

The work of Hyde and Schuck (1977), however, did not find differential treatment by teachers when responding to aggression. Their study investigated the behaviors of 150 children (mean age four years nine months) and their teachers in nine nursery schools and six kindergartens. Aggressive behavior was defined as physical attack of another person, physical attack of an object, verbal attack, symbolic aggression, and infringement on another's property. Teacher response included physical punishment, loud verbal punishment, soft verbal response, sex role training, withdrawal of affection, ignoring, attention, and does not see act.

Researchers found that teachers did not differ in how they responded to the two sexes. Although boys had higher frequencies of many responses this was attributed to the higher frequencies of aggressive behaviors they displayed. When these frequencies were converted to proportions, boys were no more apt to receive any certain response than were girls. Boys, however, tended to persist in aggressive behavior even

after teacher intervention. Hyde and Schuck attributed this persistence to the boys' inability to identify strongly with their mostly female teachers.

Fagot et al. (1985) had mixed results when they studied teacher's responses to infants and toddlers. Thirty-four children, 15 boys and 19 girls, (mean age 13.4 months) were observed in playgroups of six to eight children along with two female teachers. At this age, girls' assertive acts (defined as hit, push, or grab) were significantly more likely to be ignored than boys' assertive acts. Teachers responded to boys' assertive acts 41% of the time, but they responded to girls' assertive acts only 10% of the time. Approximately ten months later, 29 of these original children (16 girls and 13 boys) returned to join ongoing toddler playgroups of 12 to 15 each. At this age teachers no longer reacted differently to the assertive acts of boys and girls. (These teachers, however, were not the same teachers that were observed in the first part of the study).

Researchers theorize that when the behavior of children is more ambiguous as is the case with infants, the teachers behaved in a more stereotypical way. In other words, as the stereotype of boys is that they are

more aggressive than girls, teachers watched infant boys more closely for aggression and responded more quickly to them.

In another study, Serbin et al. (1973) observed 15 preschool classes for a mean time of 4.2 hours each. Observers scanned the room in 20 second intervals looking for and coding behaviors such as verbal/physical aggression (which was not further defined), destruction of materials, ignoring teacher directions, crying, proximity to the teacher, and solicitation. Some of the teacher behaviors which were selected for observation were verbal reprimands, extending directions, touching, restraint, helping, etc. When analyzing the results of these observations, researchers found that the rate of teacher response to aggressive behavior was over three times higher for boys than for girls. The teacher response was most frequently in the form of a loud reprimand. Researchers theorized that the type of disruptive behavior exhibited by boys was more intense or dangerous than the girls' aggressive behavior, thus warranting more teacher intervention. Unfortunately, this proposition could not be tested. The researchers did maintain that whatever the cause of the

differential teacher response to aggressive behavior "the resulting patterns of teacher behavior are those which would be predicted to differentially maintain or even strengthen existing levels of disruptive behavior in boys" (p. 802).

More recently, Fagot and Hagan (1985) conducted a similar study with 48 toddlers and preschoolers aged 18 to 36 months. These children were placed three or four at a time in ongoing playgroups made up of children of similar ages. Thus not all children in any one group were observed--only the target children. Behaviors such as grabbing an object, pushing, kicking, or verbal assault (yelling, screaming, criticizing, or teasing) were observed through a two-way mirror as children played in groups. Both teacher and peer reactions were recorded.

As in other studies already cited, it was found that boys engaged in more aggressive acts than girls, particularly physical acts, as verbal aggression was very rare in this group. Researchers reported that female aggression was more likely to be ignored than male aggressive acts. Boys themselves, were more likely to give both positive and negative feedback to aggressive boys while teachers were more apt to react

negatively to the boys' aggressive acts. (Negative reactions included criticizing, physical restraint or aggressing back.) Teachers were almost twice as likely to respond to a male aggressive behavior than a female aggressive behavior. However, there was no difference in how the aggressing children responded to the treatment of the behavior. Aggressors who were ignored tended to end their behavior after a shorter period of time. As a result, boys received responses which maintained or increased aggressive behavior while girls did not.

Murphy (1986) conducted a study of teacher child interaction in daycare classrooms in an urban setting. A total of 268 boys and girls from the ages of two to four years under the guidance of 14 male and 14 female teachers were studied. Each class was observed twice over a three week interval using a pre-published inventory examining sexual equity in the classroom.

The results of this study showed that boys engaged in more interactions with teachers than girls did. Also boys received more reprimands and were more often criticized for their misbehaviors than were girls. In addition, it was found that boys engaged in more interactions with teachers, received more reprimands

from both male and female teachers, and were more often criticized for misbehavior. In addition, it was found that boys received more remedial feedback and guidance in task completion, while girls were more likely to have their tasks completed for them by teachers.

Summary of the Literature

The literature on sex differences in aggressive behaviors and adult response to such behaviors is awash in contradiction and disagreement. While most researchers have agreed that studies show a higher incidence of aggression among males than females, there is disagreement over the accuracy of these studies and the interpretations to be drawn from them. There is also little research on how boys and girls may differ in the types of aggressive behaviors they display. The few studies which examine differential treatment of aggressive children by adults differ somewhat in method and there is a great need for more unified research in this area.

Primarily, the existing research needs updating. When considering the rapid changes in society even over the last decade, it can be assumed that preschool practices have changed as well. While studies conducted in 1935, 1955, or even 1977 may have been

accurate indicators at the time reflecting interesting methodology and conclusions, they are not likely to be relevant today. Many researchers cited 20 and 30 year old studies in their work without questioning their relevance.

Research into aggressive behavior differences also needs to be unified by the use of more exacting operational definitions of aggression. Definitions in the existing research ran the gamut from loose theoretical definitions to structured behavioral definitions. Maccoby and Jacklin (1980) spoke of "behavior which hurts or appears intended to do so" (p. 966). Condry and Ross (1985) wrote of aggressive behavior as "any intentional behavior that could result in harm to other child" (p. 227). Either definition could mean many different things to different observers depending upon the observer's experience with children and his or her point of view. Other definitions included that of Omark, Omark and Edelman (cited in Tieger, 1980) who "found that boys engaged in 'pushing without smiling' more than girls did" (p. 944). DiPietro (1981) used exacting observational definitions which still left room for interpretation. Actions were "distinguished as aggressive on basis of facial

features of actor (conveying anger or malice) and recipient (fear, anger, distress)" (p. 53). Hyde and Schuck (1977) listed different categories of aggressive behaviors including physical attack to either person or object, verbal attack and property infringement, among other things. Fagot and Hagan (1985) used the simplest listing of aggressive behaviors "1) hit, push, or kick; 2) take or grab for objects; and 3) verbal assault" (p. 345). While many of these definitions overlap, they are not identical, and results can not be generalized from one case to another when nonidentical behaviors are being discussed. If only concise operational definitions were used in aggression studies, researchers could at least compare such behaviors as hitting, kicking, biting, name-calling, and so on from one group to the next. Also the use of such definitions would most likely reduce observer bias, as the observers would not be making value judgements or allowing the child's gender to interfere, but recording distinct observable behaviors.

CHAPTER III

METHODOLOGY

Subjects

Adults. A total of 14 adults including four head teachers, four assistant teachers, four aides, and two van drivers were observed. Although each particular subgroup in the sample had different titles and different primary responsibilities (e.g., head teachers wrote lesson plans, van drivers transported children), all were included in this study because each worked with children in the classroom both individually and with groups on a daily basis during the data collection period. All teachers were female. The mean age of teachers was 35.4 years. Nine of the teachers had received high school diplomas, three held associate's degrees or certificates in child care, and two teachers held bachelor's degrees. The mean number of years of experience at Head Start was 2.6 years. Two teachers were white and twelve teachers were black. Teachers were blind to the study's purposes and signed consent forms before observations began (see Appendix No. C).

Children. A total of 160 children ranging in age from 21 months to five years were observed. The large

age range can be attributed to the fact that children at all these ages were grouped together in these classrooms. It was not practical to eliminate individual children from data collection and doing so would have made the naturalistic observations of this study incomplete as all of these children interacted on a regular basis. Also these children shared the same teachers no matter what their age. The mean age for both boys and girls was 4.0.

Black children made up 97.5% of this population. White children accounted for less than two percent of the total and native Americans made up slightly more than 1/2% of the total. Boys made up 46% of the enrollment while girls made up the remaining 54%.

Setting

A naturalistic observational study was conducted at two Head Start Centers during the months of November 1988, December 1988, and January 1989. These centers currently use the Lincoln Preschool Curriculum Project (Stevens, 1984). Checklists of objectives for each age level (eighteen months to two years, two to three years, etc.) include a social-emotional component divided into four areas. They are:

A. Developing competence and confidence in self.

B. Developing appropriate work and play habits.

C. Relating to others appropriately.

D. Displaying appropriate behaviors and emotions.

In many cases, teachers use their own judgments in determining, for example, whether or not a three year old accepts changes in routines easily or expresses frustration appropriately (Stevens, 1984).

Head Start teachers are also provided with materials and methods to cope with students' aggressive behaviors. These include modelling proper behavior, diversion, ignoring, use of authority voice, and time-out. Teachers are also encouraged to consult with the Education Coordinator for problems with particular students or discipline methods (Head Start Policy on Discipline, undated).

Observations took place in the natural classroom setting of preschoolers as they worked with their teachers and peers in small and large group activities. Observed activities included, but were not limited to, calendar time, circle time, music, and free choice time. The latter activity consisted of children selecting from a variety of centers including such activities as puzzles, reading, gross motor skills,

housekeeping, art, sand, and manipulatives.

Procedure

A total time of 17 hours and 50 minutes was spent in data collection. All data were collected between the hours of 9:30 a.m. and 11:00 a.m. on randomly selected days. During data collection, the female observer was present in the room. This has been a common procedure in previous studies (e.g., Hyde & Schuck, 1977; Murphy, 1986; Serbin et al., 1973), and was most practical for the present study. In addition, the observer spent five minutes in an unobtrusive corner of the room before beginning data collection, so that any interference caused by the observer's entrance would have time to subside before observation began. In addition, during observation time, if students or teachers began to pay attention to the observer rather than activities at hand, the observer moved to a different part of the room.

Data were recorded on a specially made Behavioral Observation Recording Form (see appendix D). Aggressive behaviors were recorded by number code under appropriate gender. Any continuous behavior (for example, a child repeatedly hitting another child) was recorded as one behavior unless it ceased for at least

five seconds before beginning again. If the victim responded aggressively, this response was recorded under the column headed victim response unless it occurred more than two seconds later. In this case, the aggressive response was recorded on the next line of aggressive behavior. This procedure was used for two reasons. First, it helped to achieve consistency in data collection. Secondly, it helped to define more clearly who the teacher was responding to--the aggressor or the victim. All aggressive behaviors, aggressor's and victim's, were counted in the final analysis.

As aggressive behavior was observed, all teachers present were observed for their response to the behavior and/or its perpetrator. In general, only responses which occurred within five seconds were counted unless a later response was very specific or occurred as a result of a student tattling on the aggressor. Teacher response was listed by letter code.

Pilot Study

A preliminary pilot study was conducted to determine the feasibility of this study. A total of 34 children and five teachers were observed in a Head Start classroom for 90 minutes. The class was made up

of 18 girls and 16 boys.

The results of the pilot study itself showed that 27 aggressive acts occurred during the observation period. Boys were responsible for 78% of the aggressive behaviors, while girls were responsible for 22%.

The most common aggressive act for boys was pushing (33.3%), followed by hitting (23.8%), grabbing and pinching/hair pulling (14.2% each), yelling (9.5%), and name calling (4.8%). The most common aggressive behavior for girls was pushing and grabbing (33.3% each), and name calling and pinching/hair pulling (16.75% each). Girls displayed no yelling or hitting behaviors.

Teachers did not respond to boys approximately 43% of the time, while girls received no response 83% of the time. Boys received reprimands for their aggressive behaviors 39% of the time, while girls received one reprimand for 16.7% of the total.

The results of the pilot study were satisfactory for implementation of this research.

Pilot study data were subsequently included in the final analysis as subjects, settings, and procedure did not change for the remainder of the study.

Treatment of Data

At the completion of this study, all behaviors and subsequent responses were tabulated to give total frequencies. These frequencies were then converted into percentages in order to compare these behaviors and their responses in meaningful ways. No statistical test was used to analyze these data as the naturalistic methods of this study made it most amenable to a non-statistical analysis.

CHAPTER IV

RESULTS

Amounts of Aggressive Behavior

A total of 212 aggressive behaviors were observed during the data collection period. Boys accounted for two times more aggressive behavior than girls or approximately 67% of all aggressive behaviors, while girls accounted for only 33% of the observed behavior. Although preschool boys made up only 46% of the enrollment, they accounted for more than two-thirds of the aggressive behaviors.

Types of Aggressive Behaviors

Aggressive behaviors were divided into two categories: physical aggression (hitting, pinching, hair pulling, pushing and grabbing--no biting or kicking was observed) and verbal aggression (yelling and name calling). As indicated in Table 1, both boys and girls exhibited far more physical aggression than verbal aggression. Approximately 83% of all boys' aggression was physical in nature and approximately 77% of all girls' aggression was physical in nature.

Further analysis of specific aggressive behaviors (also in Table 1) indicates few differences between boys and girls and the way they displayed their

aggression. Boys' aggressive behaviors from highest to lowest frequency (followed by percent of their total aggressive behaviors) were grabs (31%), pushes (25.4%), hits (23.9%), yells (16.2%), pinching/hair pulling (2.8%), and name calling (.7%). Girls' aggressive behaviors from highest to lowest frequency followed by percent of their total aggressive behaviors were grabs (37.1%), hits (22.9%), yells (21.4%), pushes (15.7%), with pinching/hair pulling and name calling tied for last with 1.4% each. While boys and girls did not exhibit identical proportions of every behavior, their aggression seemed more similar than dissimilar and the observed differences were not large. For example, although girls had a higher proportion of yelling behaviors 21.4% to 16.2% and grabbing behaviors 37.1% to 31%, boys exhibited a greater proportion of pushes 25.4% to 15.7% while boys and girls showed nearly identical proportions of hitting behavior. The remaining aggressive behaviors--pinching/hairpulling and name calling were of such low frequency that differences in proportions are inconsequential. In general, boys and girls exhibited similar types of aggressive behaviors.

Table 1

Frequencies of Specific Aggressive Behaviors

Aggressive Behaviors	Frequency	% Total Behavior Same Sex
Physical Aggression		
Hits:		
Boys	34	23.9
Girls	16	22.9
Pinches/Hair Pulls:		
Boys	4	2.8
Girls	1	1.4
Grabs:		
Boys	44	31.0
Girls	26	37.1
Pushes:		
Boys	36	25.4
Girls	11	15.7
Verbal Aggression		
Yells:		
Boys	23	16.2
Girls	15	21.4
Name Calling:		
Boys	1	0.7
Girls	1	1.4
Total Physical Aggression		
Boys	118	83.1
Girls	54	77.1
Total Verbal Aggression		
Boys	24	16.9
Girls	16	22.9

Note: All aggression was directed at other children. No aggression was directed at teachers.

Teacher Response to Aggressive Behaviors

The most frequent teacher response to all aggressive behaviors for both boys and girls was no response at all (see Table 2). This was particularly true for girls who received no response to their aggressive behaviors 76.1% of the time. Boys, on the other hand, received no responses to their aggressive behaviors at a much lower rate--58.2% of the time. Loud reprimands were the second most common response to both boys' and girls' aggressive behaviors. Boys received almost 21% of their responses in this form while girls received only 12.7% of their responses in this form. Soft reprimands occurred much less often, but in fairly equal proportions for boys and girls--6.5% for boys and 7% for girls. The remaining responses occurred infrequently for both boys and girls--but particularly for girls who never experienced stimulus removal or proximity control and experienced time-out, physical restraint, and distraction very rarely--1.4% of the time. Boys, on the other hand, received time-out 4.6% of the time, stimulus removal, 3.3% of the time, distraction 3.3% of the time, proximity control 2% of the time, and physical restraint 1.3% of the time.

Table 2

Teacher Response to Aggressive Acts

Teacher Response

	Frequency	% Total Response Same Sex
Non-Response		
Boys	89	58.2
Girls	54	76.1
Loud Reprimand		
Boys	32	20.9
Girls	9	12.7
Soft Reprimand		
Boys	10	6.5
Girls	5	7.0
Time-Out		
Boys	7	4.6
Girls	1	1.4
Stimulus Removal		
Boys	5	3.3
Girls	0	---
Distraction		
Boys	5	3.3
Girls	1	1.4
Proximity Control		
Boys	3	2.0
Girls	0	---
Physical Restraint		
Boys	2	1.3
Girls	1	1.4

Note: Number of teacher responses does not equal number of aggressive behaviors due to multiple responses to one behavior and one response to multiple behaviors.

In general, girls and boys received different teacher responses for their aggressive behaviors. Girls received less attention and fewer loud reprimands than boys. Boys, however, received much more teacher attention and more variation in the types of response they received.

Teacher response was then further broken down to examine how responses varied for the specific aggressive acts of hitting, grabbing, pushing, and yelling according to the gender of the aggressor. (Pinching, hairpulling, and name calling were eliminated from this analysis due to the infrequency of their occurrence). Not surprisingly, girls received proportionately more non-response for all behaviors than boys. This is particularly true for the behavior yelling where girls received non-response 86.7% of the time, while boys received this non-response only 44% of the time. Loud reprimands were given fairly equally to both boys and girls for hitting and grabbing. Boys, however, received loud reprimands 27.5% of the time while pushing and 16% of the time when yelling, while girls did not receive this response at all for these two behaviors. Boys were softly reprimanded for yelling three times as often as girls, while girls were

Table 3

Specific Teacher Response to Specific Aggressive Acts

Aggressive Behaviors	Teacher Response: Non Response	Loud Reprimand	Soft Reprimand	Other Responses
Hits				
Boys	55.3	23.7	7.9	13.1
Girls	66.7	33.3	--	--
Grabs				
Boys	63.3	14.3	6.1	16.3
Girls	67.9	14.3	14.3	3.6
Pushes				
Boys	60.0	27.5	5.0	7.5
Girls	83.3	--	8.3	8.3
Yells				
Boys	44.0	16.0	20.0	20.0
Girls	86.7	--	6.7	6.7

Note: All numbers are percentages. The teacher responses of time-out, stimulus removal, distraction, proximity control, and physical restraint were combined in this table due to the relatively low frequency of their occurrence. Actual frequencies of each response may be found in Appendix E.

softly reprimanded for grabbing behaviors more than twice as often as boys.

Other Findings

Data was further analyzed to determine if teachers were more apt to respond to an aggressing child if he or she was aggressing against a boy or a girl.

According to the third column in Table 4, teachers were twice as likely to respond when a boy aggressed against a girl (68%) as opposed to a boy aggressing against another boy (34%). Girls aggressing against either boys or girls received much lower rates of response which were fairly similar (24.1%--girl aggressing against a boy and 21.9%--girl aggressing against another girl).

Table 4

Gender of Aggressor and Victim in Aggressive Exchange and Rate of Teacher Response

Gender Pairs	freq. of aggres-sive inter-action	% of all aggres-sion	freq. of teacher response	% which received response
Boy-Boy	97	53	33	34.0
Boy-Girl	25	13.7	17	68.0
Girl-Girl	32	17.5	7	21.9
Girl-Boy	29	15.9	7	24.1

Table 4 also indicates that boy-boy interaction accounted for 53% of all aggressive exchanges. This may indicate a boy's greater propensity to play with

other boys (Lyons et al., 1984) or a greater likelihood that boys respond more frequently to aggressive boys than aggressive girls (Fagot & Hagan, 1985; Maccoby & Jacklin, 1980) thus helping to reinforce and increase boy's aggressive behaviors.

Discussion of Results

Teachers, for the most part, responded to the aggressive behaviors of boys and girls by not responding at all. In fact, both boys and girls received this non-response more often than not. Whether these responses were intentional (planned ignoring) or unintentional (teacher not seeing) the effect on the student would be the same--no teacher attention for aggressive behaviors.

This teacher non-response can have two functions. First of all, it can possibly serve to keep an aggressive situation from escalating by letting children resolve it in their own way. This can be a learning experience for a child who finds it is unpleasant, for example, to be "hit back" and therefore, resolves not to hit again. On the other hand, this non-response does not present appropriate alternatives to aggressive behaviors. A lack of response may teach children (particularly girls as they

received non-responses most often) that their actions have little effect on the world around them (Fagot & Hagan, 1985). A greater response to boys, on the other hand, may teach them just the opposite (Serbin et al., 1973).

Previous studies have shown that the greater response to boys' aggressive behaviors tends to come in the form of more reprimands (e.g., Murphy, 1986; Serbin et al., 1973). The present study found this to be true as well. The proportion of loud reprimands given to boys was approximately equal to all other responses to boys combined (excluding non-response). (While the same could be said for girls, they still received a much lower proportion of loud reprimands). Judging from the higher levels of boys' aggression, the loud reprimanding response was not an effective deterrent. (It may even have contributed to boys' increased aggression.) Also, as with non-response for girls, loud reprimands may do little to help boys (or girls) acquire appropriate alternative behaviors.

The differential teacher response observed may have occurred for different reasons. For example, as many studies have shown that boys are more aggressive than girls (e.g., Hyde & Schuck, 1977; Maccoby &

Jacklin, 1980), teachers may have been expecting girls to be less aggressive, and therefore paid less attention to them. (Interestingly enough, teachers did pay a great deal of attention when girls were the target of aggression from boys.) Boys, on the other hand, may have received more attention because teachers expected them to be more aggressive and were more alert to aggressive misbehavior. In both cases, preschoolers lived up to their teachers' expectations.

Although previous studies found boys to be more physically aggressive than girls at a significant level (Hyde & Schuck, 1977; Lyons et al, 1984) the present study found girls and boys to be fairly equal in the proportions of physical to verbal aggression--although boys did have higher frequencies of both verbal and physical aggression. This study, however, was not able to measure intensity. There is, after all, a big difference between a slap on the back and a slug in the stomach, or a push on the carpet and a shove on the playground. It is possible that boys behaved aggressively in a more hurtful or even dangerous manner than girls, thus demanding teacher intervention.

Limitations

The results of this study must be considered with

the following limitations in mind.

- The teacher sample size was relatively small allowing for a greater likelihood of biased sampling.

- It was difficult to account for, and control, such variables as proportion of time actually spent observing each teacher or child due to scheduling variations, absences, etc.

- This study was a naturalistic one. No time sampling was conducted to determine actual amounts of time spent in aggressive behavior. Also the naturalistic tone of this study made it most amenable to non-statistical analysis.

- Observations were limited only to easily observable behaviors and responses. Other more subtle behaviors such as threats, stares, etc. were not included. Also, such teacher "responses" as incompatible alternatives, structure to avoid aggression and reinforcement of nonaggressive behaviors were not included, as they also would have been most difficult to observe.

- The overwhelmingly minority population of students and teachers would make the results of this study most generalizable to other minority populations.

CHAPTER V

SUMMARY, CONCLUSIONS, AND FURTHER RESEARCH

Summary

For various reasons, more children are spending more time in preschool and daycare. Their aggressive behaviors, while not abnormal, are still undesirable and it falls upon teachers to a large degree to help children find alternatives for their aggressive behaviors.

This study was conducted to determine if inner city preschool boys and girls differed in either type or amount of aggressive behaviors displayed. The evidence was also examined to determine if teachers differed in their responses to preschool boys and girls when they behaved aggressively.

The results of this study indicated that of the aggressive behaviors observed, two-thirds were committed by boys. Boys and girls seemed to produce similar aggressive behaviors throughout the data collection period. Teachers responded to these aggressive acts of boys and girls differently. Boys received more attention with the most frequent response in the form of a loud reprimand, while girls received no response three out of four times.

Conclusion

The differential teacher response to aggressive boys and girls was not surprising in considering that such differential treatment has been shown to begin in infancy (Fagot et al., 1985; Miller, 1987; Smith & Lloyd, 1978) and to continue well into the toddler and preschool years (Fagot, 1978; Fagot & Hagan, 1985; Hyde & Schuck, 1977; Murphy, 1986; Serbin et al., 1973). While frequencies of aggressive behavior did vary greatly between boys and girls it was most surprising to find that the actual proportions of such behaviors as hitting, grabbing, and yelling did not vary so widely between the two sexes. It seems that all young children--both boys and girls--have similar needs to express anger and frustration and are meeting these needs in similar ways.

Teachers may be hampered in their attempts to help children meet their needs by a lack of training and experience. In the present study, only 36% of the teachers had more than a high school diploma and the mean number years at Head Start was only 2.6. For many preschools, as well as daycare centers, staff turnover is high, pay is low, and state regulations concerning staff certification are minimal, and therefore the

observed situation is most likely not far from the norm. Preschool teachers can serve their students best only when they are trained to model appropriate behaviors, reward behavior incompatible to aggression, develop communication skills and appropriate classroom routines. Teachers also need to be aware of the disparities present in the way they respond to boys and girls (Murphy, 1986). In this way, emphasis can be placed on each child achieving his or her unique potential, both mentally and emotionally. If teachers have better methods of dealing with undesirable behaviors, they no longer will need to rely (consciously or unconsciously) on stereotypes that may deny children their rights to learn and grow as individuals and ultimately to take their place in society as mentally healthy men and women.

Implications for Further Research

More research is necessary to further the study of preschool aggression and teacher response. First, this study could be replicated in other settings such as upper middle class preschools and daycare. Pearce, (1978) found little difference in the aggressive behaviors of lower class and middle class preschoolers. More research is needed, however, to determine if the

present study's findings could be widely generalized.

Secondly, it must be remembered that teachers are not the only responders to preschool aggression. In the present study, it was found that peers (often the aggressor's victims) responded to the aggressor in various ways--by laughing, running away, talking, ignoring, or tattling. While some studies have found that children were more likely to respond to aggressive boys (Fagot & Hagan, 1985; Fagot et al., 1985) further research could define more clearly how such responses influence aggressive behavior.

Finally, another consideration for further research would be to examine the activities which boys and girls choose and their possible relation to aggressive behaviors. Bullock and Merrill (1980) found that boys tended to pick situations which were conducive to aggressive behavior (such as playing leapfrog or king-of-the-mountain) when given a choice between two activities.

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Appendix A

Aggressive Behaviors -- Behaviorial definitions

1. hit -- to strike a person with hand (open or closed) or with object held in hand.

2. kick -- to strike with foot.

3. bite -- to seize with teeth any part of another child's body.

4. grab an object -- to forcefully or suddenly take an object from another without asking consent.

5. grab a person -- to forcefully or suddenly take hold of another person without asking consent.

6. push -- to press against another person with enough force to cause him or her to move. May be done with whole body, hands, feet, elbows, head, shoulders.

7. yell, shout, scream -- to suddenly cry out loudly enough to be audible to all in room. In form of a command, e.g., "Give that back", "Stop it", or exclamation "Hey".

8. Name-call -- to use offensive names when referring to another, e.g., "stupid", "dummy", or obscenities.

Appendix B

Teacher Response -- Behaviorial Definitions

1. physical restraint -- to physically prevent one from acting by holding or blocking.

2. loud reprimand -- to verbally correct a person and/or his actions in a voice audible across the room.

3. soft reprimand -- to verbally correct a person and/or his actions in a voice audible only to child and his neighbors.

4. time-out -- removing a child from a situation by having him leave the room or sit out of an activity for a period of time.

5. stimulus removal -- taking an item or activity away from a child.

6. distraction -- offering alternative toy, activity, or direction without directly commenting on aggressive behavior.

7. proximity control -- teacher moves to or near aggressive situation without taking any other action.

8. non-response -- teacher does not make any observable response. May be done intentionally or unintentionally.

Appendix C

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A Study of Adult Interaction with Aggressive Preschoolers

You are invited to participate in this research project because you are a teacher working with preschool children. The purpose of this study is to evaluate adult interaction with children who are behaving in an aggressive manner.

You will not be asked to deviate in any way from your daily routine in the classroom, except to allow the investigator to observe in your classroom for certain periods of time (for example, two to three hours at a time). The observer will be watching for, and taking notes upon, incidents of aggressive behavior among your preschool children as well as noting responses of adults and other students to these behaviors. It is anticipated that data collection will not extend beyond a two to three month period this fall with several different observation periods in each of several classrooms. You will be given an opportunity to learn final results of this study upon its completion.

No risks are anticipated as a result of your participation in this study. No attempt will be made to teach, change, or respond to any behaviors observed by the investigator. As a result of this study, it is hoped that teachers can improve their interactions with young students.

Any information obtained during the research which could identify you and which is connected with this study will remain confidential. No names will be used in compiling the results of this study.

Participation is voluntary. Your decision whether or not to participate will not affect your present or future relationship with Head Start. If you decide to participate, you are free to withdraw your consent and to discontinue participation at any time.

Any questions you have will be answered by Theresa Wiehl or John W. Hill, Ph.D.

YOU ARE VOLUNTARILY MAKING A DECISION WHETHER OR NOT TO PARTICIPATE. YOUR SIGNATURE INDICATES THAT YOU HAVE DECIDED TO PARTICIPATE HAVING READ THE INFORMATION PROVIDED ABOVE. YOU WILL BE GIVEN A COPY OF THIS CONSENT FORM TO KEEP.

_____ _____

Signature of Subject Date

_____ _____

Signature of Investigator Date

Theresa Wiehl 334-0544 John W. HIll, Ph.D. 554-2201

Appendix D

Center-Behavioral Observation Recording Form

Date _____

Time of Day _____

Classroom _____

Behavior Boy	Girl	Teacher Resp.	Aggressor Resp.	Victim Resp.	Anectodal Record

Appendix E

Frequency and Percentage of Teacher Response to Aggressive Behaviors

Aggressive Behavior	Teacher Response			
	Non-Response	Loud Reprimand	Soft Reprimand	Time-Out
	f/%	f/%	f/%	f/%
Hits				
Boys	21/55.3	9/23.7	3/7.9	3/7.9
Girls	10/66.7	5/33.3	- --	- --
Pinches/Hairpulls				
Boys	1/25.0	3/75	- --	- --
Girls	1/100	- --	- --	- --
Grabs				
Boys	31/63.3	7/14.3	3/6.1	2/4.1
Girls	19/67.9	4/14.3	4/14.3	1/3.6
Pushes				
Boys	24/60.0	11/27.5	2/5	1/2.5
Girls	10/83.3	- --	1/8.3	- --
Yells				
Boys	11/44	4/16	5/20	- --
Girls	13/86.7	- --	1/6.7	- --
Name-calls				
Boys	1/100	- --	- --	- --
Girls	1/100	- --	- --	- --

Appendix E (cont.)

Aggressive Behavior	Teacher Response			
	Stimulus Removal	Dis-traction	Proximity Control	Phys. Restraint
	f/%	f/%	f/%	f/%
Hits				
Boys	1/2.6	1/2.6	- --	- --
Girls	- --	- --	- --	- --
Pinches/Hairpulls				
Boys	- --	- --	- --	- --
Girls	- --	- --	- --	- --
Grabs				
Boys	1/2.0	2/4.1	1/2.0	2/4.1
Girls	- --	- --	- --	- --
Pushes				
Boys	1/2.5	- --	1/2.5	- --
Girls	- --	- --	- --	1/8.3
Yells				
Boys	2/8.0	2/8.0	1/4.0	- --
Girls	- --	1/6.7	- --	- --
Name-calls				
Boys	- --	- --	- --	- --
Girls	- --	- --	- --	- --