

FATHER'S TIME SPENT WITH HIS FIRSTBORN
CHILD BEFORE AND AFTER THE BIRTH
OF A SECOND CHILD

By

KARI WILLINGHAM-RAINS

Bachelor of Science

Oklahoma State University

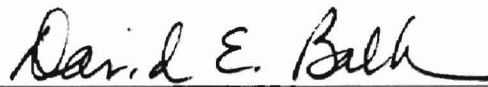
Stillwater, Oklahoma

1999

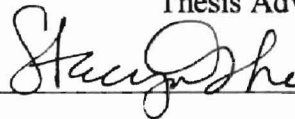
Submitted to the Faculty of the
Graduate College of the
Oklahoma State University
in partial fulfillment of
the requirements for
the Degree of
MASTER OF SCIENCE
May, 2001

FATHER'S TIME SPENT WITH HIS FIRSTBORN
CHILD BEFORE AND AFTER THE BIRTH
OF A SECOND CHILD

Thesis Approved:



Thesis Adviser







Dean of the Graduate College

ACKNOWLEDGMENTS

I would like to convey my deep appreciation to Dr. Stacy Thompson for being such an excellent advisor, teacher, mentor, and friend. I would also like to express gratitude to the members of my committee, Dr. David Balk and Dr. Amanda Harrist for all of their patience, support, and encouragement. I am truly indebted to you all. I would like to extend thanks to Steve McClaskie of The Ohio State University for his assistance with the National Longitudinal Survey of Youth 1979 data set.

I wish to express my sincere appreciation to my parents, Steve and Kristy and to my sister Jennifer, who have supported me spiritually, emotionally, and financially throughout my academic career. I would like to give special thanks to my husband, Darrick for being so patient and supportive through this entire process.

Finally, I would like to express thanks to Oklahoma State University and the Department of Family Relations and Child Development for this opportunity to further my education.

TABLE OF CONTENTS

Chapter	PAGE
I. INTRODUCTION.....	1
Statement of the Problem.....	2
II. REVIEW OF THE LITERATURE	4
Existing Literature.....	4
III. METHODOLOGY.....	22
Research Design	24
Subjects	24
Demographics.....	24
Methods and Instruments.. ..	25
IV. RESULTS.....	27
Analyses.....	27
Results of Analyses.....	28
V Discussion	31
Summary.....	31
Limitations of Present Study.....	34
Further Considerations.....	34
Implications and Further Research.....	35
REFERENCES.....	36
APPENDIXES	43
APPENDIX A—Tables.....	44
APPENDIX B—Figures.....	47
VITA	

LIST OF TABLES

Table	Page
1. Demographics.....	38
2. Paired t-test comparing time spent.....	39
3. Reliability analysis of sex-role scale.....	40
4. Paired t-test comparing sex-role attitudes.....	41

LIST OF FIGURES

Figure	Page
1. Belsky's process model of the determinants of parenting.....	43
2. Father's time spent.....	44

CHAPTER I

INTRODUCTION

Fatherhood diversity became an innovative topic for research in the 1990s (Marsiglio, Amato, Day, & Lamb 2000) with much more emphasis on the assortment of the American fathers' diverse cultural and ethnic backgrounds, living arrangements, and responsibilities. Yet research has seldom focused on the role of the father in arenas other than presence or absence in the household (Marsiglio et al, 2000). While the evolving characteristics and impacts of father-child interactions have played a role in many areas of child development and child relationships, studies have infrequently focused on these interactions. Marsiglio et al (2000) highlighted the need for assessment and survey measures for better representation of fatherhood experiences.

Historically, studies have focused on the interaction and change in the relationship of the mother and her firstborn child (Dunn & Kendrick, 1981). Father-firstborn child interactions and relationships were rarely a focal point; however, Lamb (1978) cites the importance of the extra time commitment placed on the father to the firstborn for promotion of acceptance of a new baby by the older sibling.

The interaction between the mother and child has been studied extensively, as noted in the following articles discussed in this paper. Research is lacking in studies on the interaction between father and child. Since there were differences in mother-child relationships and father-child relationships (Lamb, 1977), it is important to turn the focus to fathers and their children. Russell and Russell (1987) cited differences in interaction patterns between mothers and fathers with their children. For example fathers interacted with their children less frequently than mothers did, they were less involved in caregiving

activities, and the interaction between the father and his child was characterized as physical play (Russell & Russell, 1987). Although fathers may not have engaged as frequently as mothers did in caregiving activities, fathers are as adept as mothers are in caregiving activities (Lamb, 1981). The differences between mothers' and fathers' interactions with their children have been noted in a study by Austin, Summers, and Leffler (1987). They examined the difference in communication styles of mothers and fathers with their children, alone and together. Fathers were reported to use awareness statements more often than mothers. Fathers were also found to encourage play more often than mothers.

The differences in interactions, activities, and behaviors between mothers and fathers have been cited above. Yet the primary focus of research literature remains on the mother and her child. Now is the time to dedicate research and focus to the unnoticed father in the development of the child and the family.

STATEMENT OF THE PROBLEM

The relationship between the father and child has been ignored for too many years. Very little research has been conducted about the factors that affect the relationship between the father and his children. Phares and Compas (1993), in a review of parenting literature, found that research publications for the previous decade designated 48% of their articles to mother influences and only 1% of their articles to father influences in child behavior from 1984 to 1991. It is extremely important to consider the role of the father in the development of a child and his adaptation into a new family environment. Cultural norms and traditional roles have hampered the study of the father's influence. For many years the father has been viewed primarily as the breadwinner and may have

been deterred from child care activities because of conceptions about masculinity (Copenhaver & Eisler, 2000). As we enter into a new millennium, it is imperative to research and to evaluate all aspects of influence on child development and not solely on the relationship between mother and child.

CHAPTER II *Review of Literature on the parents*

Existing Literature

The following review of literature includes information about the family and child aspects that will be the focus of the present study. The first section contains theoretical basis for the present study, followed by mother-focused studies, father-focused studies, and concluding with a section concerning sex-role attitudes.

Theoretical Model

Jay Belsky's process model (Belsky 1984) of the determinants of parenting was the foundation for this study (see Figure 1). The model relied on the following assumptions: parenting was influenced by individual personality of the parent, characteristics or personality of child, and social context. The individual personality of the parent was influenced by the marital relationship, developmental history of the parent, occupational experiences of the parent, and social networks. The influence of all of these forces had an impact on the parenting characteristics of the parent and indirectly affected individual personality of the parent, characteristics or personality of the child, and social context. The child characteristics, like temperament, also influenced parenting characteristics and child development. Developmental history of the parent could have had a significant impact on the child's development playing a considerable role in the parenting of the child and in the development of the child. Developmental history influenced the parent's personality development also. Experiences while growing up affected personality development and views, values, and beliefs of parenting. All of these and many other factors could have had a varying degree of impact on parenting and child development, according to Belsky.

The addition of another child could have affected this model. If the marital relationship was altered with the addition of a second child, the development of the firstborn child could have been directly affected (Belsky, 1984). Conversely, the impact of characteristics, such as temperament of the firstborn child, could have affected parenting. Changes in social networks and support could alter parenting and child characteristics as well. With the birth of a second child, the father may have spent more time with the firstborn child while the mother cared for the second child. The father may have had difficulty in dividing time between work, his marital relationship, and his time with his children.

The majority of studies about parent-child interaction did not examine the relationships between both parents and the child but focused on one member of the parent dyad and the child. Because there was incomplete information about both mothers and fathers and their relationships with their children, the literature reviewed for this paper covers both dyads.

Mother-Focused Studies

The following mother-focused studies examined aspects of the relationship between the mother and the firstborn child after the birth of a second child. They focused only on the mother and child and did not account for the father's relationship with the child.

In the first study, Baydar, Greek, and Brooks-Gunn (1997) linked changes in the family environment to the birth of a new infant. There were changes in the mother-firstborn child relationship and changes in the firstborn child's cognitive and socio-emotional development after the birth of a second child. The sample consisted of a cohort

of women from the National Longitudinal Survey of Youth data from 1986, 1988, and 1990. The children in the study ranged in age from 6 to 23 months. The data used were from 673 White, non-Hispanic children ranging in age from 3 to 5 years at the time of the 1986 survey. Measures used for this study were the Motor and Social Development Scale, the Peabody Picture Vocabulary Test (PPVT), and four measures of early socio-emotional adjustment that measure fearfulness, compliance, clinginess, and positive affect.

The mothers completed the Motor and Social Development Scale and answered age-appropriate items about tasks their children were able to complete. Closed-ended questions were asked about their children's ability to verbalize, sit, crawl, as well as other developmental tasks based on the Bayley Infant Scales of Development and the Denver Developmental Screening Test assessments. The PPVT measured the receptive vocabulary of the children in the survey who were three years or older at the time of the survey.

The measures of socioemotional development were from the NLSY temperament battery and were based on maternal rating. Fearfulness was assessed at baseline where mother reported the child's reaction to a stranger, animals, loud noises, as well as other similar things. Positive affect was also assessed at baseline; mothers reported their child's difficulty in soothing, fussiness, and readiness to laugh. The compliance scale was assessed at the first follow-up. Mothers reported how their children resist regulation in their daily activities and routines. The clinginess-security scale was also assessed at the first follow-up.

The authors found that after the birth of a second child, the mother worked less and the children were less likely to attend child-care. The parents were less likely to divorce or separate. No effect on opportunity for the older child's skill development was reported. Changes were also noted in the mother's parenting style. There was an increase in the controlling style of parenting by the mother after the birth of a second child and the birth of a second child was likely to increase the use of physical punishment. Obtaining better measures for patterns of family interaction before and after the birth of a second child was suggested for future research. They also noted a lack of research in the interaction between the father and the firstborn child.

Socio-emotional changes in the firstborn child after the birth of a second child were also the focus of a study by Baydar, Hyle, and Brooks-Gunn (1997). The sample for their study was the same cohort of women and children used in the previous study. The average age of 673 White, non-Hispanic mothers was 21.1 years and 52 months for their children. There were three main aspects of the family environment examined as a mediator after the birth of a second child: opportunities provided for the older child for skill development, affective quality of mother-child interactions, and disciplinary style of parenting. The measures used in this study were the Peabody Picture Vocabulary Test, child outcomes, and availability of developmental resources, occurrence and timing of the birth of the second child, the global self-worth scale, and the Behavior Problems Index.

The reading comprehension scores from the Peabody Picture Vocabulary Test were used for children who were 5 years or older in 1988 and for children 6 years or older in 1990. The Behavior Problems Index used maternal ratings of antisocial,

depressed, anxious, dependent, hyperactive behaviors, as well as peer-conflict and withdrawn behaviors. The global self-worth portion of the Self-Perception Profile was completed by children who were 8 years or older. The children were given two examples of children; the children were then asked which one they were more like and were given a score of 1 to 4. Those scores were converted into percentile scores.

The results of this study indicated that economically disadvantaged children have fewer opportunities for skill development after the birth of a second child. The mothers of these children had fewer resources available than mothers who were not economically disadvantaged. Baydar et al. (1997) also found that the self-esteem of older children was more vulnerable after the birth of a second child than children who are younger at the time of the birth. The birth of a second child did not reduce the developmental resources for the older children. The researchers found that when the older child was a girl, the parenting style became more punitive after the birth of a second child. Fearful of biases, the authors pointed out that future studies performed in this area might consider using measures other than maternal report. They were also concerned that this study provided short-term outcomes of the birth of a second child.

In a similar study also focusing on only the mother and child, Dunn and Kendrick (1981) identified factors associated with the birth of a second child and the effects on the firstborn child. They wanted to know how the birth of the second child would affect the relationship between the mother and her firstborn child. Forty families from the Cambridge, Massachusetts area were interviewed and observed on 14 different occasions: from 1-3 months before the birth of the second child until that child was 14 months old. Firstborn children's ages ranged from 18 to 43 months.

The authors performed pre-sibling birth interviews asking the parents about the firstborn child's feeding and sleeping behavior, toilet habits, attention seeking behavior, independence and dependence, and the child's fears and worries. The post-sibling birth interviews consisted of the same questions about the firstborn and his or her behavior towards the new second child as reported by the mother only.

There were marked changes found between the interaction of the mother and her firstborn child resulting in decreased attention of mother to the firstborn and increased confrontation between the two. The results from the variables measured were as follows: The first variable was temperament; if the child scored above the median on negative mood, he or she was more likely to have increased withdrawal and sleeping problems. If the child had a higher than median score in negative mood and intensity, he or she proved to be more clingy. The second variable examined gender of the firstborn; boys were more likely to withdraw than girls were. The third variable, mothers, found tired or depressed mothers were more likely to have children with increased withdrawal behavior. Age of the younger child was the fourth variable; younger children were more likely to express clingy behavior than the older firstborn children. Mother-child interaction was the fifth variable examined; if there was a significant decrease in the interaction between the mother and the firstborn, then it was reported that the child was more irritating to the new second child. The sixth and final variable found that if the baby was bottle fed, the firstborn child was reported more likely to be irritating to the baby than if the baby was breast-fed. Increased clinginess, withdrawal, and fearfulness were negatively related to positive interest in the baby.

In summary, children who were more likely to be negatively affected by the birth of a second child scored above the median in negative mood or temperament, clinginess, tearfulness, and intensity. Mothers who decreased the amount of time spent with their firstborn were more likely to report the child was irritating to the new baby. The authors emphasized that the study was based on a small non-random sample and should not be generalized to a larger population. Future research should use a broader random sample.

The relationship of the mother and firstborn child was also the focus of a 1982 study by Dunn and Kendrick. These authors found that an increase in confrontation between the mother and her firstborn child was reported after the newborn second child was eight months old. Maternal attention and play between the firstborn never returned to the level it was before the birth of the second child. They also found that the firstborn had trouble sleeping, feeding, and toilet training. They found an increase in demanding behavior and withdrawal. Dunn and Kendrick stated that the temperament of both firstborn and second child and the nature of their relationship were dependent effects of the second child influence.

Dunn and Kendrick (1980) again were concerned with the changes in the interaction between the mother and the firstborn child. They studied their interaction before and after the birth of a second child. The study consisted of 41 families interviewed and observed 1 to 3 months before the birth of a second child and until the second child had reached 14 months of age. The observational measure, the Wilcoxon t -test, was used to assess the change in behavior of mother and firstborn. There were 35 changes measured with decreased noted in the following measures: time spent in joint play, time the firstborn child was held by mother, affectionate contact, maternal giving,

helping the child, showing or pointing to objects for the child, and making suggestions to the child. In summary, after the birth of a second child, interaction between the firstborn and the mother decreases. Maternal attention and play between the mother and the firstborn decreased as well. Individual differences were noted in measures of maternal behavior.

In a 1997 study of both mothers and fathers, Volling focused on differential treatment between mothers and fathers of young children. She studied 30 married, Caucasian couples with two preschool-age children. These families were observed in their homes on two separate occasions. The researcher brought age-appropriate toys and two Fisher Price play sets for observation of interaction and play. The parents completed the Sibling Inventory of Differential Experience and the Braiker and Kelley (1979) Scale of Intimate Relations.

The author found no significant differences between the mother's reports of differential treatment, enjoyment, discipline or favoritism. Conversely, fathers reported a difference in enjoyment and favoritism, but not discipline. Sixty percent of the mothers and fathers reported favoring each child equally. In 10 of the 30 families, mothers and fathers reported disciplining each child equally. Nine of the families reported that the older child was disciplined more frequently. The author found marital satisfaction and many other factors played a role in the differing reports between the parents and suggested that a larger more extensive study be conducted for further exploration.

The majority of studies cited the relationship between the mother and the firstborn child is negatively altered after the birth of a second child. Additionally, many of the studies cite negative outcomes for children immediately after the birth of a second child.

There is no mention of interaction of the father in the family environment or his affect on child outcomes or relationships.

Father-Focused Studies

Although father-focused studies are gaining popularity, there is still a void in this area. The studies chosen for this section of literature review focused on two different studies of father-child relationships. The first section focused on the relationship between the father and his child. The second section focuses on the amount of time the father spends with his child and implications thereof.

Palkovitz (1985) reviewed studies that investigated the effects of the attendance of the father at the birth of his baby. He found a study by Greenberg and Morris (1974) that asked 30 fathers to complete questionnaires 48 to 72 hours after the birth of their child. They found that fathers who attended the birth of their child reported a higher level of confidence and ability to interact and identify with their child than fathers who did not attend the birth. Observational studies reviewed by Palkovitz include a one-year longitudinal study by Peterson, Mehl, and Leiderman in 1979 who found 46 families willing to participate in the observations. They were observed 6 months before the birth of their child and 6 months after the birth. Levels of attachment between the father and the child were measured by observation of the fathers while during the hospital visit. More involvement and sensitivity by the father toward the birth of their children and their wife's labor indicated a high level of attachment with their children. Additionally, high correlations between marriage satisfaction and attachment between fathers and child were found. Overall, Palkovitz found that father's presence at the birth of his child is only one factor of many that influences paternal involvement.

In 1996, Anderson investigated the factors that influenced the relationship between the first-time father and his infant during the first two months of life. The sample consisted of 14 fathers who were married, 12 with a college degree and family income ranged from \$20,000 to \$60,000. The infants in this study showed no sign of congenital anomalies at the time of birth. The fathers were interviewed using open-ended questions about the father's relationship with and perceptions about the infant, spousal support, and his view of himself as a father.

The study found many factors influencing the relationship between the father and the infant. Fathers found they had to adjust and make room for the baby as they were more exhausted by work after the birth of a baby; they had less of a social life, and reported changing marital relationships. Future directions, as suggested by the author, included making room for a second, third, or fourth baby, how to make room for twins, or an adopted child. They also suggested gathering information from the wife for her perspective as well.

In a 1996 study by Belsky, the individual differences of the infant-father relationship were assessed. One hundred twenty-six Caucasian, middle and working class families with firstborn sons were assessed for this study. The median age of the fathers was 31 years of age and median age of the infants was 10 months of age at the beginning of the study. Of the 126 participants, 17 fathers were primary caregivers.

The fathers were asked to complete the Infant Behavior Questionnaire, the Braiker and Kelly (to assess marital quality), the Social Support Questionnaire, selected portions of NEO Personality Inventory, and a work-family questionnaire. Infant attachment was assessed using the Strange Situation (Ainsworth et al., 1978).

Belsky found that secure attachments between the firstborn son and father were more likely to occur in instances when the father reports a higher number of available resources. Furthermore, fathers who were reported to be more extraverted were more likely to have an infant with secure attachment. Neuroticism was found not to have a high correlation with secure infant attachment. Fathers of securely attached infants reported a higher level of support and satisfaction between home and work. Paternal perceptions of infant temperament were not found to differentiate between secure and insecure infant attachment. Insecure-avoidant infants were reported to be more positive than insecure-resistant infants at 10 months of age.

The focus of a longitudinal study by Volling and Belsky (1992) was mother-child and father-child relationships and their influences on the quality of second child interaction. They found that many past studies focused on the mother-child relationship and overlooked the father-child relationship. Thirty Caucasian, married, middle working class families participated and sibling pairs consisted of 6 sister pairs, 9 older brother-younger sister pairs, 5 older sister-younger brother pairs, and 10 brother pairs. Median ages for the older sibling were 72 months and 39.8 months for the younger sibling.

The families entered the study during the last trimester of the mother's pregnancy with her first child. The families were observed extensively throughout the first year of the oldest child's life. Infant-parent attachment assessments were observed and completed during the first year. The families were brought into the laboratory on two different occasions when the firstborn child reached three years of age. On the first visit, the mother and child were observed; the father and child were observed on the second

visit. Families who had two children in preschool were invited back again when the firstborn child was 6 years of age.

The families were observed in their homes when the firstborn child was 6 years old on two different occasions 2 to 3 weeks apart. The children were observed playing with Fisher-Price play sets and an assortment of toys brought by the researcher. The interactions between the children and parents were taped and coded during the observations. The researchers looked for the frequency of prosocial behavior initiated by each second child and the dyadic measure of shared positive effect. They found conflict initiated by the older second child correlated with the dyadic aggression score. Mother-older child conflict indicated higher levels of aggressive conflict-ridden children. Higher levels of conflict between children were more likely to occur in families where the mother reported to be more controlling with the firstborn than with the younger second child. Lower levels of aggression were found in families where the father reported to be more affectionate towards the younger second child than towards the first.

In a study by Daly (1996), fathers were asked to provide how much time they spent with their families and the experiences they had with their children. Twenty-seven Caucasian fathers of young children were asked to complete a face-to-face interview with the researcher. The sample expressed that spending time with their children was very important to being a good father. They expressed the need to make more time for their children and reported tension between work time and family time. The researcher expressed concern about the report of family time and the exclusion of children or wives' reports as well. Future research should focus on a wider more generalizable sample and the implication of the wives and children.

The amount of time fathers spend with their children was studied in Yeung, Sandberg, Davis-Kean, and Hofferth (2001). The authors felt it was important to examine the interactions between fathers and their children, how much time they spent together, and the change in time spent when the mother works. The sample of 2,400 families was drawn from the 1997 Child Development Supplement to the Panel of Income Dynamics. Each family had a child between the ages of 0 and 12 years at the time of the interview. The families were given a diary to record child activities for a 24-hour period on the randomly assigned day (weekends were included). The primary caregiver was responsible for the diary. The authors divided daily activities into six categories: personal care, play and companionship, achievement-related, household, social, and other activities.

Results indicated that children from intact families spent 1 hour and 13 minutes on weekdays with their fathers and 3.3 hours on weekend days. Most of the interaction between father and his child was spent in play activities (39%). The category second to play was personal care. These activities included bathing, dressing, and grooming.

Ahmeduzzaman and Roopnarine (1992) looked at the relationship of income, age, marital history, educational support and involvement in child care activities by African American fathers with their children. Participants for this study were forty-five lower to middle class fathers of preschool children (3 to 5 years) from intact families. The fathers completed the Paternal Involvement and Child Care Index, the Family Functioning Style Scale, and the Profile of Family Support Scale.

The authors found that African-American fathers reported spending an average of 2.8 hours in primary caregiving activities per day. Commitment to family and ability to

communicate positively related to the father's involvement in child care. The higher the father's education, family income, marital stability, and family support, the higher the father's involvement with his child.

Parental time spent with sons with behavior problems was the focus of study by Fitzgerald, Zucker, Manguin, and Reider (1994). Their research focused on the differences in maternal and paternal perceptions and the predictors of children's behavior. The Child Behavior Checklist, the Child Behavior Rating Scale, and the Conners Parent Questionnaire were completed by the sample of 107 families. The families had a son between the ages of 3 and 5 years who was at risk for alcohol or substance abuse, and antisocial behavior. Participants were divided into three categories: high-, medium-, and low-contact based on the amount of time spent with children. The families were contacted by phone on one weekend day and two weekdays to assess the amount of time spent with children and parents daily activities.

The authors found that fathers who spent more time alone with their sons reported the same perceived level of aggression by their sons as the mothers did. Conversely, families in which the mother spent significantly more time alone with the son had discrepancies in reports of child's aggressive behavior.

Fatherhood has been explained as an evolving and constantly changing set of intricate roles with divergent expectations and ambiguousness (Peterson & Steinmetz, 2000). Because of this ever-changing phenomenon, a father in this review of literature reported higher levels of adjustment to fatherhood than expected and changes in relationships with their child after the birth of a sibling. The amount of time a father spent

with his child was found to affect the child's level of aggressiveness and amount of behavior problems.

Sex Role Attitudes

The interaction of sex role attitudes and beliefs was connected with marital satisfaction and the amount of time the father spent with the child in that fathers who held traditional beliefs about sex roles within the family might not have found spending a significant amount of time with children in his realm of responsibility. The traditional father might have believed his responsibility comprised providing for the family (Marsiglio, 2000). The ideas of sex role attitudes played a part in the marital relationship as stated in the following studies.

Bonney, Kelley, and Levant (1999) conducted a study to assess the relationship of marital satisfaction to the amount of time spent with children. The sample included 120 couples (residing in the same household) with children between the ages of 1 and 4 years old. The mothers and fathers were asked questions about the amount of time spent with their children. They were also asked to complete a questionnaire about amount of involvement in child care activities, the Male Role Norm Inventory, the Beliefs Concerning the Parental Role Scale, the Kansas Marital Satisfaction Scale, and questions about the demands of their jobs.

The results showed that the more hours a week the mother worked the father was the child's caregiver and the more hours per week the father worked lessened the amount of time he spent with his children. Fathers with more liberal ideas about masculine roles and less traditional ideas about roles resulted in the higher confidence by the mothers in the father's child caring abilities. Fathers as primary caregivers were the result of liberal

parental roles by more liberal beliefs by the mothers. Families reported higher marital satisfaction when the fathers were more involved in child care.

Marital satisfaction after the birth of a child is reported to decline because of child-focused activities instead of spouse focused activities (Belsky and Rovine, 1990). Wallace and Gotlib (1990) cited the important predictor of marital adjustment after the birth of a child was the marital relationship prior to the birth of a child. The father's participation in child care was found to be predictive of the marital relationship and reported marital satisfaction (Levy-Schiff, 1994).

In a look into the cultural diversity of families in America, Toth and Xu (1999) examined cultural differences and attitudes about parental roles in American families. They examined African-American, Hispanic, and White families. Their focus was on the individual differences of father's attitudes across ethnic and racial boundaries. The authors used data from the National Survey of Families and Households. The study consisted of 1,258 fathers and their 5-18 year old children. The White population made up the majority with 929 respondents, followed by 210 African-Americans, and 119 Hispanics. How much time the fathers spent with their children was categorized into 3 categories: behavioral, affective, and cognitive. The fathers were asked how many times they engaged in certain activities with their children.

The fathers were also reported on gender ideology and parental role. Gender ideology questioned the respondent's ideas about traditional roles of parenting, gender beliefs, and family ideology. Parental role assessed the respondents' level of commitment to parenting. The authors found that African-American and White fathers were more likely to supervise and monitor their children's activities. African-American fathers were

found to use a more controlling style of parenting than White fathers. Hispanic fathers were found to spend more time involved in activities with their children than the other groups.

Additionally, fathers who held non-traditional attitudes and beliefs about parenting and gender roles spent more time with their children. African-American fathers reported more traditional gender ideologies and role ideas than the other two groups. These fathers had higher cognitive involvement with their children than the other groups, and were concerned with what their children were watching on television and compliance with family rules.

The relationship between gender role attitudes, family formation, and household roles was the focus in a study by Kaufman (2000). Data were collected from the National Survey of Families and Households. The study interviewed 2,621 men and women (without children) in their childbearing years about fertility intentions, actual fertility outcomes, and gender role attitudes. The results indicated that participants who had egalitarian attitudes about gender roles and fertility were more likely to report wanting to have children than participants with traditional attitudes. Participants with egalitarian attitudes were more likely to cohabitate than participants with traditionally held beliefs.

Egalitarian men were more likely to remain in relationships and less likely to end a relationship than traditional men as well. Egalitarian women reported wanting to have children slightly less than traditional women. Egalitarian women wanted to spend more time focusing on a career and less time on housework and child care. Egalitarian men reported wanting to have a child because they wanted to share in the responsibility of

raising a child, not only to support it as reported by traditional men. They believed that raising children should be a shared responsibility of both the mother and father.

It is important to consider the beliefs and ideas about parenting held by the father when examining the father-child relationship. Fathers who hold traditional gender ideas and beliefs about parenting are less likely to be as involved with their children as fathers with non-traditional beliefs (Marsiglio et al., 2000).

Purpose of Study

The purpose of this research study is to examine the changes in the amount of time spent between the father and his firstborn child after the birth of a second child. The existing literature has confirmed there is little research and information on the changes in the amount of time spent between the father and firstborn child after the birth of a second child. The birth of a second child is expected to affect the firstborn child and the family environment. The changes in sex role attitudes will also be examined. Kaufman (2000) stated that more traditional sex role attitudes were related to the amount of time a father interacts with his child; more traditional attitudes led to less time spent in direct interaction between a father and his child. Conversely, the more liberal or egalitarian attitudes held by fathers led to increased interaction between father and child. For the purposes of this study, the focus will be on the father-child interaction and changes in the family environment by examining changes in sex role attitudes of the mother.

Baydar, Greek, and Brooks-Gunn (1997) found a decrease in opportunities for skill development between the mother and the firstborn child after the birth of a second child. Therefore, it is expected that the instances of decrease in opportunities for skill development will vary for families who have a father and mother present and families

who do not have a father present. But should not decrease in cases where there is a father present. The hypotheses for this study are as follows:

Hypothesis 1

The amount of time the father spends with the firstborn child will increase after the birth of a second child.

Hypothesis 2

The amount of time the father spends with the firstborn child before and after the birth of a second child is related to sex role attitudes of the mother.

CHAPTER III

Methods

The National Longitudinal Survey of Youth 1979 (NLSY79) was the source of data for this study. The National Longitudinal Survey (NLS) was a study sponsored by the Bureau of Labor Statistics, U.S. Department of Labor. The data set contained information on four cohorts beginning in 1966 through 1999 and continues today. The cohorts included older men, mature women, young men and young women. The content of the survey had been adapted throughout past years. Beginning in 1966, the NLS sought information about labor markets, women entering the workforce, and retirement. In 1979, the survey included information from young adults and children. Since then, the NLSY has expanded to include child information, time use, educational attainment and experiences, family issues, as well as other information about the cohorts (NLS, 1999).

Research Design

This study used the NLSY79 to examine the relationship of the amount of time spent between the father and his firstborn before and after the birth of his second child. Specifically, this study focuses on the differences in amount of time spent with children for fathers with one child versus fathers of two children. The differences in sex role attitudes of the mother before and after the birth of a second child were also considered.

Demographics. The participants of the NLSY79 consisted of 12,686 men and women ranging from 14 to 22 years of age at the time of the 1979 interview. The sample included 38 fathers and their partners (see Table 1); fathers ranged in age 18 to 38 years in 1988. The sample was 68.3% White, 24.4% Black, and 7.3% Hispanic. Mean income

was \$14,860 for 1982 and \$25,976 for 1988. In 1982 there were 38 fathers with one child who are included in this study, 38 fathers with 2 children were included for 1988.

Supplemental information from the fertility section of the NLSY79 provided information about the dates of birth of the children, infant and child care information, and postnatal care (NLS, 1999). The NLSY79 utilized an assortment of methods to collect data for the survey throughout the life of the survey. Except for telephone interviews in 1987, face-to-face interviews were used to collect data in all the years from 1979 to 1992 (NLS, 1999). And in 1993 the NLSY exploited the use of technology and computers to assist in data collecting.

Sex Role Attitude. Sex role attitudes were assessed by selecting 5 of the 8 items from the Sex Role Traditionalism Scale in the NLSY79 that had the greatest inter-item reliability (see Table 2). Respondents were asked whether they strongly disagree, disagree, agree, or strongly agree with questions about sex roles. The items selected were 'woman's place is in the home', 'a wife with a family has no time for a job', 'employment of wife leads to juvenile delinquency', 'belief of traditional husband/wife roles', and 'women are happier in traditional roles'. The scale was scored on a 4-point scale, with a score of 1 = strongly disagree and a score of 4 = strongly agree. Internal reliability for 1982 and 1987 was .58 and .55, respectively. Scores range from 5 to 20, higher scores (13 to 20) represented more traditionally held sex role attitudes than lower scores (5-9).

Time Use-Household Chores & Child Care questionnaire. The variables used from this questionnaire evaluated the provider of child care and the amount of time the

child spent in child care. For this analysis, time spent was measured in the amount of time spent in primary and secondary child care.

Methods of Data Analysis.

The changes in the amount of time spent between the firstborn and the father were measured by using paired sample t -tests. The data were based solely on the mother's report of who the provider of child care was for the firstborn child and how much time the child spent with the provider. There were inconsistent data about the amount of time spent between the father and his child; there were 38 fathers at time one and only 23 for time two but only 10 pairs for both time one and time two. Because of this disparity, the mean of the 23 participants at time two was added to the missing data so paired t -tests could be used to analyze the data. The scores for the 23 respondents were used because the 10 pairs would not have been as representative. For sex role attitudes, mean scores of the 10 pairs of fathers (who had scores for both time one and time two) were used in a correlation to calculate the change in scores before and after the birth of a second child.

CHAPTER IV

RESULTS

This study examined the changes in the amount of time spent between the father and his firstborn child before and after the birth of his second child. Sex role attitudes were also examined.

Analyses

The participant field was narrowed from 12,686 to 38 by choosing those who had at least one child in 1982 and two children in 1988. Time-use data were collected from the mothers about the amount of time the child spent in secondary and primary child care and who the child care provider was. The participants were selected if the primary or secondary provider was the father. The mean for time spent for each year preceding the birth of a second child was compared to time spent in child care with the father after the birth of a second child. The mean of the variables for the firstborn child's time spent in child care with the father for the years after the birth of a second child were combined into one variable.

Paired t -tests were used in order to evaluate the differences in the amount of time spent before and after the birth of a second child. After scoring the items for time one (1982) and for time two (1987), a correlation analysis was used to test the relationship between the amount of time spent and the mother's sex role attitudes before and after the birth of a second child. Values at the .05 level of significance or below were reported. The results are described in the sections that follow.

Descriptive Analyses

The following information was based on the 10 participants who reported information for both time one and time two. Information about the changes in the amount of time spent for each individual dad can be seen in Figure 2.

Dad one. This father reported working as an operative. He was 38 years old at the time of birth of his first child in 1981. He reported his race as White. The total family income was \$32,960 in at the time of the 1988 interview. The mother stayed at home after the birth of their second child in 1986 and went back to work the following year.

Dad two. This father was working as a service worker during the time the information was gathered for this study. He was 21 years old at the time of the birth of his first child in 1981. He reported his race as White. The total family income was \$3,300 at the time of the interview in 1988; both he and his wife were employed.

Dad three. He worked as a craftsman and was 34 years old at the time of the birth of his first child in 1981. He reported his race as White and the total income for his family in 1988 was \$23,040; both spouses were employed.

Dad four. This respondent worked as a farm laborer at the time of interview. He was 35 years old at the time of birth of his first child in 1981. His total family income was \$29,300 (only one income) in 1988, and he reported his race as White.

Dad five. This father worked as a laborer at the time of the interview and was 35 years old when his first child was born in 1981. His total family income, both spouses employed, was \$21,192 in 1988 and he reported his race as Black.

Dad six. This respondent worked as a craftsman and was 24 years old when his first child was born. He reported his race as White and his total family income was \$13,950 for 1988 while both he and his wife were employed.

Dad seven. He worked as a farmer at the time of the interview and was 28 years old when his first child was born. His reported race was White and his total family income for 1988 was \$12,000; his wife stayed home after the birth of the second child and went back to work after one year at home in 1986.

Dad eight. This father worked as a laborer and was 21 years old at the time of birth of his first child in 1980. He reported his race as Hispanic and his total family income was \$15,000 for 1988 while both he and his wife were employed.

Dad nine. This father worked as a laborer and was 25 years old when his first child was born in 1981. His reported race was Black and total family income for 1988 was \$19,500; both spouses were employed.

Dad ten. This respondent worked as a service worker at the time of the interview. He was 25 years old at the time of birth of his first child in 1978. The total family income reported was \$29,900 for 1988 and both mother and father were employed. His reported race was White.

Results of Quantitative Analyses

Hypothesis 1: The amount of time the father spends with his firstborn child will increase after the birth of his second child. The amount of time the father spent with his firstborn child after the birth of his second child increased from before the birth of a second child ($\bar{m} = 24.23$ hours per week) to after the birth of a second child ($\bar{m} = 34.23$ hours per week). Scores for the Time Use-Household Chores & Child Care questionnaire

are displayed in Table 3; time spent was reported in hours per week. There was a significant change in the amount of time per week ($t = -3.89, p > .000$) the father spent with his firstborn child after the birth of a sibling.

Hypothesis 2: The amount of time the father spends with the firstborn child after the birth of a second child is related to sex role attitudes of the mother. This analysis was performed using only the 10 fathers who had information for time one and time two. There was not a significant relationship between sex role attitudes before and after the birth of a second child.

CHAPTER V

DISCUSSION

The focus of this study was on the change in the amount of time spent between the father and his firstborn child before and after the birth of his second child. The relationship between sex role attitudes and the amount of time spent was also a focus of this study. Using data from the National Longitudinal Survey of Youth, this relationship was examined by comparing reports from the Time Use-Household Chores & Child Care on amount of time the father spent with his child before and after the birth of his second child using paired *t*-tests. The marital relationship was also examined before and after the birth of a second child by examining sex role attitudes and beliefs at both times.

Summary

The amount of time spent between the father and his firstborn child before and after the birth of a second child was studied. The results showed an increase in the amount of time the father spent with his firstborn child after the birth of a second child.

Time Spent With Firstborn

These findings were consistent with the study by Baydar, Greek, and Brooks-Gunn (1997); this study supported the idea that there were changes in the family environment and family relationships after the birth of a second child. There were changes in the mother-firstborn child relationship after the birth of a second child as found in the Baydar et al. study. As there were changes in the mother-firstborn relationship, there were also changes in the father-firstborn relationship.

Dunn and Kendrick (1981) found that mothers do not interact as often with their firstborn children after the birth of a second child, leaving more time for the father to

spend with the firstborn child. Since there was an altering environment for the firstborn child and family, fathers accounted for the time discrepancy between the mother and firstborn child.

The amount of time spent per week between father and child before and after the birth of a second child was higher for this study than in previous studies. Ahmeduzzaman and Roopnarine (1992) found that the fathers in their study spent 19.6 hours per week with their children. Yeung et al. (2001) reported participants in their study spent 12.25 hours per week with their children, compared to the 34.23 hours per week for this sample of fathers.

Daly's (1996) sample of fathers expressed that spending time with their children was very important to being a good father. They expressed the need to make more time for their children and reported tension between work time and family time. The study also showed that there was not a significant relationship between traditional sex role attitudes and amount of time spent with child.

Sex Role Attitudes

This study sought to better understand the process model of the determinants of parenting. Belsky (1984) stated that developmental history of the parent could have a significant impact on their child's development playing a considerable role in the parenting of the child and in the development of the child. For the present study, sex role attitudes was believed to be related to marital relations, which in turn was linked to personality development and developmental history of the parent. Developmental history indirectly affects marital relations, which directly affects parenting and parenting directly effects the development of the child. Therefore, if the mother's sex role attitudes are more

traditional; we would expect the father to spend less time with his child and more time in a provider role than if her sex role attitudes were more egalitarian. The sex role attitude scores for the present study indicated that mothers had traditional sex role attitudes however, there was not a significant correlation between sex role attitudes and the father's amount of time spent with the firstborn child after the birth of a second child.

Developmental history influences the parent's personality development also. Experiences while growing up affect personality development and views, values, and beliefs of parenting; traditional views about parenting and sex roles within the family could have a direct relationship with the development of the child.

Kaufman (2000) examined the relationship between gender role attitudes, family formation, and household roles. Men with egalitarian attitudes wanted to have a child because they wanted to share in the responsibility of raising a child, not only to support it as reported by traditional men. They believed that raising children should be a shared responsibility of both the mother and father. The degree to which the father and mother hold traditional values could have an impact on the development of the child and child outcomes. The present study found that there was not a significant relationship between sex role attitudes and time spent before and after the birth of a second child.

The scores for the Sex Role Traditionality Scale for this study were higher than the scores for the Xu and Toth (2000) study. This means that the 10 pairs of participants used for this part of the study held more traditional attitudes about sex roles within the family than in other studies. There was also an insignificant decline in time spent with firstborn before and after the birth of a second child when the 10 pairs were examined. In the Kaufman (2000) study more egalitarian attitudes within the family was linked to the

father spending more in childcare activities. The findings of this study were not significant, but show the same trend in that the respondents held more traditional sex role attitudes and the father's time spent decreased after the birth of a second child.

In conclusion, the amount of time the father spent with his firstborn child increased after the birth of his second child. This confirms the initial assumption that since there was a decrease in the amount of time the mothers spent with firstborn child after the birth of a second child; the father would take up some of the slack. This study found that the mothers had traditional sex role attitudes. Because of the mother's traditional sex role attitudes the father's amount of time spent with the firstborn child after the birth of a second child did not increase, but decreased. Based on these findings, we assume the father primarily played the role of the provider and was not as involved in child care activities.

Limitations to the Present Study

The source of data for this study, the National Longitudinal Survey of Youth 1979, did not include information about fathers' actual relationship with their children. Although there was a massive amount of information as well as participants, the present study only utilized 38 out of 12, 686 respondents for the purposes of this study. Information was gathered from both the mother and the father about how much time the father spent with the firstborn child before and after the birth of a second child. The information used was not directly from the father but from mother report and the information might differ if obtained directly from the father. The addition of the mean of the 23 participants in time two could alter the results of the study and should be noted.

While the NLSY79 is a nationally representative sample, the subsample used for the present study was not nationally representative, with a majority of White respondents, but was weighted to represent the national population in 1979. The category of race was only divided into three categories, White, Black, and Hispanic, not accounting for the Asian, Native American and other races present in our nation.

Further Considerations

Since there is little available information about the relationship between the father and his child, especially about the amount of time spent together, it is difficult to fully consider all aspects of the father-child relationship and the affects of time spent on the father-child relationship. Future research should focus on face-to-face interviews and observational studies investigating the father's relationships with his children. Longitudinal data about the transformation of the father-child relationship would prove beneficial in understanding of this phenomenon. Focusing more on the overall development of the family and not just on the mother-child relationship would also provide better insight into child development. Inclusion of all aspects of the family dynamic and implications of the interactions within the family while examining the development of the child would be advantageous in future studies.

Implications for Further Research

The implications for research in the area of father-child relationships, for professionals, teachers, researchers, parents and relatives, and anyone working with this population, is to better understand this dynamic relationship between the father and his child. The degree of father involvement might lead to better child outcomes, attachment, and socioemotional development. Observational research about the parenting, marital and

parent-child relationships should be utilized to better understand family and child development. Further research should consider all aspect of parental involvement and not rely specifically on one parent, but the incorporation of both.

References

- Ainsworth, M. D., Belgrave, M. C., Watters, E., & Wahl, S. (1978). Patterns of attachment. Hillsdale, N. J; Earlbaum.
- Ahmedduzzman, M., & Roopnarine, J. L. (1992). Sociodemographic factors, functional style, social support, and father's involvement with preschoolers in African-American families. Journal of Marriage and the Family, 54, 699-707.
- Anderson, A. M. (1996). Factors influencing the father-infant relationship. Journal of Family Nursing,54, 121-129.
- Austin, A. M., Summers, M., & Leffler, A. (1987). Fathers' and mothers' involvements in sibling communication. Early Childhood Research Quarterly, 2, 357-365.
- Baydar, N. (1995) Reliability and validity of temperament scales of the NLSY child assessments. Journal of Applied Developmental Psychology, 16, 339-370.
- Baydar, N., Greek, A., & Brooks-Gunn, J. (1997). A longitudinal study of the effects of the birth of a sibling during the first six years of life. Journal of Marriage and the Family,53, 67-79.
- Baydar, N., Hyle, P., & Brooks-Gunn, J.(1997). A longitudinal study of the effects of the birth of a sibling during preschool and early grade school years. Journal of Marriage and the Family,53,146-153.
- Beitel, A.H., & Parke, R.D. (1998) Paternal involvement in infancy: The role of maternal and paternal attitudes. Journal of Family Psychology, 12, 268-288.
- Belsky, J. (1984). The determinants of parenting: A process model. Child Development, 55, 83-96.
- Belsky, J. (1996). Parent, infant, and social-contextual antecedents of father-son

- attachment security. Developmental Psychology, 32, 905-913. *in childr*
- Belsky, J. & Rovine, M. (1990). Patterns of marital change across the transition to parenthood: Pregnancy to three years postpartum. Journal of Marriage and the Family 52, 5-19.
- Bianchi, S. M., & Robinson, J. (1997). What did you do today? Children's use of time, family composition, and the acquisition of social capital. Journal of Marriage and the Family 59, 332-344.
- Bianchi, S. M. (2000). Maternal employment and time with children: Dramatic change or surprising continuity? Demography, 37, 401-444.
- Blair, S.L. Wenk, D., & Hardesty, C. (1994). Marital quality and paternal involvement: Interconnections of men's spousal and parental roles. The Journal of Men's Studies 2, 221-237.
- Block, J. (1955). Personality characteristics associated with father's attitudes toward child-rearing. Child Development, 26, 41-48.
- Bonney, J. F., Kelley, M. L., & Levant, R. F. (1999). A model of father's behavioral involvement in child care in dual-earner families. Journal of Family Psychology, 13, 401-415.
- Brody, G., Stoneman, Z., Trellis, S., & Gibson, N.(1999). Sibling relationships in rural African-American families. Journal of Marriage and the Family,61, 1046-1057.
- Brown, J., & Dunn, J. (1992) Talk with your mother or your sibling? Developmental changes in early family conversation about feelings. Child Development, 63, 336-349.
- Copenhaver, M. M., & Eisler, R. M. (2000). The development and validation of the

- Attitude Toward Father Scale: A tool for assessing father's role in children's behavior problems. Behavior Modification 24, 740-750.
- Daly, K.J. (1996). Spending time with the kids: Meanings of family time for fathers. Family Relations, 51,21-34.
- Demo, D. H., & Cox, M. J. (2000). Families with young children: A review of research in the 1990s. Journal of Marriage and the Family 62, 876-895.
- Dickstein, S., & Parke, R.D. (1988). Social referencing in infancy: A glance at fathers and marriage. Child Development, 59, 506-511.
- Dunn, J., & Kendrick, C. (1980). The arrival of a sibling: Changes in patterns of interaction between mother and first-born child. Journal of Child Psychology and Psychiatry and Allied Disciplines 21, 119-132.
- Dunn, J., & Kendrick, C. (1982). Siblings: Love, envy, and understanding. Cambridge Massachusetts; Harvard University Press.
- Dunn, J., & Kendrick, C. (1981). Social behavior of young siblings in the family context: Differences between same-sex and different-sex dyads. Child Development 52, 1265-1273.
- Dunn, J., Kendrick, C., & Macnamee, R. (1981). The reaction of first-born children to the birth of a sibling: Mother's reports. Journal of Child Psychology and Psychiatry and Allied Disciplines, 22, 1-18.
- Dunn, J., & Munn, P. (1985). Becoming a family member: family conflict and the development of social understanding in the second year. Child Development, 56, 480-492.
- Dunn, J., Slomkowski, C., & Beardsall, L. (1994). Sibling relationships from the

preschool period through middle childhood and early adolescence.

Developmental Psychology, 30, 315-324.

- Epkins, C., & Dedmon, A.M. (1999). An initial look at sibling reports on children's behavior: Comparisons with children's self-reports and relations with siblings' self reports and sibling relationships. Journal of Abnormal Child Psychology, 27, 371-381.
- Fitzgerald, H. E., Zucker, R. A., Manguin, E. T., & Reider, E. E. (1994). Time spent with child and parental agreement about preschool children's behavior. Perceptual Motor Skills, 79, 336-338.
- Fox, R., & Pedro-Solis, C. (1997). Parenting of young children by fathers in Mexico and the United States. The Journal of Social Psychology, 42, 126-135.
- Gotlib, I. H., & Wallace, P. M. (1990). Marital adjustment during the transition to parenthood: Stability and predictors of change. Journal of Marriage and the Family, 52, 21-30.
- Greenberg, M., & Morris, N. (1974). Engrossment: The newborn's impact upon the father. American Journal of Orthopsychiatry, 44, 520-531.
- Jalongo, M. R., & Renck, M. A. (1985). Sibling relationships: A recurrent development and literary theme. Childhood Education, 33, 346-351.
- Kaufman, G. (2000). Do gender role attitudes matter? Family formation and dissolution among traditional and egalitarian men and women. Journal of Family Issues 21, 128-144.
- Lamb, M. E. (1977). Father-infant, mother-infant interaction in first year of life. Child Development, 48, 167-181.

- Lamb, M. E. (1981). The role of the father in child development. Wiley Series on Personality Process; New York: Wiley.
- Levy-Schiff, R. (1994). Individual and contextual correlates of marital changes across the transition to parenthood. Developmental Psychology, 30, 591-601.
- Lollis, S., Van Ergen, G., Burns, L., Nowack, K., & Ross, H. (1999). Sibling socialisation and moral orientation: "share with me!" "no it's mine!". Journal of Moral Education, 28, 339-357.
- Marsiglio, W., Amato, P. Day, R.D., & Lamb, M. (2001). Scholarship on fatherhood in the 1990s and beyond. Journal of Marriage and the Family 62, 1173-1191.
- Marsiglio, W. Day, R. D., & Lamb, M. E. (2000). Exploring fatherhood diversity: Implications for conceptualizing father involvement. Marriage and Family Review, 29, 269-293.
- Palkovitz, R. (1985). Father's birth attendance, early contact, and extended contact with their newborns: A critical review. Child Development, 56, 392-406.
- Parke, R.D., & Buriel, R. (1998). Socialization in the family: ethnic and ecological perspectives. Handbook of Child Psychology (4th Ed.): Wiley.
- Parke, R.D., & Sawin, D.B. (1976). The father's role in infancy: A re-evaluation. The Family Coordinator, 21, 365-371.
- Peterson, G. W., & Steinmetz, S. K. (2000). The diversity of fatherhood: Change, consistency, and contradiction. Marriage and Family Review, 29, 315-322.
- Phares, V., & Compas, B. E. (1993). The role of fathers in child and adolescent psychopathology: Make room for daddy. Annual Progress in Child Psychiatry and Child Development.

- Rende, R., Slomkowski, C., Stocker, C., Fulker, D., & Plomin, R. (1990). Genetic and environmental influences on maternal and sibling interaction in middle childhood: A sibling adoption study. Developmental Psychology, *28*, 484-490.
- Russell, G., & Russell, A. (1987). Mother-child and father-child relationships in middle childhood. Child Development, *58*, 1573-1585.
- Toth, J. F., & Xu, Xiaohe (1999). Ethnic and cultural diversity in fathers' involvement. Youth and Society, *31*, 76-99.
- Volling, B. (1997). The family correlates of maternal and paternal perceptions of differential treatment in early childhood. Family Relations, *53*, 274-289.
- Volling, B., & Belsky, J. (1992). The contribution of mother-child and father-child relationships to the quality of sibling interaction: A longitudinal study. Child Development, *63*, 1209-1222.
- Wallace, P. M., & Gotlib, I. H. (1990). Marital adjustment during the transition to parenthood: Stability and predictors of change. Journal of Marriage and the Family, *52*, 21-29.
- Williams, E., & Radin, N. (1999). Effects of father participation in child rearing: Twenty-year follow-up. American Journal of Orthopsychiatry, *69*, 328-336.
- Yeung, W. J., Sandberg, J. F., Davis-Kean, P. E., & Hofferth, S. L. (2001). Children's time with father in intact families. Journal of Marriage and Family, *63*, 136-154.
- Youngblade, L., & Dunn, J. (1995). Individual differences in young children's pretend play with mother and sibling: Links to relationships and understanding of other people's feelings and beliefs. Child Development, *66*, 1472-1492.

Zagorsky, J. L., & White, L. (Eds.). (1999). NLSY79: User's guide to the National Longitudinal Survey of Youth Data. The Ohio State University: Columbus, Ohio.

APPENDICES

APPENDIX A

Tables

Table 2

Reliability Analysis of Sex-Role Traditionality Scale

	Roles 1	Roles 2	Roles 4	Roles 6	Roles 8
Roles 1	1.0000				
Roles 2	-.0162	1.0000			
Roles 4	-.1789	.1788	1.0000		
Roles 6	.4402	-.0258	.3347	1.0000	
Roles 8	.3867	.4053	.0231	.1953	1.0000

n=38

Table 1

Demographics

Fathers (n =38)	Time 1	Time 2
Mean Age	22	28
Race		
White	28 (68.3%)	
Black	10 (24.4%)	
Hispanic	3 (7.3%)	
Mean Income (in dollars)	14,860	25,976

Table 3

Paired t-test Comparing Father's Time Spent With First Child Before and After Birth of Second Child (n = 38)

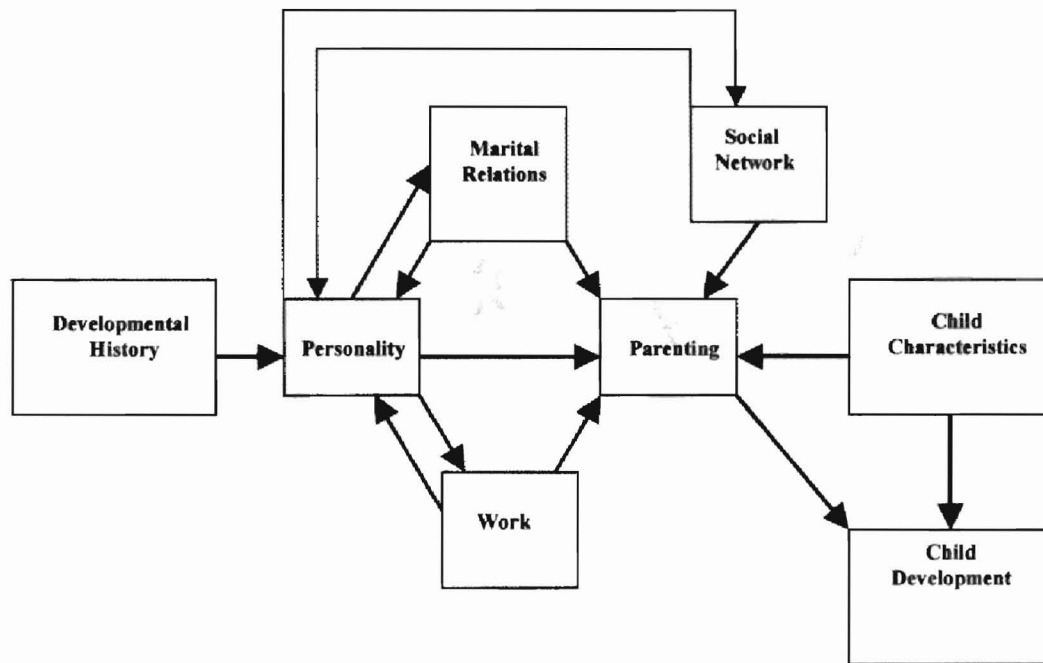
	Time 1 Mean (SD)	Time 2 Mean (SD)	t-score
Hours per week	23.62 (12.32)	33.66 (10.95)	-3.89***

***p < .001

APPENDIX B

Figures

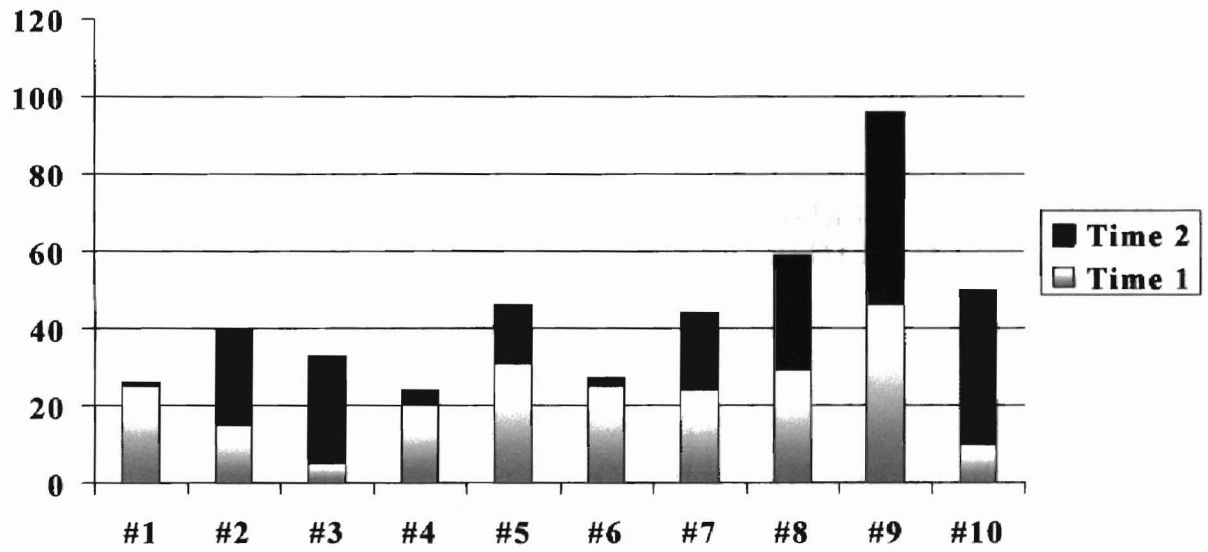
Figure 1



**Belsky's process model of the determinants of parenting
Belsky (1984)**

Figure 2.

Father's time spent in caretaking



VITA

Kari Willingham-Rains

Candidate for the Degree of

Master of Science

THESIS: FATHER'S TIME SPENT BETWEEN WITH HIS FIRSTBORN CHILD
BEFORE AFTER THE BIRTH OF A SECOND CHILD.

Major Field: Family Relations and Child Development

Biographical:

Personal Data: Born in Norman, Oklahoma, on November 11, 1976, the daughter of Steve and Kristy Willingham.

Education: Graduated from Perkins-Tryon High School, Perkins, Oklahoma, May 1995; Received Bachelor of Science degree in Communication Sciences and Disorders from Oklahoma State University, Stillwater, Oklahoma, December, 1999. Completed the requirements for the Master of Science degree with a major in Family Relations and Child Development at Oklahoma State University, May 2001.

Experience: Previously employed as lead teacher at Head Start in Stillwater, Oklahoma; Currently employed by Oklahoma State University as a grant writer, 2000 to present.

Professional Memberships: National Student Speech Language Hearing Association