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ADLERIAN SOCIAL INTEREST AS SEEN
THROUGH CHILDHOOD RECOLLECTION:
ITS DEVELOPMENT IN THE FAMILY CONTEXT .

by

© Joan W. Edwards

A Thesis
Submitted to the Faculty of Graduate Studies Through the
Department of Sociology and Anthropology in Partial
Fulfillment of the Requirements for the
Degree of Master of Arts at the
University of Windsor

Windsor, Ontario, Canada

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ABSTRACT

This study used secondary analysis of verbatim early recollections of 63 adult subjects in therapy to assess the degree of social interest of only-borns and those raised with siblings. The hypothesis that social interest will develop to a lesser degree in those who have been raised without siblings with whom to interact was not supported.

Through the use of nine bi-polar components an index of social interest (SIIX) and non-social interest (NSIIX) was computed for each individual. While the use of the indices provided little support for the hypothesis, analysis using the components of the index found differential development of aspects of social interest in the two groups.

Analysis of the components of the original scale resulted in modification. The new scale, when tested, did not result in a stronger relationship between sibling status and social interest.

The major findings of the study suggest that a non-conflictive parental relationship, an accepting family atmosphere and middle class values explain more with regard to the development of social interest than does sibling status.

As the Adlerian concept of social interest is central to the thesis, it is noted that the results do not deviate from Adler's conceptual scheme regarding the development of social interest. Social interest is fostered within the matrix of family interaction and is not simply a consequence of child-child, parent-parent or parent-child relationship.

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CHAPTER I

INTRODUCTION

Whether it is for economic reasons or for maximizing the careers of both husband and wife, having an only child is becoming much more acceptable despite the oft-portrayed negative consequences. Brim (1968) suggests that the group structure of a society has primary influences upon patterns of interaction, and Rubin (1980) suggests that basic social skills are learned from other children rather than from parents. For these reasons it is hypothesized that the presence or absence of siblings will influence patterns of cooperative and caring behaviour.

Concern for others, or as Adler (1964) called it, 'social interest', is central to this thesis. Social interest evolves out of contribution, responsibility, co-operation, empathy and belonging. While social interest is not an activity or a relationship these ingredients are part of it.

In an age that seems to be one of indifference or narcissism (Zimbardo, 1980; Lasch, 1979) there appears often to be less room for concern for others. This coupled with the negative image of the only child may be of concern to those who are considering limiting their family to one child. They may wonder if the lack of opportunity for interaction with siblings may tend to deprive their one offspring of the opportunity.

of adequately developing social skills, which include 'social interest', that may develop more readily in this type of interaction. The common perception of the only child, alone in an adult world, frequently the centre of attention, suggests that he/she may grow to adulthood less able to handle the problems and stress encountered in life's interaction with others.

-This investigation will compare the degree of social feeling or 'social interest' of two groups of adults, some of whom have been raised with siblings and some, who in their early years, were raised as only children. Through the use of a scale of dimensions considered as components of social interest*, the early recollections of the individuals will be considered. Early memories are seen as reflecting the perceptual framework of the individual, and as giving insight into the concept of self, orientation toward others and toward the environment in general. From these early recollections an index of social interest will be inferred.

While it is recognized that parents greatly influence the development of such traits as concerns for others, the main focus of the investigation will be on whether the presence or absence of siblings will effect the development of such characteristics to a greater or lesser degree. Because the family is the first social group, family atmosphere, parental relationship and parents' relationship with the subject will be taken into consideration in the comparison of the 'only' group, and the 'with sibling' group.

*see page 12 for discussion of social interest

The guiding hypothesis for the study will be:

Individuals raised without siblings will develop social interest to a lesser degree than will those individuals who have been raised with siblings.

Sibling status will be the main independent variable with a social interest index and the components of social interest as dependent variables. The individual's perception of the relationships within his/her family and attitude toward school, social and sexual development will also be considered as variables.

The need to consider social interest as being related to sibling status has been brought into sharper focus in recent years due to changing social patterns. A common perception is that there are many disadvantages in being an only child. Solomon, Clare and Westoff (1956) found that a second child was frequently considered as a safeguard against raising a selfish and lonely offspring. As appropriate sex-role behaviour is modified, many males no longer feel compelled to parenthood, and women are no longer expected to find their total satisfaction in child-rearing. As women increasingly enter the labour force, fertility decreases (Waite & Stolzenberg, 1976). Young couples frequently postpone marriage, or if not marriage, the decision to have children, until their late twenties or thirties. These later-babies or mid-career babies are more apt to be onlies due to different lifestyle or to work pressures (Webb, 1981: 52). The disadvantages, real or imagined, of raising an only are often of concern to these parents.

Many theories have pointed to the importance of sibling status in personality development. There has also been a great number of

studies relating sibling status to a wide variety of variables. Frequently the research has grouped the 'only' with the first-born. In doing this, there has been a disregard for the notion that the first-born, while starting out as an 'only' does have siblings with whom to interact at some later time, while the 'only' does not.

While Adler (1964) saw social interest as an innate potentiality, whether innate or not, it is learned in interpersonal relationships. Sibling status, an ascribed location in a social structure, affects personality development. Based on this, it is suggested that being raised with or without siblings will affect the development of social interest differentially for the two groups.

The following chapters will provide an eclectic theoretical framework as a rationale for the use of sibling status, the Adlerian concept of social interest, and early recollections to fulfill the purpose of the study.

The data for the sample comes from clinical files. The early recollections of the sample of 63 adults were subjected to secondary analysis using a scale designed from existing scales considered as measuring the characteristics considered as components of social interest. Using a global score as the index of social interest (SIIX), as well as using the components of the index, the two groups will be compared. The polar pair of each of the components will also be considered in the analysis.

CHAPTER 2

REVIEW OF THE LITERATURE

Sibling Status

The negative image of the only child has persisted since psychologist G. Stanley Hall (1927) stated that being an 'only' is a disease in itself. In the Encyclopedia of Child Care and Guidance of 1954 the parent of the only child was assured that this need not be thought of as a near tragedy. As recently as 1974, according to V. D. Thompson, the only is perceived as "generally maladjusted... self-centered and self-willed, attention seeking and dependent on others...and unlikeable" (1974: 95-96). The only child family, in the past, has been considered something to be avoided. Blake (1974) reports that the attitude towards the only child has changed little since the fifties. His research shows that 80 percent of those surveyed regarded being an only child as a disadvantage. While Terhune in his review of the actual and expected consequence of family size (1975) suggests that the 'only' is more maligned than maladjusted, the negative image persists.

As suggested in the previous chapter, social attitudes toward having an only child are changing. Career commitment, dissolution of the extended family, increasing mobility, and the use of contraceptives enhance the potential for the one-child family (Kappelman, 1975). The need to investigate, in a broad sense,

the effect that the lack of siblings may have on the only child seems appropriate.

With well over a thousand studies linking birth order to a wide variety of aspects of human behaviour and psychological variables (Forer, 1977) it is difficult to begin to review them even briefly. From Galton's studies (1874) on eminence to interpersonal orientation (Falbo, 1978), homosexual development (Hogan et al., 1980), the range covers self-esteem (Rosenberg, 1965; Kaplan, 1970) leadership styles (Hardy, 1972) information-seeking behaviour (Harwood, 1973) and intelligence (Zajonc & Marcus, 1975) to name but a few. There have been inconsistencies in results, and frequently the onlies have been grouped with the first-borns (Greenberg, 1967; Hoyt & Raven, 1973; Toman & Toman, 1970; Schachter, 1959). Falbo (1977 : 57) in concluding a summary of only-children research, suggests that intelligence is the "only topic area in which consistent and reliable results about only children are available."*

The areas of research more closely related to this study and to social interest are those of affiliation, self-esteem, interpersonal styles and mental health.

In light of the unhealthy mental picture often painted of the only child, it is surprising that comparatively little research had been done on what is often considered as central to personality-- self-esteem. Zimbardo and Formica (1963) found later borns to have

*The IQ score of the only child is between first-borns from smaller families and later borns from large families.

higher self esteem. While Rosenberg (1965) found the opposite to be true. Coopersmith (1967) found, in adolescent males, that onlies and first borns were overrepresented in high self-esteem, while Kaplan (1970) found last borns to be in the high self-esteem group. Research by Falbo (1976) indicates that being an only child makes little difference on scores of scales on extraversion/introversion and neuroticism. Results with an adult population on the same variables were similar.

Early affiliation studies, finding no significant differences between onlies and first borns grouped these two in their research (Schachter, 1959; Hoyt & Raven, 1973). These studies found that the first borns and onlies were more likely to affiliate in certain situations than were later-borns. Conners (1963) and Rosenfeld (1966), considering onlies as a distinct group, found that the only children had a lower need for affiliation than did the with-sibling group. Falbo (1976) found onlies more likely to make decisions independent of the group, finding less discomfort in doing so, suggesting a lower affiliation need. In this same study, only children reported having fewer friends, joining fewer clubs, yet did not perceive themselves as unpopular.

Stotland and Dunn (1962) found later-borns identify more with others than did first-borns and only-borns. The same results were found for empathy by these researchers, but later research by Stotland and Walsh (1963) did not find the same results for empathy.

With regard to mental health and onlies, Howe and Madget (1975) in a study of clinical patients found that there was no significant difference in the majority of mental health disturbances, but there was increased submissiveness and a greater number of repeat visits for the only group.

In reviewing the research on sibling status especially as it pertains to the only, it seems that there has been a lack of consistency in results. While research (Eisenman & Taylor, 1966) suggests that there are some differences in the MMPI patterns of first-born and only children, they have seldom been considered as two distinct groups.

Life Style

Social-psychological research often fragments the individual - view him/her as traits and activities or behaviours not as a whole person situated in a social environment. Each child is located in a social environment. Each child is located in a given social situation within a family where the individual experiences are unique. This social location, due to the experiences in it, is considered important in the development of the individual's social orientation.

Since Freud offered his psychosexual theory of personality there has been acceptance of the hypothesis that there is a crucial time, before the age of six, which has a powerful effect on personality development (Freud, 1953; Horney, 1930; Sullivan, 1953). Based on early experiences many have postulated stages of development in personality (Kohlberg, 1969; Erikson, 1963; Havighurst, 1953; Piaget, 1932; Murray, 1938).

More recently there has been controversy over the acceptance of a consistency in personality characteristics (Moss & Susman, 1980: 531-532 citing Mischel, 1969; Nesselroade & Baltes, 1974; Schaie, 1965). Mid-life personality change has been a current topic of concern for authors such as Levinson et al (1978), Sheehy (1976), and Gould (1978).

The divergence of opinion continues as researchers such as Bloom (1964) and Costa and McCrae (1980) suggest there is constancy. Costa and McCrae (1980) found introversion, extraversion, neuroticism and, to a lesser extent, openness to experience to remain constant. Change theorists such as Brim and Kagan (1980) while supporting continuity where the focus is on social and emotional styles, suggest that these are not central to the human experience.

The term life style used in this presentation relates to self-consistency. While sociologists and psychologists use it in somewhat different ways there is a relationship between the two. In the sociological sense it is seen as categorical as well as personal styles often associated with educational, social or occupational status, circle of friends, and or leisure activities (Whitehurst & Veevers, 1979). It is suggested that there is a self-consistency that characterized life style with cultures and subcultures. According to some researchers consumption choices and the use of leisure time will be in accordance with life style (Hamilton, 1964; Havighurst, 1961; Havighurst & Feigenbaum, 1959) as will sexual behaviour (Rainwater, 1961; Reiss, 1959). Life style has also been related to how one faces the later years and death (Shneidman, 1963;

Williams, 1966; Williams & Wirths, 1965).

Life style is seen as a "schema of apperception" (Adler, 1964: 181) or as a blueprint of cognition that provides a pattern for living which is a posture or stance within which various behaviours are possible. The individual chooses behaviors which are consistent with the convictions. Allport (1961) considers it the highest level of organization of the personality. With one's patterns of assumptions and consistent ways of perceiving, thinking and acting, suggests Coleman (1960, 1964), the individual puts a personal stamp on every role and every situation encountered. Goffman (1959) suggests we play a role in a theatrical sense. Following the script, one performs first by technique, then personal improvisation becomes part of any role. The script, provided through early interpretation on social interaction, is much like the theatrical script. It is a learned technique used to find one's place or social role in the early environment. Once learned it is practiced until it becomes a living role that guides behaviour. While situations may vary and new roles will be encountered throughout life, the personal stamp remains.

The use of early recollections (ERs) in this study is based on the assumption that the individual has a consistent frame of reference. Accepting this, the ERs can be considered a means of gaining insight into and how the individual sees him/her self and how he/she perceives relationships with others (Mosak, 1959).

Early Recollections

The use of early recollections (ERs) in this study is based on the

premise that the individual is a unity, and holds a consistent attitude toward self, others and life. The ERs are seen as reflecting the person's present attitude which is largely affected by his opinion of self and others formed in early socialization (Adler, 1932; Ansbacher & Ansbacher, 1964). Script theory or in transactional analysis terms, ERs are the scripts or beliefs by which we live (Berne, 1961; Steiner, 1974; Swartz & Long Laws, 1977; Gagnon, 1977).

From the ERs we cannot find the cause of behaviour, nor do they determine behaviour. They provide a glimpse of how the individual is guided toward his goal in life (Ansbacher & Ansbacher, 1964). The basic attitudes that have guided a person and which prevail in his/her current situation are reflected in the fragments which he/she selects to remember.

Unlike Freud (1953) who saw ERs as screen memories used to cover latent or repressed material, Adler saw them as revealing a person's central life style theme.

Memory is selective. Out of a vast store of memories the individual chooses those which prepare him, from past experience, to approach the future with an already tested style of action (Adler, 1932). Those experiences that harmonize with the current frame of reference will be recalled (Edwards, 1941).

Numerous studies have supported a relationship between ERs and tests of personality. Taylor (1975:218) reviews some of these studies. Summarizing them she finds:

1. ERs may serve as a rapid, valuable sample of the type of data likely to be obtained from the longer time consuming projective test battery examinations (Lieberman, 1957; Hedvig, 1965).

2. ERs may serve as a valid method of personality appraisal, specifically in the areas of degree of activity, including work, and social interest (McCarter, Tomkins, & Schiffman, 1961).
3. There appear to be some thematic differences among ERs produced by subjects diagnosed as belonging to several neurotic categories (Jackson & Sechrest, 1962).
4. There is evidence to suggest that ERs are not influenced by situations of success or failure, hostility or friendliness, and thus are more stable than TAT stories which do appear to be influenced by such situations (Hedvig, 1963).
5. Life-style summaries based on ERs are reliably communicable to a wide range of professional workers (Ferguson, 1964). On the other hand, however, information obtained from ERs only does not appear to be adequate for valid diagnosis of psychopathology for most clinicians (Ferguson, 1964; Hedvig, 1965) nor for the prediction of optimism-pessimism (McCarter, Tomkins, & Schiffman, 1961).

While these results are not conclusive, they do provide support, to some extent, for the use of ERs in assessing life style. The ERs provide a device through which man's social orientation, as it is in the present, can be inferred.

Social Interest

In the ERs the individual reveals his or her subjective picture of the environment particularly as it concerns human relationships (Brodsky, 1952). It is the concern for others in the interactive process that is central to the concept of social interest.

We live in a competitive, power-oriented society where a general norm prevails to be more, and to reach higher. This desire for self-elevation restricts cooperation and human fellowship (Dreikurs, 1963). The child is taught early the importance of being a winner. Competition

is high and comparisons are made. Everyone, at times, feels inadequate or inferior. Often the need for personal gain is at the expense of others.

Social interest, loosely translated from the German *Gemeinschaftsgefuehl* means a feeling of community-with, and an emotionally positive attitude toward others. It also includes a feeling of belonging to this community of others, and a wanting to belong.

There has been an ongoing interest in social research of the relationship of early experiences and one's sense of social relatedness (Horney, 1937; Fromm, 1973; Erikson, 1973). Hornstein (1976) suggests that if we were to place everyone on a continuum from socially inclusive to socially exclusive, we would find at the inclusive end, those attributes that one high in social interest might possess:

Their actual or anticipated contacts with other humans are predominated by a sense of belonging and feelings of being included. They tend to be optimistic about people's concern for one another's welfare, and in social encounters they are predisposed to identify a basis for commonality. Differences tend to be minimized. Behaviorally, they are gregarious, affable, open, warm, and accepting. (Hornstein, 1976:37)

While discussion of social interest is extensive, (Adler, 1964; Ansbacher, 1959, 1968; Ansbacher & Ansbacher, 1964; Dreikurs, 1950; Crandall, 1975, 1980; Kazan, 1978), it is only within the past decade that attempts have been made to measure it. Greever et al. (1973) developed an instrument based on the writings of Adler (1958, 1964), Ansbacher and Ansbacher (1964), and Dreikurs (1950). A thirty-two

item Social Interest Index resulted. When correlated with the California Personality Inventory on eighteen items it showed significant relationship to items which contain aspects of social interest. Communality ($r = .40$), responsibility ($r = .39$), socialization ($r = .39$) represented the highest correlates of social interest, all at .001 level of confidence (Greever et al., 1973).

Results using the Early Recollection Questionnaire developed by Rule (1972) and Altman (1973) found that empathy correlated significantly with early recollection global scores (.37), and with aspects of social interest such as benevolence (.60), befriended (.36), friendly (.37), acceptance (.37), and cheerful (.30), all at .05 level of confidence.

A modified version of the Altman scale was used by Quinn (1973) in predicting recidivism and types of crime from the early recollections of prison inmate.

Crandall (1975) developed a Social Interest scale which was a self-report, value-oriented scale designed to assess a person's interest in the welfare of others. This scale proved to be associated with a favorable opinion of, and trustworthiness in people in general, and it correlated negatively with hostility and depression. The scale was also positively related to an affirmative attitude toward life. Using this scale and combining first-borns and onlies, Crandall found that middle born females were significantly higher on social interest than first or last borns. Men showed no significant effect for birth order and social interest.

Crandall and Harris (1976) found significant correlation between empathy and social interest and an association between cooperative behaviour and social interest. Those who were willing to help others were higher on the social interest score.

While there has been research on which instrument is of the most value (Bubbenzer et al., 1979), the results of the studies cited above indicate that there is a relationship between social interest and personality variables such as empathy, the trusting of others, helping behaviour, cooperative behaviour, cheerfulness and benevolence. If social interest is an aspect of mental health as Adler suggests (1964) there should also be negative correlations to those factors which might be considered as less conducive to mental health. Crandall (1975) did find hostility and depression negatively correlated to social interest. Reimanis' study (1966) found that an early life style that did not develop socially positive goals resulted in a tendency toward anomie in later life.

In 1974 the same researcher found, using childhood memories as the data, that convicted young offenders showed a higher level of anomie than did the control group. Parental discord, unsatisfactory relationship with siblings and mobility were contributing factors to anomie. This research suggests that where there is less social interest there is more likely to be anomie in later life; there is more chance of becoming a young offender if there is a lack of social interest, and a contributing factor to this is the early environment.

Reimanis was not the first to relate anomie to a lack of social interest. Ansbacher (1959) noted that Adler's concept of social

interest may have been, although indirectly, influenced by Durkheim. Durkheim's original definition of normlessness, Merton's (1957) reference to it as a consequence of a faulty relationship between a goal and the legitimate means of attaining it, and Reisman's (1953) notion of the anomic person as one who "tends to sabotage either himself or his society, probably both" (Reismans, 1953:279) all tend to imply disorder socially or individually. While the sociological perspective sees anomie as the result of environmental factors, the concept of social interest or lack of it, in this thesis sees the individual's creative interpretation of the environmental factors as crucial in the development of either anomie or social interest.

Conclusion

A review of the literature indicates the importance placed on birth order or sibling status in social research. While results have been inconsistent, differences in personality characteristics and behaviour attributable to one's location in the first social group - the family - have emerged. From the data, the negative image of the only child appears to be more imagined than real.

The unique interpretation of early social interaction within the family structure provides the individual with a cognitive framework, script, or blue-print that serves as a guide to ongoing interaction with others. As social interest is learned in the early interactive process it will be part of this script.

The use of the ERs is based on the assumption that the individual is a unity, and there is a consistency in the life style. From the

ERs fragments of the basic attitudes that guide the individual can be inferred. The individual selectively recalls the particular memories because they have meaning to him or her, but the recall is from the current perspective. There will be in this current outlook the basic orientation toward self and others which was learned in the early years and practiced in the intervening years. If social interest is present in the recollection, it is inferrable using a scale of dimensions considered as reflecting social interest.

Based on the logic in this review, social interest, seen as developing in the early interactive process and reflected in the ERs, is a plausible and measurable concept for use in this thesis.

CHAPTER 3

THEORETICAL FRAMEWORK

Introduction

From the first day of life we are involved in networks of interpersonal relationships. Like a pebble, thrown by the fact of birth into the "social pond" (Parsons, 1955: 36), we become part of a social system. Through the subjective perception of early experiences in this system the individual lays the foundation for personality.

Social interest, which to Adler is an "innate potentiality" (1964: 135), comes to life only in conjunction with others. This capacity for identification with and concern for others, this lessening of self-centeredness, (which supplements, but does not contradict self-interest) develops in the early years in the social context.

Because of the nature of the concept of social interest it can be likened to a bridge between the self and the social group of which the individual is a member. Mead (1936) suggests that there is no self apart from society. It is suggested here, that there is no social interest apart from society for it is only through interpersonal relationships that it can develop.

This research proposes to use an eclectic theoretical orientation based on consistency of personality, personality as a system and role and learning theory. There are certain basic assumptions in these theories that provide a base for the hypothesis that individuals raised without siblings will develop social interest to a lesser degree than will those who are raised with siblings, and for

the use of ERs in the research.

The Self-System

Early in life the individual, dependent on others around him/her, builds up sets of roles of his unique response to the treatment of others (Parsons, 1951). The birth position, in itself, can be considered a role. Each person develops a system of action which is selected through cognitive discrimination (Parsons & Shils, 1951: 4). The subjective perceptions of early experiences are disparate elements which come together to form a personality system. This system of action, like the larger social system, is organized around the problems arising from interaction. There is basic consistency in this personality system (Parsons, 1951).

One's life style is a stance, orientation or pattern of living that have been developed by the individual who then maintains these patterns that have served to provide a personal sense of order. The individual can be seen as a dynamic, equilibrium-maintaining system which, while having relative flexibility in its relatedness, maintains a whole. As suggested by Deutsch (1968: 421) "...the whole remains the same only because of a patterning or organization which persists in the midst of change".

Parsons' early action theory, more so than his later theory, sees the individual as "essentially an active, creative, evaluating creature" (Parsons, 1937: 282) whose "schema is inherently subjective" (Parsons, 1937: 733). The system of orientation thus formed is, on the individual level, the personality. Life style theory holds a similar orientation. Adler considered the subjective interpretation of the

individual, in interaction with others, as the primary factor in the formation of patterns of behaviour and thus personality.

Socialization and the Role

While the child develops a relatively well-defined, consistent system, he/she becomes socialized through role expectations of the social system. The concept of role is important if one is to integrate sociological and psychological theory. The self is the active agent in the integrating of the various social roles and in the setting of a plan for movement toward the desired ends (Murray, 1952).

Parsons (1955) suggests when a person is fully socialized in the system of interaction, the actor does not have or play a role, but that it is something he is; Coleman (1964) sees the person as putting a personal stamp on the role; while Brim (1960: 137) views personality as "learned roles and role components". To Brim (1960) the learned repertoire of roles is personality.

In role theory, individual differences depend on what has been learned in prior experience in the socialization process. Brim (1960) suggests that knowledge, ability and motivation are learned in the network of related statuses within the social structure which vary with who is in that structure. In discussing child-rearing practices Brim (1960) suggests that the size of the family, the interaction situations and their demands are probably the major source of variation in later-life personality.

While developmental theory sees the early experiences as stages in the development of adult personality, self-consistency theory sees personality as a whole (Brownfain, 1952). According to Lecky's

self-consistency theory (1968) personality develops through the organization of experiences that are gained in contact with others. The most constant factor in early experience is the family. It is here that values are learned that become part of the self-consistent unity. To maintain unity one tries to adjust to the environment in such a way that is consistent with these values and by resisting experiences that do not fit.

Theorists, besides Lecky, who see the self system as a unified whole rather than as separate drives and traits include Allport, Murray, Murphy, Maslow, Rogers and Adler. While these theorists see personality as motivated by different factors they see the self as a whole where both the environment and individual experiences are taken into account.

Through the socialization and acculturation experience roles are learned. The cognitive process facilitates role enactment. Through "empathy, social sensitivity, identification, and (broadly) social perception", suggest Sarbin and Allen (1968: 515), role skills are enhanced. Social roles are perceived and enacted against the background of the self. The decision as to how to act in the environment rests in the creative interpretation of the individual guided by the others, or the environment, as he/she sees it.

The theoretical framework for this thesis includes learning theory for its relationship to both early experiences and to role learning. As socialization takes place throughout life, it is through anticipatory socialization that one learns role expectations. As a multiplicity of new roles are encountered, role learning may occur through incidental learning, but patterns of interaction are learned early in life through one's unique perception of the environment. It is suggested that

basic patterns combined with role learning allow one to portray aspects of the self as the role is performed, as socially prescribed. It is thus that one can become the role rather than just play a role. While the role may vary, the situation may vary, the consistent self is brought to the role and becomes part of it.

While learning theorists tend to see behaviour as a function of forces applied to the individual (Zigler and Child, 1969: 467), they also point out the importance of the environment as well as the importance of primary learning which, when generalized becomes less susceptible to extinction.

A dynamic theory of personality is not at odds with one that imputes self-consistency. As learning theorists point out, the norm, as portrayed in the role, is repeatedly transformed as one grows to maturity (Zigler and Child, 1969). While it is through roles and experiences that the repertoire of behaviour grows, the basic attitudes regarding self and others remains relatively stable.

Bloom, (1964: 4) in discussing the differences between temporary, transient and stable characteristics suggests that the stable characteristics, (or what has been referred to as self-consistency in patterns of behaviour), "are more likely to be based on interactional processes, ways of relating to phenomena, life style etc".

While it is recognized that there are important changes over the life-span as roles and situations change, the subjective interpretation of the events of early childhood have a lasting effect on adult personality. Individuals move through a variety of roles for which

early socialization cannot provide guidelines (Brim, 1966, 1968), thus socialization continues throughout life.

Based on the assumptions in the theories of Parsons, Adler and Lecky, this research takes the position that basic orientations and attitudes form a consistent pattern of interaction that remains relatively stable through to adulthood. Assuming that social structure and early environment are significant factors in role learning (Brim, 1960), and that early learning is difficult to extinguish, the behavior that we bring to the variety of roles we assume in life remains relatively consistent.

Over the past century many theorists have discussed the self and others in the shaping of identity (Cooley, 1902; James, 1904, Mead, 1936; Allport, 1961). To Mead (1936) the essence of the self is its reflexivity. The individual's "I" and "Me" are both related to social experience. Self appraisal results from the appraisal of others. The "me" represents the organized set of attitudes of others while the "I" is the response of the self to others. Taking the role of others is crucial to the development of self. Inability to do so affects behaviour. Sarbin and Allen (1968) suggest that delinquency and other asocial behaviour patterns are interpreted as a lack of skill in taking the role of the other.

Social Interest and Interaction

Social interest develops as a by-product of interaction with others in one's early years. If basic attitudes toward self and others are thus formed, and personality is relatively stable, then the early

experiences recalled are not considered as explaining childhood behaviour, but as organizing foci to view the present. Based on selective recall of early experiences, the individual presents a picture of his/her basic social orientation, which, through practice has become a framework or stance that guides behaviour.

The birth order of the child locates him/her in a unique social position from which to interact with the first social group. The individual's unique interpretation of the early experiences (Shulman, 1962) in this interactional group with its rules, roles and norms forms patterns of interaction which persist. It is because these patterns persist that it is possible to infer social interest from an adult's recollection of early memories. The adult selectively remembers those experiences that are consistent with his current functioning. Because social interest must be learned in the early years in the interactional process and developed through practice, it is suggested that it can be inferred from analysis of the ERs.

The individual interacting with the environment in his/her own unique way has the potential for social feeling. While this can be nurtured in a number of ways, the primary focus of this thesis is that the presence of siblings will enhance the potential by providing greater opportunity for the development of social feeling or social interest.

A model (Figure 3:1) of the flow of variables suggests that the only child (case A) with less interaction opportunities may not develop social interest to as great a degree as the child raised with siblings (case B). In the form of the original hypothesis this model

Figure 3-1 Variables Related to Sibling Status and Social Interest

INDEPENDENT VARIABLE Sibling status	INTERVENING VARIABLES	DEPENDENT VARIABLE Social Interest Index Potential
Model "A" ONLY	1. Potential for limited interaction opportunities to develop skills for social living	Low
Model "B" WITH SIBLINGS	1. Potential for increased interaction opportunities to develop skills for social living	High

proposes that: individuals raised without siblings will develop social interest to a lesser degree than will those who have been raised with siblings.

CHAPTER 4

METHODOLOGY

Introduction

An initial curiosity about early memories and the concept of social interest grew out of a week-end workshop and a subsequent course in life style analysis. Precollected client profiles, with demographic, family interaction information as well as three to eight early memories were made available to this researcher. Secondary analysis of these data form the basis for this thesis.

The Adlerian therapist generally collects The Life Style Inventory (Mosak & Shulman, 1971), or family constellation. This information is a sociogram of the family as a group in the formative years of the individual. It investigates the circumstances under which the convictions about self and others were formed. Included in this approximately ten page profile is, in part, general demographic data and family information, as well the subject's perception of how siblings responded to him/her, the family atmosphere and parental relationship and the client's relationship with the other members of the family. Attitudes toward school, social and sexual development are also noted. Portions of this information were recorded by the researcher on a form designed for this purpose (Appendix A-1).

The ERs, a projective technique from which clues to perception of self and others (Mosak, 1958) are written verbatim in reply to a statement such as "I would like you to think back and describe in

detail your earliest memory." The instructions, in gathering the ER, must be free of bias. Although the ERs are used differently in clinical assessment and/or in vocational counseling, they are collected in basically the same way (Mosak, 1958, 1981; Kopp, 1980; Olson, 1979).

These ERs, the family relationships and atmosphere, the school, social, and sexual development attitudes, along with demographic information were the data for the research.

Data Collection

From 283 files of a therapist in mid-western United States all cases in which the individuals were only children (25) were selected. Cases of non-onlies, to the total of sixty-five, were then selected by random number. The required information was recorded on an information sheet (Appendix A-1). Much* of this information was subjectively assessed by the researcher (see page 34, "Operationalization of variables for manner in which this was done). The ERs were recorded as written for later analysis.

The Sample

The sample of 63 adults included 25 'onlies', 11 of whom were males and 14 females. The 'with-siblings' group of 38 were evenly divided between males and females (Table 4-1). The age of the subjects ranges from 18 to 64 (Table 4-2). Mother's age at birth of subject ranged from 15 to 42 with 56.6 percent being born before the mother was twenty eight (Table 4-3). Father's socio-economic status, based

*Some of the data originally considered necessary, e.g., stressors diagnosis, and religion were not always available, or not recorded in a consistent manner and thus were not included.

TABLE 4-1

SIBLING STATUS BY GENDER

Gender	Male		Female		Row Total
	percent	n	percent	n	
Sibling status					
Only	44.0	(11)	56.0	(14)	39.7 (25)
With Siblings	50.0	(19)	50.0	(19)	60.3 (38)
Total	47.6	(3)	52.4	(33)	100.0 (63)*

TABLE 4-2

SIBLING STATUS BY AGE

Age	Young	Mid	Uppermid	Older
	18-25	26-30	31-35	36-63
	percent	percent	percent	percent
	n	n	n	n
Sibling status				
Only	16.0	40.0	20.0	24.0
With Siblings	3.6	15.8	23.7	28.9
Total	25.4	25.4	22.2	100.0
	(4)	(10)	(5)	(6)
	(12)	(6)	(9)	(11)
	(16)	(16)	(14)	(16)

on his occupation showed 14 (23.3 percent) to be upper class, 32 (53.5 percent) middle class and 14 (23.3 working class) (Table 4-4).

The majority (82.5 percent) of the mothers of these individuals did not work during the preschool years of subjects in the study (Table 4-5).

Data were available for 92 percent of the sample regarding parental relationship and 71.4 percent regarding perception of the family atmosphere (Table 4-6 and 4-7).

Of those for whom the data were available (39.6 percent) 48 percent of the subjects felt that they were their father's favorite. Fifty-nine percent felt that they were their mother's favorite (Table 4-8 and 4-9).

*insufficient data recorded in 2 cases.

TABLE 4-3

SIBLING STATUS BY AGE OF MOTHER AT BIRTH
OF SUBJECT

Mother's age	Young	Mid	Upper Mid	Older
	15-19	20-27	28-35	36-42
	percent n	percent n	percent n	percent n
Sibling status				
Only	5.0 (1)	35.0 (7)	30.6 (6)	30.0 (6)
With Siblings	12.1 (4)	54.5 (18)	27.3 (9)	6.1 (2)
Total	9.4 (5)	47.2 (25)	28.3 (15)	100.0 (45)

TABLE 4-4

SIBLING STATUS BY FATHER'S SOCIO-ECONOMIC STATUS

SES	Upper	Middle	Working	Total
	percent n	percent n	percent n	percent n
Sibling status				
Only	20.0 (5)	60.0 (15)	20.0 (5)	41.7 (26)
With siblings	25.7 (9)	48.6 (17)	25.7 (9)	58.3 (35)
Total	23.2 (14)	53.3 (32)	23.3 (14)	100.0 (60)

TABLE 4-5

SIBLING STATUS BY WORKING STATUS OF MOTHER
IN PRESCHOOL YEARS OF SUBJECT

Mother's working Status	Yes	No	Total
	percent n	percent n	percent n
Sibling status			
Only	26.1 (6)	73.9 (17)	40.4 (23)
With siblings	11.8 (4)	88.2 (30)	59.6 (34)
Total	17.5 (10)	82.5 (47)	100.0 (57)

TABLE 4-6

SIBLING STATUS BY PARENTAL RELATIONSHIP

Parental relationship	Non-conflict		Conflict		Total	
	percent	n	percent	n	percent	n
Sibling status						
Only	47.8	(11)	52.2	(12)	39.7	(23)
With siblings	60.0	(21)	40.0	(14)	60.3	(35)
Total	55.2	(32)	44.8	(26)	100.0	(58)

TABLE 4-7

SIBLING STATUS BY FAMILY ATMOSPHERE

Family Atmosphere	Accepting		Rejecting		Total	
	percent	n	percent	n	percent	n
Sibling status						
Only	63.2	(12)	36.8	(7)	42.2	(19)
With siblings	73.1	(19)	26.9	(7)	57.8	(26)
Total	68.9	(31)	31.1	(14)	100.0	(45)

TABLE 4-8

SIBLING STATUS BY FATHER'S FAVORITE

Father's Favorite	Yes		No		Total	
	percent	n	percent	n	percent	n
Sibling status						
Only	80.0	(4)	20.0	(1)	20.0	(5)
With siblings	40.0	(8)	60.0	(12)	80.0	(20)
Total	48.0	(12)	52.0	(13)	100.0	(25)

TABLE 4-9

SIBLING STATUS BY MOTHER'S FAVORITE

Mother's Favorite.	Yes	No	Total
	percent n	percent n	percent n
Sibling status			
Only	60.0 (3)	40.0 (2)	18.5 (5)
With siblings	59.1 (13)	40.9 (9)	81.5 (22)
Total	59.3 (16)	40.7 (11)	100.0 (27)

Almost 80 percent of the sample indicated how they felt about their relationship to each of their parents, with 58 percent indicating a close relationship with their father, and 60.8 percent a close relationship with their mother (Table 4-10 and 4-11).

TABLE 4-10

SIBLING STATUS BY RELATIONSHIP WITH FATHER

Relationship with father	Close	Distant	Total
	percent n	percent n	percent n
Sibling status			
Only	57.1 (12)	42.9 (9)	42.0 (21)
With siblings	58.6 (17)	41.4 (12)	58.0 (29)
Total	58.0 (29)	42.0 (21)	100.0 (50)

TABLE 4-11

SIBLING STATUS BY RELATIONSHIP WITH MOTHER

Relationship with mother	Close	Distant	Total
	percent n	percent n	percent n
Sibling status			
Only	54.2 (13)	45.8 (11)	47.1 (24)
With siblings	66.7 (18)	33.3 (9)	52.9 (27)
Total	60.8 (31)	39.2 (20)	100.0 (51)

Of those who replied on the social, school and sexual development attitudes, over 75 percent had a positive attitude (Table 4-12).

TABLE 4-12

SIBLING STATUS BY POSITIVE ATTITUDES BY SCHOOL, SOCIAL
AND SEXUAL DEVELOPMENT

Attitude toward:	Social	School	Sexual Development
	percent n	percent n	percent n
Sibling status			
Only	72.2 (16)	65.2 (15)	68.4 (13)
With siblings	85.3 (23)	84.0 (21)	76.0 (19)
	N = 48	N = 48	N = 44

Operationalization of the Variables

The main independent variable sibling status has two categories: Those who were raised without siblings were classified as 'only', the others were considered the 'with-sibling' group.

Socio-economic status, based on the father's occupation was classified into upper, middle and working class from an index provided by the Duncan's SEI Score (Duncan, 1961). As the data for this study provided only the occupation of the father, the Duncan's Score was selected because it takes into consideration not only the NORC (National Opinion Research Center) prestige ratings of the various occupations but the educational requirements and the income generally derived as well. The SEI scores ranged from a low of nine to a high of ninety six. The variable was operationalized as follows:

- (1) upper class; those with an index greater than seventy nine which included such occupations as Optometrists, Doctors or Dentists.

- (2) middle class; those with an index of fifty-nine to seventy-nine including businesses such as small retail stores, auto dealers or realtors.
- (3) working class; those with an index of less than fifty-nine such as cab drivers or tailors.

The age of mother at birth of subject ranged from fifteen to forty two. This variable was classified as:

- (1) younger; those who were fifteen to nineteen.
- (2) middle range; those who were twenty to twenty seven.
- (3) upper range; those who were twenty eight to thirty five.
- (4) older; those who were thirty six to forty two.

The family atmosphere variable was dichotomized as follows:

- (1) accepting
- (2) rejecting

This classification was based on the perception of the family environment as expressed by the client to the therapist. Interpretation for coding by the researcher was based on the use of statements such as "we were made to feel special...all of us" or "we weren't included... expected to be seen but not heard."

Parental relationship variable, based on an interpretation of the client's stated perception of it, was coded as:

- (1) non-conflict
- (2) conflict

"He was good to her...they had fun" or "father was dominated by mother" would be examples of the two classifications. While the second description does not necessarily describe conflict, the general description of the relationship was not one of non-conflict.

Mother's favorite and father's favorite were classified as (1) yes, or (2) no, depending on response to this specific question in the interview. Whether mother worked or did not work was classified in the same way.

Relationship with father and relationship with mother was considered close (1) or distant (2) depending on the researcher's interpretation of the terms used to describe the parent/child relationship. For example, "mother did everything for me" or "he was fun" or "father was aloof and distant," would suggest the different classifications.

Attitude toward school, toward social relationships and sexual development were interpreted by the researcher on the subject's response to this question on the life style inventory. These were classified as:

(1) positive (satisfactory)

(2) negative (unsatisfactory)

A statement such as "I was a follower...had few friends", "I hated school", "I hated being a girl", would all be considered (2) in their respective categories.

The operationalization of the main independent variable, social interest, involves the use of the rating scale. This requires a more detailed explanation. While the concept of social interest has been of interest to Adlerian researchers for some time, instruments that are considered as measures of the concept have emerged in the past decade. Though the scales that exist (Greever, 1973; Altman, 1973; Quinn, 1973; Crandall, 1975; Reimanis, 1976; Zarski, 1978) differ in design, they all incorporate dimensions of social interest.

The present study, reviewing the Altman and the Quinn scales with

their definitions and the scale suggested by Zarski, used a revised scale (see Appendix A- 2, 3, 4, 5 for these scales and rationale for modifications). The components and definitions of the Social Interest Index Scale are as follows:

- gregarious: moves toward, seeks out and/or enjoys others.
- withdrawn: moves away from others and/or isolates self.
- benevolent: acts kindly toward others.
- hostile: behaviour is aggressive toward others either in an active or passive way.
- altruistic: definitely engages in behaviour that benefits others.
- manipulative: interacts with others to achieve own ends.
- independent: self-reliant, evidences decision-making ability, confidence in own ability, initiates action.
- dependent: relies on others for help and approval, lacks confidence in own ability, does not initiate action.
- encouraging: accepts others as they are, is not judgmental, has faith in the potential of others.
- discouraging: stresses comparison with others, evaluates others.

The above described component variables are those which are considered by therapist and researchers as reflective of the individual's behaviour in the environment. The positive dimensions are frequently seen as reliable indicators of social interest.

The following variables are those which are considered as reflective of the individual's perception of others and/or things in the environment.

- friendly: sees others as moving toward him/her, sees others and/or objects as interesting or pleasant.
- hostile: feels subject to physical and/or emotional attack and/or injury from others.
- accepted: feels included, has a sense of belonging, feels approved of.
- rejected: feels excluded and/or disapproved of, feels not-understood or pushed aside.
- befriended: feels treated in a kindly way.
- mistreated: feels others are mean and/or punishing
- cheerful: see humour in and/or looks on the bright side of situations.
- depressed: sees life as bleak, sees the worst in situations.
- depressed: sees life as bleak, sees the worst in situations.

These eighteen dichotomous dimensions, nine pairs, the first mentioned being components of social interest, were randomized on a scoring sheet presented to the raters (Appendix A-7).

Rating of the ERs

The instructions to raters (Appendix A-6) accompanied the method of and sheet for scoring each recollection* (Appendix A-7, 8). The scoring of each dimension of social interest and non-social interest of the ERs was as follows:

- (1) not involved, absent, no evidence of the dimension in the early recollection.

*In the clinical setting the ERs are interpreted in a variety of ways, but generally it is an interactive process between the client and the therapist which encourages the client to become an active participant in the therapeutic process. Olson (1979) provides a compendium of the literature on, and the use and interpretation of ERs.

(2) low or minimal involvement, a sense of being there but described from the outside, a detached presence.

(3) medium sense of involvement, evidence of the dimension is there, or the use of a singular reference in the description.

(4) definite sense of involvement, definite perception of or response to the dimension is there, use of a multiple reference is in the description.

By providing a scoring system which allows for intensity in the measure, the computed index from the scale gives a more accurate picture of the concepts for the individual subject.

An ER is a statement by the individual of his unique perception of self, of others, and the world in general from his early experiences. Whether the event actually happened as reported is unimportant (Mosak, 1958). To Adlerian therapists, these particular recollections were selected from a vast store of memories because they reflect the present way the individual sees himself. By operationally defining each of the definitions from a point of view of common acceptance, and separating each of the polar pair from the original continuum, this study will measure each of the eighteen variables within the defined standard. Inferring of the defined component in the ERs may be subject to some distortion by the raters. As consensus is often tenuous, having well-defined categories (absence or measurable presence), will provide for a more accurate measure. By separating the dimensions or components of social interest from their bi-polar opposites, rater-bias will be reduced in that only one dimension need be considered at one time. There will be less chance of assuming a presence when none is there. The use of a score of one rather than zero for the 'absent' classification was intended to reduce a tendency not to score a zero on the part of a

rater. The scoring was later recoded to provide zero for absence of a dimension, and to provide a weighted index of one, two or three for social interest (or non-social interest).

The researcher was the main rater involved in the analysis of the early recollections. Initially a consensus session with a second rater was held to get some idea of the judgemental process of the primary rater. In discussion with the second rater, clarifications were made in the instructions to raters and definitions of the terms. Using a non-Adlerian rating procedure and adhering to the stated definitions, nine cases (14 percent) were scored by a second rater to provide a reliability check. With a .79 correlation coefficient of inter-rater reliability, the researcher scored all the recollections in a consistent manner according to the defined categories. No data other than the early recollections were available to the rater during this process. In all 388 ERs were scored on the nine components considered as reflective of social interest and the nine polar opposites.

To operationalize the length of ERs, the total lines (twelve words per typed line) for each individual were divided by the number of ERs. The lines ranged from 1.7 to 8.2 in length. In order to divide these into four categories of 'length of ER' the inflection point, or major break in the total, was used as the determining factor. The classifications were:

- (1) 1.7 to 3.0 = short
- (2) 3.1 to 4.0 = lower mid-range
- (3) 4.1 to 5.5 = upper mid-range
- (4) 5.6 to 8.2 = long

Method of Analysis

Data were computer analyzed (SPSS, NIE et al., 1975) using cross tabulation with contingency tables to test the hypothesis. Pearson's correlation procedure was used to test the polarity of the scale.

Each dimension that was characteristic of social interest was computed individually through the sum of the assigned scores, divided by the number of recollections, and rounded for accuracy. The sum of each of these computed dimensions or components provided the Social Interest Index (SIIX) for the individual.

In a like manner, the dimensions considered to be the opposite of social interest were computed, giving the Non-social Interest index (NSIIX).

The indices were each dichotomized into a low and high category through the examination of the inflection point. While there was some variation in this inflection point, or break in scores, the point of most frequent occurrence, was selected. All the social interest and non-social interest components or dimensions were dichotomized in a like manner allowing for comparison, if desired, one with another.

Conclusion

In order to determine if the development of social interest is related to sibling status, the analysis proceeded through cross-tabulation of sibling status and the index, the family variables and the components of social interest. The final analysis was based on the use of sibling status as the control variable. This same procedure was used to determine if the non-social interest components produced the opposite results.

CHAPTER 5
FINDINGS AND DISCUSSION USING THE
INDICES OF SOCIAL INTEREST AND
NON-SOCIAL INTEREST

Introduction

To determine if sibling status influences the development of social interest, cross tabulation of the computed index of social interest (SIIX) proceeded in a variety of ways. Sibling status was used as independent to the index, then the variables that might be considered as factors in the development of social interest were used as control variables. These environmental-family and demographic variables were then used as independent to SIIX.

In the same manner, the computed index of non-social interest (NSIIX) was considered.

Number and Length of ERs

There was a strong, significant relationship between the number of ERs and SIIX (Tau c = .45, p = .0008). A HIGH SIIX correlated with more ERs. In controlling by sibling status, the strength of the relationship increased for the 'onlies' (Tau c = .64), and diminished slightly for those 'with-siblings' (Tau c = .32, p = .04).

Initial cross tabulation showed that where SIIX is higher, the ERs are longer. While this relationship was weak (Tau c = .13) and not significant, a significant relationship emerged in the partials for the

'with-sibling' group ($\tau c = .35, p = .03$). The partials help explain the lack of original relationship. Those 'with-siblings' related longer ERs if they were HIGH in SIIX. The 'onlies' related longer ERs if they were LOW in SIIX.

Considering these results with the number of ERs, we find the 'onlies' who are HIGH on SIIX recall a greater number of ERs, but they tend to be shorter. Those who have been raised with siblings tended to recall more and longer ERs if they were HIGH on SIIX.

The increased strength of the relationship between number of ERs for the 'onlies' does not help explain the fact that they recall longer ERs if they score LOW on SIIX. Conventional wisdom suggests we might recall those memories that are pleasant more readily than the unpleasant ones. Waldfogel's (1948) research provides a partial explanation. On considering the affective content of early memories he notes that the ratio of pleasant to unpleasant/neutral was approximately equal and consistent overtime, but there is no simple explanation regarding the frequency and length of ERs.

Cross Tabulation Using the Indices

In cross tabulation of sibling status with SIIX no relationship was found (Table 5-1). The results were similar when sibling status and NSIIX were cross tabulated (Table 5-2).

TABLE 5-1

SIBLING STATUS AND THE SOCIAL INTEREST INDEX
(SIIX)

SIIX-	LOW	HIGH	TOTAL
	percent n	percent n	n
SIBLING STATUS			
Only	50.0 (13)	48.0 (12)	100. (25)
With siblings	52.6 (20)	47.4 (18)	100. (38)
Total			100. (63)
Tau c = -.006 p = .48			

Table 5-2

SIBLING STATUS AND THE NON-SOCIAL INTEREST INDEX
(NSIIX)

NSIIX	LOW	HIGH	TOTAL
	percent n	percent n	n
SIBLING STATUS			
Only	48.8 (11)	54.2 (13)	100. (24)
With siblings	52.8 (19)	47.2 (17)	100. (36)
Total			100. (60)*
Tau c = .06 p = .30			
* Three subjects received no rating in NSIIX			

The one result from these initial cross tabulations that might lend support to the hypothesis is that there was a seven percent greater chance of having a HIGH NSIIX in the 'only' group than in the 'with-sibling' group. This result, using the indices, suggests that whether one is raised as an 'only' or 'with-siblings' makes little difference on SIIX but does tend to have a slight effect on NSIIX.

Demographic and Family Variables as Control

In using age, gender, father's socio-economic status and age of mother at birth of subject as controls, although some increase in measure of association was noted, all lacked significance and were relatively weak.

Because family interaction is expected to be implicated in the development of social interest, the variables related to this were used as test factors. While a near-zero correlation was noted between sibling status and SIIIX, there was some increase in the measure of association when the family interaction variables were used as controls. A summary of these increased measures of association and the level of significance is presented in Table 5-3.

TABLE 5-3

SIBLING STATUS BY SIIIX BY FAMILY VARIABLES

FAMILY INTERACTION VARIABLE	MEASURE OF ASSOCIATION (Tau c)	SIGNIFICANCE
Parent's relationship		
Non-conflict	0.06	n.s.
Conflict	-0.21	n.s.
Family atmosphere		
Accepting	0.20	n.s.
Rejecting	-0.42	.02
Father's favorite		
Yes	0.33	n.s.
No	0.14	n.s.
Mother's favorite		
Yes	0.42	.01
No	-0.23	n.s.
Relationship with father		
close	0.16	n.s.
distant	0.05	n.s.
Relationship with mother		
close	0.09	n.s.
distant	-0.01	n.s.

Although only two of these relationships show significance, there is an overall increase in the measure of association when compared to the initial relationship between sibling status and SIIX.

Father's Socio-Economic Status as Independent

While the relationship between father's socio-economic status and SIIX was not significant, percentage comparisons suggest that social interest is likely to be higher in the middle class than in either the upper or the working class (Table 5-4).

TABLE 5-4

FATHER'S SOCIO-ECONOMIC STATUS AND SIIX

SIIX	LOW		HIGH		TOTAL	
	percent	n	percent	n	percent	n
Socio-economic Status						
upper	71.4	(10)	28.6	(4)	100.	(14)
middle	40.5	(13)	58.4	(19)	100.	(32)
working	57.1	(8)	42.9	(6)	100.	(14)
Total					100.	(60)
Tau c = .10 n. s.						

If we consider care and consideration for others, which is part of social interest, as a value, the findings suggest that it is more likely to be a middle class value. Controlling by sibling status provides some further insight. For the 'with-siblings', the percentage comparisons show a curvilinear relationship (Table 5-5). For the 'onlies' the original inverse relationship is stronger; as SES goes up, the likelihood of a LOW on SIIX is greater.

TABLE 5-5

FATHER'S SOCIO-ECONOMIC STATUS AND SIX BY SIBLING STATUS

Sibling Status SIX	Only			With siblings		
	Low	High	Total	Low	High	Total
	percent n	percent n	n	percent n	percent n	n
Socio-economic Status						
Upper	80.0 (4)	20.0 (1)	100. (5)	66.7 (6)	33.3 (3)	100. (9)
Middle	46.7 (7)	53.3 (8)	100. (15)	35.3 (6)	64.7 (11)	100. (17)
Working	40.0 (2)	60.0 (3)	100. (5)	66.7 (6)	33.3 (3)	100. (9)
Total			100. (25)			100. (35)
	Tau c = .25 n.s.			Tau c = 0 n.s.		

This would suggest that in the one-child family, where the father is of the working class, social interest is likely to be fostered to a greater degree than in the middle or upper class. For the multi-child family, the original conclusion holds; SIIX is stronger in the middle class.

Kohn (1969) suggests that all parents share certain values such as honesty, consideration, obedience and dependability; the middle class emphasize honesty, consideration, self-control and curiosity; the working class stress obedience, neatness and cleanliness. If any of Kohn's (1969) values can be considered as part of social interest, this study suggests that those in the upper class do not share the same values as those in middle or working class.

Because of the curvilinear results using SES and SIIX, and the maintenance of this curve in the controls for the 'with-sibling' group but not for the 'onlies', the percentage of each group in each of the three social classes was calculated (Table 5-6).

TABLE 5-6

PERCENTAGE DISTRIBUTION OF SAMPLE:

FATHER'S SOCIO-ECONOMIC STATUS BY SIBLING STATUS

Sibling Status	Only	With Sibling	Total
SES	percent n	percent n	percent n
High	8.3 (5)	15.0 (9)	23.3 (14)
Middle	25. (15)	28.3 (17)	53.3 (32)
Working	8.3 (5)	15.0 (9)	23.3 (14)
			100. (60)*

* there were three who did not have SES rating.

HIGH social interest is more likely to occur in the middle class (Table 5-4). Here we see that both groups under consideration fall, predominately, within the middle class. As noted previously, an 'only' from the working class is more likely to score HIGH, and those from the upper class to score LOW (Table 5-5). Those with-siblings still score HIGH if in the middle class.

A possible explanation for this anomaly is that the 'onlies' in the working class, with fewer material resources, learn the give and take in interaction with others who are at hand. If a lack of social interest inhibits the ability of the child in the upper class to get along with others, there are material resources to fall back on that may be employed to try to compensate for this lack. The middle class parent who feels the 'only' is having problems in interaction with others may make extras available to that child. This suggests that if skills for successful interaction are not learned, resources may be put to use to alleviate the feeling of alienation the 'only' may feel.

Family Interaction Variables and SIIX

Because of the general, although slight, overall increase in association when the family variables were used as control, (see Table 5-5) these variables were used as independent to SIIX. When the relationship of each of these was evaluated, three variables were significantly correlated with SIIX: 'being mother's favorite', 'parental relationship' and 'family atmosphere'.

While the number of subjects for whom 'mother's favorite' was recorded was small, analysis showed a significant relationship between

this and SIIX. If one is the mother's favorite, there is a greater chance of having a HIGH SIIX than if one is not the favorite (Table 5-7).

TABLE 5-7

MOTHER'S FAVORITE BY SIIX

SIIX	Low		High		Total	
	percent	n	percent	n	percent	n
Mother's favorite						
yes	43.8	(7)	56.3	(9)	100.	(16)
no	81.8	(9)	18.2	(2)	100.	(11)
Total					100.	(27)
Tau c = -.36 p = .02						

Because data were available for 20 percent of the onlies and 58 percent of the with-sibling subjects, the measure of association in the original relationship between being mother's favorite and the SIIX was weighted by the high incidence of response on the part of those with siblings to this question. There was a significant correlation (Tau c = .56, p = .004) for those with siblings. It appears that a greater number of those 'with-siblings' felt that perceiving themselves to be mother's favorite was important to mention in the gathering of the family constellation information, possibly because it is only when there are others with whom to compare one's position that such an assessment can be made.

Popular folklore and Freudian explanations (Slater, 1977) suggest that a male child is often the mother's favorite, for this reason being "mother's favorite" and SIIX was controlled by gender. The association is much stronger for the males than for the females. While

the number reported being mother's favorite is evenly balanced we note that the original relationship is due almost entirely to the males (Table 5-8).

As a significant relationship emerged for the males with 'mother's favorite', the variable 'father's favorite' was cross tabulated with SIIX controlling by gender anticipating the females to account for the original relationship. This expectation did not materialize. The zero correlation in the original (Tau c = -.03, n.s.) remained (Tau c = .04, n.s.) for the females. 69.2 percent of the females who answered this question scored LOW on SIIX, while 66.7 percent of the males were scored HIGH. From this we might conclude, (while here the N is small) that if you are female, favorite of father or not, considering this factor alone, you are more likely to be LOW on SIIX.

Father's, evidently, and as research suggests, (Janeway, 1974) do not have the influence that mothers have, in this instance, with regard to development of social interest.

A significant inverse relationship between parental relationship and SIIX was noted (Table 5-9), as conflict increases, SIIX decreases.

TABLE 5-9

PARENTAL RELATIONSHIP BY SIIX

SIIX	Low		High		Total	
	percent	n	percent	n	percent	n
Parental Relationship						
non-conflict	40.6	(13)	59.4	(19)	100.0	(32)
conflict	61.5	(16)	38.5	(10)	100.0	(26)
					100.0	(58)
Tau c = -0.20	p = .05					

TABLE 5-8

MOTHER'S FAVORITE BY SIIIX BY GENDER

Gender	Male			Female		
	Low	High	Total	Low	High	Total
SIIIX	percent n	percent n	n	percent n	percent n	n
Mother's Favorite						
Yes	27.3 (3)	72.7 (8)	100. (11)	80. (4)	20. (1)	100. (5)
No	100. (2)	0.0 (0)	100. (2)	77.8 (7)	22.2 (2)	100. (9)
	Tau c = -.37	p = .03	100. (13)	Tau c = .02	n.s.	100. (14)

TABLE 5-10

PARENTAL RELATIONSHIP BY SIBLIX CONTROLLING
FOR SIBLING STATUS

Sibling Status	Only			With Siblings		
	Low	High	Total	Low	High	Total
SIBLIX	percent n	percent n	percent n	percent n	percent n	percent n
Parental Relationship non-conflict	45.5 (5)	54.5 (6)	47.8 (11)	38.1 (8)	61.9 (13)	60.0 (21)
Parental Relationship conflict	50.0 (6)	50.0 (6)	52.2 (12)	71.4 (10)	28.6 (4)	40.0 (14)
			100.0 (23)			100.0 (35)
Tau c = -0.04	n.s.					Tau c = -0.32 p = .02

When sibling status was used as control, the relationship virtually disappeared for the 'onlies' (Tau c = .04) and intensified and was significant for the 'with-siblings' (Tau c = .32, p = .02) (Table 5-10).

These findings would suggest that whether parents have a good or a bad relationship as perceived by the individual, it affects those who are raised with siblings more strongly than it does those who are raised as only children. The only child, who may be wrapped up in a dyadic relationship with one or the other parent, may not perceive the conflict between the parents possibly because the close parent helps to reduce the intensity of, or shield the child from the conflict. Those in the multi-child family may be used to some form of conflict with siblings. This, they may feel, they have some control over, while parental conflict is beyond their control, thus they are more strongly affected by it. This coupled with possible limited attention or interaction with a concerned parent due to the presence of other children, may intensify the effect of the parental conflict, for those in the with-sibling group.

As noted previously, there was a significant correlation between family atmosphere and SIIX; where there was an accepting environment, SIIX was HIGH, and when the environment was rejecting, SIIX was LOW (Table 5-11).

When sibling status was used as a control variable, a significant and strong relationship emerged for those 'with-siblings', and the relationship vanished for the 'onlies' (Table 5-12).

TABLE 5-11

FAMILY ATMOSPHERE BY SIIIX

SIIIX	Low	High	Total
	percent n	percent n	n
Family			
Atmosphere	45.2 (14)	54.8 (17)	100. (31)
Rejecting	78.6 (11)	21.4 (3)	100. (14)
			100. (45)
Tau c = -.28 p = .01			

The similarity in results in the contingency tables regarding parental relationship and family atmosphere suggests that some of the same factors may be working.

For the 'only', family atmosphere and parental relationship may be one and the same. As there are but three people in the "family" for the 'only', the 'family atmosphere' and 'parental relationship' may not be much different. An accepting atmosphere may mean, in part, a lack of conflict between parents.

While the results in the contingency tables show similarity in the 'with-sibling' group also, the tying of the two variables 'parental relationship' and 'family atmosphere' together is inappropriate. 'Family' includes more than just parents and self for those who are raised in a multi-child family. One might think that the presence of siblings might modify rather than intensify the effect of conflict in the parental relationship, but this does not seem to be the case. Those with sibling, as suggested previously, may be used to a form of conflict over which they have some control because, if it exists, it is a sibling/sibling conflict. They may feel the parental conflict more intensely because they can do little about it.

TABLE 5-12.

FAMILY ATMOSPHERE BY SIIIX CONTROLLING

FOR SIBLING STATUS

Sibling Status	Only			With Siblings		
	Low	High	Total	Low	High	Total
SIIIX	percent n	percent n	n	percent n	percent n	n
Family Atmosphere						
Accepting	58.3 (7)	41.7 (5)	100. (12)	38.8 (7)	63.2 (12)	100. (19)
Rejecting	57.4 (4)	42.9 (3)	100. (7)	100. (7)	0.0 (0)	100. (7)
			100. (19)			100. (26)

Tau c = .01 n.s.

Tau c = -.49 p = .002

In the partial associations presented by the use of 'parental relationship' and 'family atmosphere', SIIX and sibling status, an additional interpretation might serve to tie the two together. If the only child is self-centered and/or narcissistic as previously cited research has suggested, what is going on around him/her may be of less concern than what is happening to him/her. Other things being equal, the conflictive nature of the parental relationship, which is in fact the 'family atmosphere' to the 'only', may be of little importance as long as he/she is made to feel secure. One or the other parent may feel strongly the need to protect this 'only', alone in the adult world, much more so than in the multi-child family where there are others with whom to interact. Shielded from conflict, the 'only' does not have to learn problem-solving in interaction that is part of care and concern for others. He/she may learn quite the opposite. If he/she perceives the conflict, it could result in a 'divide and conquer' process.

Social Attitude Variables and SIIX

Cross tabulations of attitude toward school, toward one's social life, and toward one's own sexual development showed a direct correlation between a positive attitude and a HIGH SIIX, and between a negative attitude and a LOW SIIX, (see Appendix B, Tables 3, 4, 5 which are relevant to the consideration of these variables).

As the variables are all attitudinal in nature, which is the cause, and which is the effect is of less consequence in this research than if sibling status is a factor in the relationship.

The initial results lend support to the thesis that where one feels good about oneself, and where interpersonal relationships are perceived as satisfactory, a higher degree of social interest results. Considering the concept of social interest as including the notion that one high in social interest will have a more positive attitude toward life in general, we might conclude that the presence of it effects one's attitude toward school, others, and toward one's own sexual development.

When the association between these three attitudinal variables and SIIX was controlled by sibling status, a trend was noted in the 'only' group, and significant relationships were found in the 'social' and 'sexual' variables, for the 'with-sibling' group. For the 'onlies', in all instances, there was a weakening of the original relationship, and an increase for the 'with-siblings'.

Whether the positive attitude in each instance is a result of a more highly developed social interest or visa versa, the findings suggest that for those who have more interactional opportunities (the 'with-sibling' group) the relationship between the attitude and SIIX is slightly stronger. Table 5-13 presents a summary of the original and contingency associations.

Analysis of NSIIX

While the NSIIX has little relationship to the initial concern of the thesis, it has been computed as a check on the polarity of the SIIX. As noted previously, there was no relationship between sibling status and NSIIX.

When the family variables were cross-tabulated with NSIIX in order

TABLE 5-13
 SCHOOL, SOCIAL AND SEXUAL DEVELOPMENT ATTITUDE
 AND SIBLINGS WITH SIBLING STATUS

<u>School</u>	initial relationship	Tau-c = .18	p = .06
	controlling by		
	Sibling status		
	only	.14	n.s.
	with siblings	.19	n.s.
<u>Social</u>	initial relationship	.22	.02
	controlling by		
	Sibling status		
	only	.11	n.s.
	with siblings	.30	.01
<u>Sexual Development</u>	initial relationship	.29	.01
	controlling by		
	Sibling status		
	only	.24	n.s.
	with siblings	.33	.02

to consider polarity in results, only one significant relationship emerged. There was a direct, although weak, correlation between working mothers and a HIGH NSIIX (Table 5-14).

TABLE 5-14

MOTHER'S WORK STATUS BY NSIIX

NSIIX	Low	High	Total
	percent n	percent n	n
Work Status			
Yes	30.0 (3)	70.0 (7)	100. (10)
No	61.4 (27)	38.6 (19)	100. (44)
Total			100. (54)

Tau τ = -.18, p = .03

When sibling status was used as a control, the relationship remained virtually the same for both groups. The results suggest that the working status of mother overrides sibling status. In light of the relationship that was noted in the use of SIIX and 'parental relationship', with SIIX and 'family atmosphere', these variables were considered with the NSIIX through the use of percentage comparisons, (Table 5-15). Where there is a perceived conflict in the parent's relationship there is more likely to be a HIGH NSIIX. Similarly, where the 'family atmosphere' is a rejecting one, there is a greater chance of a HIGH NSIIX.

In controlling by sibling status some percentage differences for the 'onlies' were noted on 'parental relationship' and the NSIIX (Table 5-16). Where the relationship between the parents was considered to be conflictive, the 'onlies' were more likely to score HIGH on NSIIX. While this relationship was not significant it does

TABLE 5-15

PARENTAL RELATIONSHIP BY NON-SOCIAL INTEREST
INDEX (NSIIX) AND
FAMILY ATMOSPHERE BY NSIIX

NSIIX	Low	High	Total
	percent n	percent n	n
<u>Parental</u>			
<u>Relationship</u>			
Non-conflict	55.2 (16)	44.8 (13)	100. (29)
Conflict	42.3 (11)	57.7 (15)	100. (26)
Total			100. (55)
	Tau c = .12	n.s.	
<u>Family</u>			
<u>Atmosphere</u>			
Accepting	51.7 (15)	48.3 (14)	100. (29)
Rejecting	35.7 (5)	64.3 (9)	100. (14)
Total			100. (43)
	Tau c = .14	n.s.	

suggest that while the SIIX is not affected by the nature of the parental relationship for those who are only children, there is an effect when we consider the NSIIX. In the 'with-sibling' group, we note that the nature of the parental relationship has little to do with the non-social interest score. While the interpretation here is at odds with that regarding the SIIX, it might be suggested that siblings act as a shock-absorber when these negative characteristics are concerned. Conflict in the parental relationship for the 'with-sibling' group while not enhancing the development of social interest, does not inhibit it. The presence of the other siblings may be the intervening factor here.

For the 'onlies', the nature of the relationship has little to

TABLE 5-16

PARENTAL RELATIONSHIP BY NSIIX BY SIBLING STATUS

Sibling Status	Only			With-siblings		
	Low	High	Total	Low	High	Total
NSIIX	percent n	percent n	n	percent n	percent n	n
Parental Relationship	60.0 (6)	40.0 (4)	100. (10)	52.6 (10)	47.4 (9)	100. (19)
Non-conflict	33.3 (4)	66.7 (8)	100. (12)	50.0 (7)	50.0 (7)	100. (14)
Conflict			100. (22)			100. (33)
Total						

Tau c = .26 n.s.

Tau c = .02 n.s.

do with the characteristics that are considered consistent with social interest, but does affect, to some extent, those characteristics that are considered as indicating a lack of social interest.

This result alone, tends to lend indirect support to the hypothesis that the presence or absence of siblings will have a differential effect on the development of social interest. Here we find 'onlies' are affected to a greater degree if we consider parental relationship as influencing the development of the components considered as polar to social interest.

While the relationship between sibling status and NSIIX was weak and not significant, a significant relationship emerged when 'relationship with mother' was introduced as a control variable. This variable was used because the majority of the mothers of these subjects did not work, and many of those in the sample were raised in an era where fathers frequently were less involved in the child-rearing task than presently, thus consideration of the relationship with mother seemed to be relevant.

Where there is a close relationship with the mother, the 'onlies' have a HIGH NSIIX and those who were raised with others, scored LOW (Table 5-18). If the HIGH NSIIX is considered as a lack of development of social interest, this finding, which is statistically significant, would lend indirect support to the hypothesis.

While the results at first glance appear to be at odds with what could be considered a close or distant relationship, they show support for the thesis that an only child, in a dyadic rather than a large group relationship, may not have the NEED to develop social

TABLE 5-17

FAMILY ATMOSPHERE BY NSIIX BY SIBLING STATUS

Sibling Status	Only			With-Siblings			Total	n	
	Low	High	Total	Low	High	Total			
NSIIX	percent	n	percent	n	percent	n	percent	n	
Family Atmosphere									
Accepting	34.3	(4)	63.6	(7)	61.1	(11)	38.9	(7)	100. (18)
Rejecting	42.9	(3)	57.1	(4)	28.6	(2)	71.4	(5)	100. (7)
Total									100. (25)
	Tau c = -.06			Tau c = .26 n.s.					

TABLE 5-18

SIBLING STATUS BY NSIIX RELATIONSHIP

WITH MOTHER AS CONTROL

Relationship with Mother	Close			Distant		
	Low	High	Total	Low	High	Total
NSIIX	percent n	percent n	n	percent n	percent n	n
Sibling status						
Only	41.7 (5)	58.3 (7)	100. (12)	54.5 (6)	45.5 (5)	100. (11)
With siblings	72.2 (13)	27.8 (5)	100. (18)	37.5 (3)	62.5 (5)	100. (8)
Total			100. (30)			100. (19)

Tau c = -0.29 p = .04 Tau c = 0.16 n.s.

interest to the same extent that one raised in a larger group may have. These results suggest that the closeness of the mother-child relationship, other factors aside, may contribute to a lack of social interest in the only child. The lack of original relationship is, in part, explained by the opposite directions in the control. Relationship with mother is a factor in the development of non-social interest for the only. This finding is consistent with Adler (1964) who, states that a close maternal relationship which may include pampering may stifle the development of social interest.

The findings in the cross tabulation of father's socio-economic status and NSIIX tend to present a polar picture to those in the SIIX cross tabulations. While the relationships were weak both in initial associations and in the contingency tables, the results show that a HIGH NSIIX is more likely to occur in subjects whose father is in the upper socio-economic status. The middle and working class were about equal in this regard. In the partials, the 'onlies' are HIGH on NSIIX when father is upper class and HIGH on NSIIX when he is in the working class. The effect of being middle class with regard to the NSIIX is minimal for the 'onlies'. For the 'with-sibling' group there is a direct relationship ($\tau_c = .22$); as SES goes up so does the NSIIX.

While the original association was polar to that of the SIIX, the contingency tables present contradictory findings in the two groups (Tables for SES by NSIIX may be found in Appendix B, Table 6 and Table 7).

Considerations Regarding the Use of SIIX

Initial analysis using the index of social interest provided little

support for the hypothesis: there was no relationship between sibling status and the computed index of social interest. As analysis proceeded, it became apparent that several factors were influential in their relationship to Social interest.

Both family atmosphere and parental relationship are related to SIIX (Tables 5-9, 5-10). These have also shown divergent trends when controlled by siblings status. Because the very conditions of living in an upper, middle, or working class environment may affect the development of social interest, the variable SES was used as independent to 'family atmosphere' and 'parental relationship' in order to test SES as a factor in the kind of relationship parents have, and the kind of family atmosphere the parents provide as perceived by the subjects in this study (Table 5-19).

Parental relationship is perceived to be 'non-conflict' to a greater degree in the upper class (61.5%), slightly less in the middle class (56.7%), and again shows a slight decline in the working class (53.7%). There is perception of conflict in the parental relationship of those in the working class to a greater extent than in the middle class and least of all in the upper class.

Family atmosphere, on the other hand, is perceived by the subjects in the sample as more 'accepting', by those from middle-class homes than in either the upper or working class homes.

When SES is used as a control variable with family atmosphere and SIIX, from the marginals it is noted (Table 5-20) that the middle class home is seen as 'accepting' by 73.9% of the total in that category; 66.7% of the working class see the family environment in this way,

TABLE 5-19

FATHER'S SOCIO-ECONOMIC STATUS AND FAMILY ATMOSPHERE, AND
 FATHER'S SOCIO-ECONOMIC STATUS AND PARENTAL RELATIONSHIP: A COMPARISON

	Parental Relationship				Family Atmosphere							
	Non-Conflict		Conflict		Accepting		Rejecting					
	percent	n	percent	n	percent	n	percent	n				
Socio-Economic Status												
Upper	61.	(8)	38.5	(5)	100.	(13)	63.6	(7)	36.4	(4)	100.	(11)
Middle	56.7	(17)	43.4	(13)	100.	(30)	73.9	(17)	26.1	(6)	100.	(23)
Working	46.2	(6)	53.8	(7)	100.	(13)	66.7	(6)	33.3	(3)	100.	(9)
Total					100.	(56)					100.	(43)

TABLE 5-20
 FAMILY ATMOSPHERE BY SIIIX
 CONTROLLING FOR FATHER'S SOCIO-ECONOMIC STATUS

Father's Socio-Economic Status		Upper		
SIIIX	Low	High	Row %	
Family Atmosphere				
accepting	57.1 (4)	42.9 (3)	63.6	
rejecting	100.0 (4)	0.0 (0)	35.4	
			N = 11	
		Middle		
SIIIX	Low	High	Row %	
accepting	35.3 (6)	64.7 (11)	73.9	
rejecting	66.7 (4)	33.3 (2)	26.1	
			N = 23	
		Working		
SIIIX	Low	High	Row %	
accepting	50.0 (3)	50.0 (3)	66.7	
rejecting	66.7 (2)	33.3 (1)	33.3	
			N = 9	

while 63.6% do so in the upper class.

While these percentage differences are not dramatic, it clearly shows that the middle class are providing a family atmosphere that is perceived as more accepting than do those in the other Socio-economic categories. One might ask "what other factor is involved that accounts for this in the middle class?"

In reviewing the family atmosphere by SES table (5-18) it is noted that an accepting family is more likely to be a middle class family;

where there is an accepting family atmosphere, there is more likely to be HIGH on SIIX (Table 5-11); finally, those in the sample who are from middle class homes are higher in SIIX (Table 5-4). It is in the family interaction variables that sibling status has been accentuated (Table 5-12). Sibling status has been shown to have no relationship to SIIX (Tau c = -.006), nor any to SES (Tau c = 0). While the relationships were not statistically significant at .05, they were .10 between family atmosphere and SIIX, and parental relationship and SIIX.

From the results it is concluded that family atmosphere, which to the 'only' may be synonymous with 'parental relationship', is an intervening variable between socio-economic status and social interest.

SES modifies the factors at work in the family. The positive family variables accentuate social interest, and the negative ones diminish it.

Summary and Conclusion

Initial analysis using the index of social interest provided little support for the hypothesis. When the family interaction variables were used as controls, relationships that were significant emerged in terms of 'family atmosphere' and 'working status of mother'. This, coupled with an overall increase in measure of association, prompted the use of the demographic and family interaction variables as primary independent variables, with sibling status as the control.

Results indicated a curvilinear relationship between SES and SIIX in which those in the middle class were HIGH on SIIX. When sibling status is introduced as an antecedent third variable, the relationship

remained for those 'with-siblings'. For the 'onlies' an inverse relationship emerged; as SES went up, SIIX went down. These associations were not statistically significant.

A non-conflict parental relationship and an accepting family atmosphere were directly correlated with a HIGH SIIX. This correlation remained for the 'with-sibling' group but disappeared for the 'onlies' when this was controlled.

There was a significant correlation between being mother's favorite and SIIX for the 'with-sibling' group. Because males are often considered to be the mother's favorite, gender was used as a control variable to examine differential development of social interest under this condition. For males the relationship remained relatively strong and significant, but for the females there was virtually no difference. The relationship between being mother's favorite and SIIX was more relevant for the males than for the females.

In being father's favorite, there was an equal chance of having a HIGH or LOW on SIIX, but the controls showed that for the males, there was more likelihood of a HIGH index and for the females, favorite or not, the score was likely to be LOW.

Positive attitudes with regard to school, social and sexual development correlated with a HIGH SIIX. In the controls, this relationship was more intense for the 'with-sibling' group than for the onlies.

Sibling status and the NSIIX were not correlated, but mothers who worked tended to have off-spring who were HIGH on NSIIX whether they were 'onlies' or raised with siblings.

Where parental relationship was one of conflict, NSIIX tended to be HIGH, a relationship which intensified for the only group. A rejecting family atmosphere tended to produce those who were HIGH on NSIIX, a condition that was primarily due to those with siblings. None of these relationships were significant.

As SES went up so did the NSIIX. In the controls, there was no relationship here for the 'onlies' but the 'with-sibling' group, there was a direct relationship, the higher the father's socio-economic status, the more likelihood of HIGH NSIIX.

While there was no original relationship between sibling status and NSIIX, the use of 'relationship with mother' as a control variable produced a significant correlation between a close relationship and a HIGH NSIIX. This relationship accounted for 58.3% of the 'onlies', while 27.7% of the 'with siblings' fell within this category. With regard to the hypothesis, this finding may be one of the most relevant in the differential effect of being raised as an 'only' or 'with-siblings'. The results suggest that a close relationship with mother is more apt to contribute to the development of attitudes and behaviours that are not consistent with social interest. A mother with a single child is more likely to develop a close relationship with that child, therefore, the exclusivity may minimize outside contact for that child. If the relationship has within it the potential for developing non-social interest characteristics, recognition of the possibility can reduce the effect.

This chapter suggests that there is a complex chain of causation in the development of social interest. While sibling status was not

directly related to social interest, investigation of the family interaction variables and father's socio-economic status provided insight. Socio-economic status was a factor in determining the environment in the family - specifically, such variables as 'parental-relationship' and 'family atmosphere'. These family variables, in turn, affect the development of social interest. While the 'onlies' and the 'with-sibling' groups were affected differently, it was concluded that social class and family interaction are the primary factors in the development of social interest.

CHAPTER 6
FINDINGS AND DISCUSSION USING
THE COMPONENTS OF SOCIAL INTEREST AND
NON-SOCIAL INTEREST

Introduction

While it has become evident that social interest is related to the interactions in the family, and that there is some differential effect with regard to sibling status, the use of the individual components of social interest as scored from the ERs may show in which areas the two groups differ. To clarify the relationship between the interaction variables, and father's socio-economic status with the components of social interest, as well as to search for differential effect, sibling status was used as a test factor. Specification in the conditional relationships will enhance our understanding of sibling status and whether it facilitates or inhibits the original association. While generalizations about the sample may be made from the initial cross tabulation, the effect of sibling status is the main concern.

Analysis of the components considered to be representative of non-social interest will proceed in a similar manner primarily to determine if there is polarity in the measure. (Statistical summary of the demographic and the family interaction variables may be found in Appendix B, Table 8 and Table 9).

Mother's Age at Birth of Subject

'Onlies' have older mothers, and those with sibling have younger mothers (Tau c = $-.32$, $p = .01$). With the trend to having children later, and toward having a single child, the relationship between mother's age and how it affects the various components of social interest was considered important.

The results showed that 'onlies' born to older mothers are likely to be more 'gregarious'. This significant relationship (Tau c = $.45$, $p = .03$) emerged in the partials when a near zero correlation was present in the original cross tabulation (Tau c = $.07$, n.s.).

Those with siblings who had younger mothers were more likely to have ERs from which 'independence' and 'encouraging' behaviour was inferrable, and less likely to find the environment 'mistreating'. For this group, if the mother was older, the feeling of being 'mistreated' in the environment and a HIGH score on this component were significantly correlated (Tau c = $.45$, $p = .05$).

Young mothers who have more than one child may allow more independence simply because they are busy. In allowing this, they may encourage the child to move toward others, thus the child may feel that others are less 'mistreating' than does the child who is not allowed independence. While the 'onlies' do not have this characteristic inferred in the ERs, they are HIGH on 'gregariousness' if they have older mothers.

Working Status of Mother

With the ever-increasing number of mothers who work, the working

status and its relationship to the various components of social interest (and the polar pair) is of concern. While the majority (82.5%) of the mothers of the subjects in the sample did not work, the analysis provides some differences in the two groups being compared.

'Gregarious' behaviour is HIGH if mother works and there are siblings, but it makes little difference in this component if the mother works or not for the 'onlies'. If the mother works, the 'onlies' are likely to be more 'independent', and tend to find the environment more 'cheerful'.

In the 'with-sibling' group, if she works, there is a greater probability of scoring LOW on 'cheerful'. Being more 'independent' and finding the environment 'accepting' is likely to occur for those with siblings if the mother does not work.

'Manipulative' behaviour is HIGH for those who have working mothers and LOW for those who do not. This relationship overrides sibling status.

Relationship with Mother

A distant relationship with mother correlated with a HIGH on 'encouraging' behaviour. This occurred regardless of sibling status. Considering the variable that is classified as the polar pair, 'discouraging', some interesting results occur. While there is a zero correlation in the initial cross tabulation, the two groups take opposite directions in the partials. While neither are strong nor significant, it is noted that for the 'onlies' a close relationship with mother results in a LOW, a distant one, a HIGH. For those with

siblings the opposite is the case.

Because of the low N in the variable 'mother's favorite', analysis with respect to interpretation was problematic.

Relationship with Father

It was only in the components of non-social interest that relationships were found with this variable. A distant relationship with father resulted in a LOW on 'withdrawing' behaviour (Tau c = .29, p = .04). For the 'onlies' there was an equal chance of scoring either LOW or HIGH if a close relationship existed, but if it was distant, then a LOW score resulted. The partials in the 'with-sibling' group found the same relationship as in the original table but somewhat weaker. In considering the variable component 'depressing', the trend in the original cross tabulation showed a close relationship with father and a LOW were correlated, as were a distant relationship and a HIGH. The partials showed that for the 'onlies' the kind of relationship with the father made little difference, but for the with-sibling group a relatively strong significant relationship emerged (Tau c = .32, p = .05) that was consistent with the original.

While a different effect is noted in some of these components no dramatic, or unusual results emerged. 'Onlies' tend to be slightly less effected with regard to these non-social interest components than do those with siblings.

The variable 'father's favorite', like that of 'mother's favorite', was not analyzed due to the low N.

Social Attitude Variable

A positive attitude correlated with gregarious behaviour

(Tau $c = -.17$, $p = .04$) and finding the environment 'friendly' (Tau $c = -.32$, $p = .05$). The former relationship became stronger and significant for the 'onlies' (Tau $c = -.32$, $p = .05$) but was near zero for those with siblings. The later relationship was confirmed in the partials.

While a near zero correlation was noted between the social variable and finding the environment 'accepting', opposite trend emerged in the partials which were relatively strong and significant. For the 'onlies' a positive attitude and a LOW score were correlated (Tau $c = .33$, $p = .04$). For those 'with-sibling' a positive attitude and a HIGH score are correlated (Tau $c = -.21$, $p = .04$). This same result was noted for those 'with-siblings' in the perception of the environment as 'befriending' (Tau $c = -.23$, $p = .03$). There was no relationship between this variable and the social attitude for the 'onlies'.

Sexual Development Variable

This variable with the various components and sibling status as a control variable showed little difference between the two groups. For both groups, a positive attitude resulted in a HIGH score on finding the environment 'friendly' and 'befriending', and a LOW score on manipulative and dependent behaviour. In the initial cross tabulation 'hostile' behavior showed a correlation between a positive attitude and a LOW, a negative attitude and a HIGH (Tau $c = .31$, $p = .02$). In the partial the relationship was strong and significant for those 'with-siblings' (Tau $c = .50$, $p = .005$) but no such relationship emerged for the 'onlies' possibly explained by the low N.

School Attitude Variable

In this variable, as with the social and sexual development variables, it is noted that in general a positive attitude results in a HIGH rating on many of the social interest components, and a LOW on the non-social interest components.

A positive attitude toward school resulted in a HIGH on 'gregarious' behaviour for both the 'onlies' and the 'with-siblings'. A LOW on 'encouraging' behaviour, where the attitude was positive, provided results that seemed inconsistent with the intended definition of encouraging behaviour. Here and in subsequent analysis this variable was problematic with respect to interpretation.

While finding the environment 'accepting' produced an initial zero correlation (Tau c = -.002, n.s.), relationships emerged for each group. 'Onlies' with a positive attitude, were rated as a LOW on this variable (Tau c = .31, p = .08) while those 'with-siblings' showed a HIGH 9 (Tau c = -.24, p = .03).

The environment 'depressing' also showed opposite trend for the two groups. A weak original relationship was reversed and relatively strong for the 'onlies' and relatively strong and significant in the opposite direction for those 'with-siblings'. Where the attitude was positive, the 'onlies' were HIGH (Tau c = -.34 n.s.) and the 'with-sibling' group were LOW (Tau c = .26, p = .05).

Considering these interaction variables together, there appear to be some inconsistencies. While the 'onlies' seem to be more outgoing in their behaviour, they feel less accepted in the environment

than do those with siblings. The explanation here may be consistent with the centre-of-attention-image regarding the only child. Portrayal of behaviour in the ERs that is rated as outgoing for the 'only' may be to fulfill a need to be noticed. If this is not accompanied by a willingness to get along with and feel comfortable with others, then the environment may not seem to be as welcoming a place as home. Those 'with-sibling', who have had more interactive opportunities, may not display gregariousness to the same degree, but do find others to be more 'befriending' and more 'accepting' of them.

Parental Relationship

Differential effects began to emerge in the cross tabulation of 'parent's relationship' with the various components when sibling status was used as control.

'Encouraging' behaviour resulted in a LOW where the parental relationship was one of non-conflict, and HIGH where there was conflict (Tau $c = .38$, $p = .005$). This same correlation continued in the partial with the 'with-sibling' group. (Tau $c = .37$, $p = .01$). Considering the polar component, 'discouraging', it was LOW in the conflict, and HIGH in the Non-conflict situation. This relationship was maintained in the partials, but modified somewhat for the 'onlies'. These results, which seem to be the reverse of what one might expect, have appeared before with this component, and do show similar trends in subsequent analysis. Where there is what might be considered a positive situation, e.g., where conflict is low, the subjects score LOW and a negative situation, they score HIGH. There appears to be an

anomaly. The definition* may have resulted in improper scoring, or some other factor may be operating.

'Dependent' behaviour is LOW where there is less conflict (Tau c = .31, p = .01). In the partials, the strength of the association increased for the 'onlies' (Tau c = .42, p = .03), and was modified for those with siblings (Tau c = .25, p = .09). The results on this component might suggest that where there is conflict between the parents, an atmosphere of insecurity is created for the child, who may not act independently for fear of results that might be idiosyncratic depending on the situation at the moment.

While the original relationship between parent's relationship and 'hostile' behaviour was not significant, a moderate measure of association was noted (Tau c = .22). Where there was a non-conflict situation between parents, 'hostile' behaviour, as inferred in the ERs, was LOW. This result would tend to be consistent with what we know about social interaction. In the contingency tables, there is a strong significant relationship in the same direction as the original for the with-sibling group (Tau c = .53, p = .009). For the 'onlies' the direction of the relationship is reversed. Their own 'hostile' behaviour is HIGH where the parental relationship is one of non-conflict. It might be that the 'only', having been

*Encouraging behaviour is defined as "accepts others as they are; is not judgmental, and has faith in the potential of others." Discouraging behaviour is defined as: "stresses comparison with others, evaluates others."

the centre of attention in the home environment, in attempting to maintain this position outside MAY have to resort to hostile or aggressive behaviour if his/her position is threatened by another. This could happen regardless of a non-conflict, or conflict relationship between parents. From the perspective of the 'only', the parent's relationship may be one thing, while his/her's own relationship with them and with others may be something quite different.

Where the relationship between parents was perceived as non-conflict, those with siblings tended to find the environment more 'cheerful' (Tau c = $-.043$, $p = .01$). In the 'only' group the majority of the subjects fell in the HIGH range (63.2%). Here it mattered little which type of relationship the parents had. Parental relationship, here again, seems to have less effect on the 'onlies' than it does on those in the 'with-siblings' group.

Family Atmosphere

There was a tendency to score HIGH on 'benevolent' behaviour where there was an 'accepting' family atmosphere (Tau c = $-.24$, $p = .08$). While the N for the 'onlies' was low, the trend in this group reversed from the original relationship; those from 'rejecting' families were more likely to score HIGH. Those who had siblings, scored LOW if from 'rejecting' families but the type of family made little difference on the HIGH score (Tau c = $-.44$, $p = .01$).

There was a significant correlation between 'accepting' families and finding the environment 'cheerful' which was maintained in the partials.

The 'with-sibling' group who have an accepting family see others

as 'friendly', 'befriending' and things in general as 'cheerful', 'dependent' and 'hostile' behaviour is LOW. If the family atmosphere is 'rejecting', to those with sibling, there is a feeling that the environment is 'rejecting' also. This latter holds true for the 'onlies' as well, who also tend to be scored LOW on 'dependence' if the family is rejecting, but HIGH on their perception of the environment as being 'befriending'.

Cross tabulation of family atmosphere and the perception of others as 'accepting' resulted in a zero correlation. The lack of original relationship was a result of the opposite direction of the two groups in the partials. While still lacking significance the 'onlies' tended to find others more accepting where the family atmosphere was rejecting while those 'with siblings' found the opposite to be the case.

The 'only' with no other with whom to interact except the parents may consider the triad to be 'the family'. If this 'family' is rejecting, there is no other to whom she/he can turn except those outside the home who may seem to be more 'accepting' than is, the 'family'. Those in the 'with-sibling' group, on the other hand, show more consistency between the family atmosphere and the outside environment.

Father's Socio-Economic Status

Looking at the components individually as they are related to SES, a significant relationship is noted between SES and 'gregarious', 'withdrawing', 'independent', and 'dependent' behaviour, and the perception of the environment as 'rejecting'. Considering these in the

partials, differences are noted in the two groups being compared.

Significant relationships also emerge in the contingency tables that were not evident in the initial cross tabulations.

There is an inverse relationship between SES and 'gregarious' behaviour (Tau $c = .32$, $p = .01$). This relationship is retained in the partials and is significant for the 'onlies' and modified somewhat for those 'with-siblings'.

Sibling status is not a factor in the correlation between SES and 'independent' behaviour. Those who have fathers in the working class are more likely to be independent regardless of sibling status (Table 6-1). The polar pair, 'dependent' behaviour corroborates the results for the 'with-sibling' group but not for the 'onlies'.

'Dependent' behaviour is likely to be LOW for those 'with-siblings' in the working class (Table 6-2). There were no 'onlies' coded on this component in the upper class, but the results are still at odds with those of 'independent' behaviour because the 'onlies' from the middle class are more likely to be LOW on 'dependence'.

While no initial relationship was noted between SES and the perception of the environment as 'befriending', a significant relationship emerged for the 'onlies' (Tau $c = -.33$, $p = .02$).

'Onlies' from working class homes found the environment more 'befriending', while those from the 'with-sibling' group found this to be so, if they were from middle class homes.

On the environmental variable 'rejecting' there was a direct correlation with SES. As SES went up, the perception of the environment as 'rejecting' increased. The strength of the measure of

TABLE 6-1
FATHER'S SOCIO-ECONOMIC STATUS AND INDEPENDENT BEHAVIOUR

Behaviour Independent	Low		High		Total	
	percent	n	percent	n	percent	n
SES						
Upper	30.8	(4)	69.2	(9)	100.	(13)
Middle	34.5	(10)	65.5	(19)	100.	(29)
Working	0.0	(0)	100.0	(13)	100.	(13)
Total					100.	(55)
Tau c = .22, p = .04						
Controlling for Sibling Status						
Behaviour Independent	Only		With-siblings		Total	
	percent	n	percent	n	percent	n
SES						
Upper	40.0	(2)	60.0	(3)	100.	(5)
Middle	50.0	(7)	50.0	(7)	100.	(14)
Working	0.0	(0)	100.0	(4)	100.	(4)
Total	39.1	(9)	60.9	(14)	100.	(23)
Tau c = .22, n.s.						
Tau c = .20, p = .07						

TABLE 6-2

FATHER'S SOCIO-ECONOMIC STATUS AND DEPENDENT BEHAVIOUR

Behaviour Dependent	Low		High		Total	
	percent	n	percent	n	percent	n
Upper	50.0	(3)	50.0	(3)	100.	(6)
Middle	77.3	(17)	22.7	(5)	100.	(22)
Working	83.3	(5)	16.7	(1)	100.	(6)
Total					100.	(34)

Tau c = -.19, p = .09

Controlling for Sibling Status

Behaviour Dependent	Only		With-siblings	
	Low percent	High percent	Low percent	High percent
Upper	---	---	50.0	(3)
Middle	76.9	(10)	77.8	(7)
Working	0.0	(0)	100.	(5)
Total			100.	(14)

Tau c = .20, p = .05

Tau c = -.40, p = .03

association decreased for the 'onlies' and increased for the 'with-sibling' in the partials.

In the previous chapter results indicated that as SES goes up, SIIX goes down. For the 'onlies' this relationship persisted, while for those 'with-sibling' it became curvilinear. Results also showed that both 'family atmosphere' and 'parental relationship' are related to social interest. Also, a relationship existed between these two variables and SES.

If we were to consider SES as determining sibling status, this would lead us to postulate that there would be more 'onlies' in the upper class. In this sample, this is not the case. While today, the higher the SES the more likelihood of having an only child, during the 1950's and 1960's those in both the middle class and upper class tended to have more children. This sample ranges in age from 18 to 64 thus spans the high fertility era. The fact that 60 percent of the 'onlies' fall within the middle class may be explained by this factor (see Table 4-4).

General Findings from the Use of the Components

Several points have been clarified in the cross tabulations using the components of the indices. 'Encouraging' as a variable produced anomalous results. Socio-economic status has a stronger effect on many of the components than does sibling status. Positive parental relationship and an accepting family atmosphere are strong factors in the development of positive components of social interest. The non-social interest components are fostered where family atmosphere and the parental relationship are less satisfactory.

These results have not provided great insight beyond that which was gained in the use of the indices with one exception. There may be a problem with the indices, especially the SIIX due to the anomalous result with the variable 'encouraging'. For this reason a brief consideration of the components that make up the scale and their relationship to each other will follow.

Analysis of the Components of the Indices

A correlation matrix was used to view the polarity of the various components. Table 6-3 provides a summary showing relationship, significance and level of polarity for the components (also see Appendix B, Table 10 and Table 11). It becomes apparent that there is no polarity in the encouraging/discouraging dimension. Within the behavioural dimensions, independent/dependent shows a strong correlation, the greatest polarity and the greatest variance, followed by benevolent/hostile, then by gregarious/withdrawn. Altruistic/manipulative behaviour shows a near zero correlation, very little polarity and virtually no variance. This is an anticipated result as the N on altruistic behaviour was three. This dimension was not analyzed. Its polar opposite 'manipulative', was considered, because it was coded in the ERs for some of the subjects.

The environmental dimensions, which in the rating were easier to 'see' in the ERs, showed the greatest polarity, and stronger correlation with their polar opposite.

The 'encouraging' component consistently showed an opposite direction to the intent of the definition. When these two factors are taken into account, a possible explanation for NSIIX having a

TABLE 6-3

COMPONENTS OF THE INDICES: RELATIONSHIP, SIGNIFICANCE AND

LEVEL OF POLARITY

Behavioural Dimensions	Correlation Coefficient	Level of Significance	Cross-Product Deviation	Variance
Gregarious/withdrawing	-.154	.113	-4.285	-.069
Benevolent/hostile	-.220	.04	-7.857	-.127
Altruistic/manipulative	-.016	.45	-.143	-.002
Independent/dependent	-.50	.00	-14.429	-.233
Encouraging/discouraging	.138	.14	3.825	.062
Environmental Dimensions				
Friendly/hostile	-.213	.04	-9.428	-.152
Accepting/rejecting	-.288	.01	-11.0	-.177
Befriended/mistreated	-.414	.00	-16.62	-.268
Cheerful/depressing	-.456	.00	-16.778	-.271

stronger effect becomes apparent.

As the rating of the ERs has used a form of text analysis based on the definitions provided, the definitions that are not inferrable, or are inappropriately inferrable, confound the measure.

Based on that data a new index of social interest could be constructed eliminating the anomalous component 'encouraging' and the unused component 'altruistic' from which a correlation with sibling status might result.

A new index was created deleting, as suggested above, two components of social interest. The inflection point of this new scale came very close to that of the original so the scale was dichotomized in the same manner, with a slight bias against the hypothesis.

The results again found no correlation between the index and sibling status (Table 6-4).

The modified index changes the relationship only slightly, although this may be worth noting. On the new index, the 'onlies' tend to score LOW in slightly greater proportion than they did on the original SIIX where the 'with-siblings' tended to have a greater proportion in LOW. Correspondingly, the 'with-siblings' have a slightly greater likelihood of a HIGH than do the 'onlies'.

The modified index, like the original, was significantly correlated with parental relationship, and family atmosphere. The measure of association in the new index increased slightly for parental relationship (from Tau $c = -.21$ to $-.24$), and decreased slightly for the relationship between family atmosphere and the index (from Tau $c = -.29$ in the original to $-.25$ using the new index, Tables 6-5, 6-6).

TABLE 6-4

COMPARISON OF SIBLING STATUS AND THE MODIFIED SOCIAL INTEREST INDEXES AND THE SIIIX

Index	New SI Index			Original SIIIX		
	Low	High	Total	Low	High	Total
	percent n	percent n	n	percent n	percent n	n
Sibling Status only with-siblings	56.0 (14)	44.0 (11)	100. (25)	50.0 (13)	48.0 (12)	100. (25)
	52.6 (20)	47.4 (18)	100. (38)	52.6 (20)	47.4 (18)	100. (38)
			100. (63)			100. (63)
	Tau c = .03, p = .39			Tau c = .006, p = .48		

TABLE 6-5
COMPARISON OF PARENTAL RELATIONSHIP AND MODIFIED SOCIAL INTEREST INDEX

Index	WITH ORIGINAL SIIX				SIIX							
	New SI Index		Total		Low		High		Total			
	percent	n	percent	n	percent	n	percent	n	percent	n		
Parental Relationship	40.6	(13)	59.4	(19)	100.	(32)	40.6	(13)	59.4	(19)	100.	(32)
Non-conflict	65.4	(17)	34.6	(9)	100.	(26)	61.5	(16)	38.5	(10)	100.	(26)
Conflict					100.	(58)					100.	(58)
Total												
	Tau c = -.24, p = .03								Tau c = -.21, p = .05			

TABLE 6-6
COMPARISON OF FAMILY ATMOSPHERE AND MODIFIED SOCIAL INTEREST INDEX

Index	WITH SIIX				SIIX							
	New SI Index		Total		Low		High		Total			
	percent	n	percent	n	percent	n	percent	n	percent	n		
Family Atmosphere	48.4	(15)	51.6	(16)	100.	(31)	45.2	(14)	54.8	(17)	100.	(31)
Accepting	78.6	(11)	21.4	(3)	100.	(14)	78.6	(11)	21.4	(3)	100.	(14)
Rejecting					100.	(45)					100.	(45)
Total												
	Tau c = -.25, p = .03								Tau c = -.29, p = .01			

Percentage comparison of SES and the new index shows that social interest is more likely to be high in the middle class (Table 6-7).

Using SES as a control variable with parental relationship and the new S.I. index, it is noted that 60 percent of those from the middle class scored HIGH on the new index, while 30.8 percent scored HIGH in the upper class, and 38.5 percent in the working class. Results also show that the conflict parental relationship remains a contributing factor to low social interest, and non-conflict to high social interest (Table 6-8).

Summary and Conclusion

The attempt to gain further insight into the relationship between the demographic, family and social interaction variables and sibling status through analysis with the components as dependent variables was only minimally successful. The results did reinforce those found in the analysis of SIIX. Certain demographic and family variables influence the development of aspects of social interest -- some to a greater degree than others.

'Onlies' with working mothers are likely to be 'independent' and find the environment 'cheerful', but they are also 'manipulative'. If the mother works, those 'with-siblings' are likely to be gregarious and manipulative but find the environment not too 'cheerful', if mother doesn't work those with-siblings find the environment 'accepting'.

'Onlies' with older mothers, which they generally have, are likely

TABLE 6-7

COMPARISON OF SOCIO-ECONOMIC STATUS AND THE MODIFIED INDEX
WITH SIIX

Index	New S.I. Index			Original SIIX		
	Low	High	Total	Low	High	Total
	percent n	percent n	n	percent n	percent n	n
SES						
Upper	71.4 (10)	28.6 (4)	100. (14)	71.4 (10)	28.6 (4)	100. (14)
Middle	40.6 (13)	59.4 (19)	100. (32)	40.6 (13)	59.4 (19)	100. (32)
Working	64.3 (9)	35.7 (5)	100. (14)	57.1 (8)	42.9 (6)	100. (14)
Total			100. (60)			100. (60)

Tau c = .05, n.s.

Tau c = .10, n.s.

TABLE 6--8
 PARENTAL RELATIONSHIP BY MODIFIED SOCIAL INTEREST INDEX
 CONTROLLING FOR SOCIO-ECONOMIC STATUS

New Index	UPPER CLASS		Total
	Low	High	
Parental relationship non-conflict	percent n	percent n	n
non-conflict	62.5 (5)	37.5 (3)	100. (8)
conflict	80.0 (4)	20.0 (1)	100. (5)
Column total	69.2 (9)	30.8 (4)	100. (13)
Tau c = -.17	n.s.		
MIDDLE CLASS			
Parental relationship non-conflict	percent n	percent n	n
non-conflict	29.4 (5)	70.6 (12)	100. (17)
conflict	53.8 (7)	42.2 (6)	100. (13)
Column total	40.0 (12)	60.0 (18)	100. (30)
Tau c = 1.24, p .10			
WORKING CLASS			
Parental relationship non-conflict	percent n	percent n	n
non-conflict	33.3 (2)	66.7 (4)	100. (6)
conflict	85.7 (6)	14.3 (1)	100. (7)
Column total	61.5 (8)	38.5 (5)	100. (13)
Tau c = -.52, p = .03			

to be 'gregarious'. In the 'with-sibling' group, younger mothers positively effect 'independent' and 'encouraging' behaviour. There is less chance of finding the environment 'mistreating' if one has siblings, and has a young mother.

Relationship with mother only worked on the component that produced anomalous results ('encouraging'), while relationship with father worked with regard to some of the non-social interest components. Here the 'onlies' tended to be less effected when the relationship with father and the components were controlled by sibling status.

School attitude produced some results that showed differences between the two groups. For the 'onlies', a positive attitude toward school does not necessarily result in finding aspects of the environment satisfactory. The 'onlies' find the environment less 'accepting' and more 'depressing' than do those 'with-siblings' who have a positive attitude toward school. This same trend for the 'onlies' occurs in the social attitude variable. While a positive attitude results in finding the environment more 'accepting' and more 'befriending' for those with siblings, it does not do the same for the 'onlies'.

In the school variable in both groups, a positive attitude is correlated with 'gregariousness'. The results of these interaction variables suggest that even though the 'only' is outgoing, this does not mean she/he finds the environment as receptive as those in the 'with-sibling' group.

The parental relationship variable with the components indicated that 'hostile' and 'dependent' behaviour is less likely where there is a lack of conflict, and the environment is perceived as 'cheerful', except where 'hostile' behaviour and the 'only' are concerned. Here the 'hostile' behaviour is greater where there is not conflict between the parents.

The family atmosphere variable had a greater effect than most of the other variables. 'Onlies' from a 'rejecting' atmosphere are likely to be 'benevolent', be low on 'dependence' and perceive the environment as 'befriending' and 'accepting'. Those with siblings from a rejecting family atmosphere tend to be less 'benevolent', and find the environment 'rejecting'. On the other hand, where the family is an accepting one, both groups find the outside world to be 'cheerful'. Those with siblings tend to find it 'befriending' and others to be 'friendly' as well. 'Dependent' and 'hostile' behaviour tends to be less where the individual perceived his/her family as an accepting one.

The data suggest that the family environment has a strong, but varying effect on the two groups. Socio-economic status also has shown some definite effects. For both groups, as SES goes up, 'gregarious' behaviour goes down. There is a direct relationship between finding the environment rejecting and SES. As SES goes up, so does the perception of others, and the outside world in general, as being more 'rejecting'. Regardless of sibling status, those whose father was in the working class, were more independent. 'Onlies' from the working class found the environment to be 'friendly' while those

with siblings who were in the middle class found this to be so.

The analysis of components show the importance of family atmosphere, parental relationship and socio-economic status as well as providing some insight into the differing effect with regard to sibling status. A difference was also noted between the 'onlies' and those with siblings on how a positive attitude toward school does not mean the same as a positive attitude toward others.

It was in the use of the components that the variable 'encouraging' was found to be an anomaly. The new scale, designed to take this and component polarity into consideration, did not provide results that differed dramatically from the original scale.



CHAPTER 7

CONCLUSIONS AND RECOMMENDATIONS

The hypothesis that individuals raised without siblings will develop social interest to a lesser degree than will those who are raised with siblings has not been supported.

It was concluded that the family environment, determined, in part, by socio-economic status of the parents was a major determiner of social interest, which, while it varies somewhat between the two groups being studied, overrides sibling status as a factor in the development of social interest. The values of consideration and concern for others which are consistent with a high degree of social interest may be practiced more in the middle class home than in either the upper class or working class families, although for different reasons.

While caution must be used in generalizing beyond the sample, those parents who have, or intend to have one child may find reassurance in this knowledge considering the negative image of the only child that has persisted.

The findings of lack of difference in the development of social interest in the two groups is surprising in light of research cited e.g., Stotland and Dunn (1962) found later-borns identified more with others than did first and only-borns; Falbo (1980) found only children were higher on self-centeredness; Kaplan (1978) and Schneider and

Reuterfors (1981) found only-borns have lower social interest scores than first or later-borns. This study found no difference in this regard.

Falbo (1976) found a high degree of autonomy among 'onlies'. While this present study did not measure this concept directly, it was found that those who were raised with siblings were more independent than those in the 'only' group. This is consistent with the findings of Sears (1950) and Schachter (1964) who found first-borns more dependent than later-borns*. Adams (1972) notes that a combination of dependence and task leadership (Chemers, 1970) may tend to make first-borns less popular. The fact that 'onlies' in this study, while having a positive attitude toward school, found the environment less accepting, may be in some way, related to the findings noted by Adams (1972).

Gender differences favoring a greater social interest for females (Kaplan, 1978; Greever et al., 1973; Schneider & Reuterfors, 1981) did not materialize in this study. This is consistent with the findings of Crandall (1975) who found females did not score significantly higher than males.

What has come out most strongly in the study is the importance of

*as noted previously, the combining of 'onlies' and first-borns in many of the studies makes comparison problematic.

the family environment. Where subjects perceive a non-conflictive parental relationship and an accepting family atmosphere social interest is likely to develop to a greater degree. This finding is consistent with those who suggest that the environment provided by the parents is crucial. Ackerman (1958) suggests that where the family values are such that they emphasize competition, consumption, aggressiveness, and where conflict exists, the members of the family act out their interdependent roles in this manner. Such an environment would stifle the development of social interest. As Satir (1964) notes, parents are the key to all family relationships; they are the architects of the environment.

While it is known that spacing and gender of siblings is a factor in the development of personality, it is beyond the scope of this study to consider the multiplicity of combinations that are available when a with-sibling group is studied on more than one level.

The subjects in this study have been raised in intact homes where the majority of the mothers did not work. Many children of the present generation will experience one-parent or step-parent homes as well as nursery school or day care. Each of these situations may vary in potential for the development of social interest.

The data have suggested that while sibling status is not the main determiner of the development of social interest, social interest does develop differentially in the two groups. The parents of the only child need to be aware that they are the family environment for the

only and recognition of the impact that the family has may help the parent modify the environment to enhance the development of social interest.

The findings of the study do not deviate from Adler's (1964) conceptual scheme regarding the development of social interest which suggest that it develops within the matrix of family interaction and is not simply a consequence of parent-child relationship.

While it is encouraging to discover that the 'only' is not necessarily lacking in social interest, caution must be used in extrapolation of the results. A characteristic such as social interest is multi-determined. One must not attribute too much weight to simple concepts of 'parental relationship' and 'family atmosphere'. Further investigation of the interaction patterns between and among family members could shed light on a more complex set of factors (besides non-conflict/conflict, accepting/rejecting) that enhance or inhibit the development of social interest. This broad assessment of the family environment coupled with a more refined scale to assess social interest could provide additional insight into the development of social interest.

This research shows that secondary analysis can be done within certain limitations. While it cannot take the place of the therapist, it provides an independent scoring scheme which can be particularly useful with the environmental dimensions of social interest and the family variables.

In light of the findings in this study an alternative

hypotheses could be formed such as:

- (a) where parental relationship is non-conflictive the development of social interest will be enhanced.
- (b) Where parents provide an environment in which a child feels accepted, the development of social interest will be enhanced.

Research that investigates the interdependent social environment and the interactive processes that occur within it will provide a better understanding of the effects of early experiences in the development of social interest. This, in turn, will enable parents whether singly or in pair, who have a single or a multi-child family to better prepare them for a future in a complex interdependent society.

APPENDICES

APPENDIX A
METHODOLOGICAL
APPENDIX



APPENDIX A-1

GENERAL INFORMATION

CASE NO. _____

RESPONDENT: AGE _____ SEX _____SIBLINGS AGE FROM SUBJECT _____
AND SEX _____SCHOOL: POSITIVE _____ NEGATIVE _____SOCIAL: POSITIVE _____ NEGATIVE _____SEXUAL FEELINGS: POSITIVE _____ NEGATIVE _____FATHER: AGE _____ OCCUPATION: _____

RESP. FAVORITE OF .. YES _____ NO _____

MOTHER: AGE _____ OCCUPATION _____

RESP. FAVORITE OF .. YES _____ NO _____

PARENTS' RELATIONSHIP: CONFLICT _____ NONCONFLICT _____FAMILY ATMOSPHERE: ACCEPTING _____ REJECTING _____

VALUES: TRADITIONAL _____ PROGRESSIVE _____ IDIOSYNCRATIC _____

PERSON'S RELATIONSHIP TO FATHER: DOMINATED BY _____ TO MOTHER _____
DEPENDENT ON _____
EGALITARIAN _____STRESSORS MENTIONED (INTERPERSONAL, MONEY, JOB, ILLNESS, OTHER

_____A DIAGNOSIS-DR. RECORDS AS MEASURE OF ILLNESS _____
SCHEME OF SEVERITY? _____MOVEMENT TO OTHERS: TOWARD _____ AWAY _____ AGAINST _____RELIGION MENTIONED: YES.. POSITIVE _____ NEGATIVE _____
NO _____

APPENDIX A-2

ALTMAN (1973)*

Instructions to Early Recollections Raters

The rating scale for early recollections is a bipolar scale and is divided into two sections. The first section is concerned with the behavior of the person in the recollection, i.e., is more content oriented. The second section has to do with affect or how the person sees his environment. Please place a check in the appropriate space. If the category is not in the recollection, check box 4 (average).

Further explanations of the categories are given below:

Withdrawal: shy, lonely; avoids conflict by withdrawing from people
Gregarious: sociable, congenial, approaches people

Passivity: person is passive in his behavior
Activity: person is active in his behavior

Aggression; hostility: aggression or hostility may be expressed openly or by devious methods, or by passive resistance
Benevolence; kindness: treats objects or others in benevolent manner

Mistreated: person relating early recollection is mistreated
Befriended; treated well: person giving early recollection is treated well by others

Threatening; frustrating: sees environment as physically or emotionally threatening or is denied wants by the environment
Friendly; nurturing: sees the environment as friendly or helpful

Rejection: feels rejected by others or animals
Acceptance: feels accepted by others or animals

Inferiority: feels weak, helpless
Self-confidence: feels confidence in self

Depressing: objects or people seen as distant, sad, bleak
Cheerful: objects or people seen as pleasant, happy

Dependence: relies on others for help or approval
Independence: being able to stand on one's own two feet; feeling okay without relying on others

* Baruth and Eckstein, 1978

(QUINN 1973)

EARLY RECOLLECTIONS RATING SCALE

Instructions to Raters

The Early Recollections Rating Scale (EPRS) is an instrument for rating nine different attitudes detected in memories of early childhood, each on a bi-polar scale broken into seven divisions. A check in one of the boxes 1-3 indicates a rating more in agreement with the leftmost pole (negative descriptive term), with 1 being the strongest agreement. A check in block 5-7 represents a positive rating, with 7 being the strongest. Raters should place a mark in only one box for each of the nine scales. A rating in box 4 indicates "average" or "neutral" and should be used if any category is judged not present in a given ER. (A separate rating sheet is required for each ER.) Further explanation of attitude categories follows:

- I. SUBJECT'S BEHAVIOR TOWARD ENVIRONMENT. Scales 1-4 are concerned with how the subject acted or reacted toward the environment of the ER.
 1. WITHDRAWN--Avoids conflict by withdrawing from other people and/or animals; shy, lonely.
GREGARIOUS--Moves toward people; sociable, congenial.
 2. PASSIVE--Is inactive, resigned and inert toward others; observes the action of others.
ACTIVE--Openly tries to manipulate others and things to meet own needs.
 3. COMPETITIVE--Acts against others; tries to obstruct.
COOPERATIVE--Acts in support of and in harmony with others; supportive, nurturant.
 4. DEPENDENT--Relies on others for help and approval in meeting own needs.
INDEPENDENT--Attempts to meet own needs through mastery of the environment; self-reliant.
- II. SUBJECT'S AFFECT. Scales 5-9 call for ratings of how the subject saw (affectively) the environment of his ER.
 5. HOSTILE--Feels subject to physical and/or emotional attack and injury from others.

APPENDIX A-3 CONTINUED

6. REJECTED—Feels excluded and disapproved by others.
ACCEPTED—Feels included and approved by others.
7. DISCOURGGED—Feels weak and helpless; overwhelmed by the world; ashamed.
SELF-CONFIDENT—Has faith in own capability; able; proud.
8. DEPRESSED--Sees objects or people as distant, bleak, sad.
CHEERFUL--Sees objects or people as interesting, pleasant, happy.
9. MISTREATED—Feels treated in a mean or punishing manner by others.
BEFRIENDED—Feels treated well by others.

APPENDIX A-4

ZARSKI (1978)*

EARLY RECOLLECTIONS, INVENTORY OF
SOCIAL INTEREST RATING SCALE

1.	COPING (active) 5	4	vs 3	2	AVOIDANCE (passive) 1
	definite seeking better ways of doing things, a self- starter		considerable	some little	no initiation of activities
2.	FRIENDLY 5	4	3	2	HOSTILITY 1
	definite move- ment to seek out and enjoy others				movement away from another through anger or aggression
3.	ALTRUISTIC 5	4	3	2	MANIPULATIVE 1
	definite engage- ment in helping behaviour for benefit of others				interaction with another to achieve one's own ends
4.	ACCEPTING 5	4	3	2	REJECTING 1
	definite interest and understanding of others				no interest in understanding others
5.	FLEXIBILITY 5	4	3	2	INFLEXIBILITY 1
	complete adaptability to one's environment				lacks insight into self and social relations

* Bartuth and Eckstein, 1978.

APPENDIX A-4 CONTINUED

6.	INTERDEPENDENCE	5	4	3	2	1
			considerable	vs some	little	DEPENDENCE
	definite decision-making ability and seeks to cooperate with others in meeting life tasks					exhibits no decision-making or cooperative behaviour
7.	OPTIMISTIC	5	4	3	2	1
						PESSIMISTIC
	highly confident and self-assured of one's ability					no confidence and self-assurance, fails in task
8.	COOPERATIVE	5	4	3	2	1
						COMPETITIVE
	definitely participates with another in common effort					no cooperation with another, over-concern with one's status; how am I doing
9.	CHEERFUL	5	4	3	2	1
						DEPRESSING
	enjoys life, accepts set-backs, perceives humour in situations					no enjoyment of life, uncertain and insecure, withdraws from life tasks
10.	ENCOURAGING	5	4	3	2	1
						DISCOURAGING
	accepts and has faith in individuals as they are (not their potential) and reacts optimistically to others					no acceptance of others, emphasizes evaluations of how others are doing, stresses comparisons with others

APPENDIX A-5

RATIONAL FOR MODIFICATION OF THE EXISTING SCALES

The SIIX/NSIIX was based on the scales of Altman (1973), Quinn (1973) and Zarski (1978). The activity/passivity dimensions in both the Altman and Quinn scales posed some problem. Altman defines the dimension in terms of itself, while Quinn changes the meaning of activity to a definition that comes closer to manipulative behaviour which is not a component of social interest. As there was activity implied in some of the other dimensions, the activity/passivity component was replaced by Zarski's manipulative/altruistic pair. Zarski's encouraging/discouraging dimensions, used as encouragement, in particular, is consistent with the concept of social interest. It will be noted that the definitions in the SIIX/NSIIX scale have been changed somewhat and, the independent/dependent dimensions have been considered as behavioural (see Appendix A-7). While the social interest and the non-social interest components are to be scored separately, the polar pairs are as follows:

Reflective of Individual's behaviour;

Gregarious-----	Withdrawn
Altruistic-----	Manipulative
Encouraging-----	Discouraging
Independent-----	Dependent
Benevolent-----	Hostile

Reflective of perception of others and/or environment

Befriended-----	Mistreated
Accepted-----	Rejected
Friendly-----	Hostile
Cheerful-----	Depressing

APPENDIX A-6 \

SIDX/NSIDX RATING

INSTRUCTIONS TO RATERS (Revised)

The scale is an instrument to measure social interest as reflected in early recollections. There are eighteen terms, nine positive descriptors, and nine negative descriptors.

The instrument is divided into two sections the first of which contains ten descriptors which are to be considered as reflective of the individual's behaviour in the environment.

The second section contains eight descriptors which are to be considered as reflective of the individual's perception of, or response to the environment and/or others.

While both sections are to be rated on the same scale separate explanations will be given for clarification. When rating the behavioural dimensions, consider the participant, with regard to these dimensions as:

- 1-NOT INVOLVED: ABSENT: there is no evidence of the dimension in the ER
- 2-LOW or MINIMALLY involved, and/or a sense of being there but describing from the outside or as an onlooker
- 3-MEDIUM amount of involvement, and/or showing evidence of the dimension; use of a singular reference e.g., We were playing in the snow, in the description
- 4-HIGH Or MAXIMUM involvement; use of the multiple reference e.g., I was really upset.

When considering the environmental section of the scale look for the participant's perception or and/or response to the environment which

includes others and/or things

1-ABSENCE of the dimension in the ER

2-MINIMAL or LOW feeling or sense of responding to the environment in this particular way; a sense of encountering the dimension of seeing things and or others in this way

3-MEDIUM an evidence of the dimension and/or use of the singular reference e.g., Kindergarten was fun

4-HIGH or DEFINITE perception of, or response to others with regard to the dimension; and/or use of the multiple reference e.g., They were really mean

FOR RATERS: TERMS AND DEFINITIONS OF SIIIX AND NSIIX RANDOMIZEDREFLECTIVE OF THE INDIVIDUAL'S BEHAVIOUR

GREGARIOUS: moves toward; seeks out and enjoys others

ALTRUISTIC: definitely engages in behaviour that benefits others

DEPENDENT: relies on others for help and approval; lacks confidence in own ability; is not the initiator of action

ENCOURAGING: accepts others as they are; has faith in their potential; is not judgemental

INDEPENDENT: self-reliant; evidences decision-making ability; shows confidence in own ability; initiates action

MANIPULATIVE: interacts with others to achieve own ends

HOSTILE: behaviour is aggressive toward others either in an active or a passive way

BENEVOLENT: acts kindly toward others

DISCOURAGING: stresses comparison with others; evaluates others

WITHDRAWN: moves away from others; isolates self

REFLECTIVE OF INDIVIDUAL'S PERCEPTION OF ENVIRONMENT AND/OR OTHERS

BEFRIENDED: feels treated in a kindly way

ACCEPTED: feels included; has a sense of belonging; feels approved of

REJECTED: feels excluded and disapproved of; feels not-understood

DEPRESSING: sees life as bleak; sees the worst in situations

HOSTILE: feels subjected to physical and/or emotional attack and/or injury from others

FRIENDLY: sees others as moving toward him/her; sees others and objects as interesting and pleasant

CHEERFUL: sees humour in and/or looks on the bright side of situations

MISTREATED: feels others are mean and/or punishing

APPENDIX A-8

EARLY RECOLLECTION SCORING SHEET

PATER

SUBJECT #

TOTAL NUMBER OF ER'S

ER #	ER #	ER #	ER #	ER #	ER #
Behaviour/self-attitude					
greg	1 2 3 4	greg	1 2 3 4	greg	1 2 3 4
alt	1 2 3 4	alt	1 2 3 4	alt	1 2 3 4
dep	1 2 3 4	dep	1 2 3 4	dep	1 2 3 4
encour	1 2 3 4	encour	1 2 3 4	encour	1 2 3 4
indep	1 2 3 4	indep	1 2 3 4	indep	1 2 3 4
manip	1 2 3 4	manip	1 2 3 4	manip	1 2 3 4
host	1 2 3 4	host	1 2 3 4	host	1 2 3 4
benev	1 2 3 4	benev	1 2 3 4	benev	1 2 3 4
discou	1 2 3 4	discou	1 2 3 4	discou	1 2 3 4
withdr	1 2 3 4	withdr	1 2 3 4	withdr	1 2 3 4
Individual's perception of environment and/or others					
befrie	1 2 3 4	befrie	1 2 3 4	befrie	1 2 3 4
accept	1 2 3 4	accept	1 2 3 4	accept	1 2 3 4
reject	1 2 3 4	reject	1 2 3 4	reject	1 2 3 4
depres	1 2 3 4	depres	1 2 3 4	depres	1 2 3 4
host	1 2 3 4	host	1 2 3 4	host	1 2 3 4
frien	1 2 3 4	frien	1 2 3 4	frien	1 2 3 4
cheer	1 2 3 4	cheer	1 2 3 4	cheer	1 2 3 4
mistrea	1 2 3 4	mistrea	1 2 3 4	mistrea	1 2 3 4

APPENDIX B

SUPPLEMENTAL

DATA APPENDIX

TABLE B-1
 SIIIX BY NUMBER OF ERS, AND
 CONTROLLING FOR SIBLING STATUS

SIIIX BY NUMBER OF ERS													
Number of ERS SIIIX	3		4		5		6		7		8		TOTAL
	%	n	%	n	%	n	%	n	%	n	%	n	
LOW	6.1	(2)	15.2	(5)	33.3	(11)	12.1	(4)	24.2	(8)	9.1	(3)	100. (33)
HIGH	0.0	(0)	6.7	(2)	10.0	(3)	23.3	(7)	20.0	()	40.0	(12)	100. (30)
TOTAL													100. (63)
Tau c = .45 p = .0008													
CONTROLLING FOR SIBLING STATUS: ONLY													
Number of ERS SIIIX	3		4		5		6		7		8		TOTAL
	%	n	%	n	%	n	%	n	%	n	%	n	
LOW	7.7	(1)	15.4	(2)	30.8	(4)	23.1	(3)	23.1	(3)	0.0	(0)	100. (13)
HIGH	0.0	(0)	0.0	(0)	16.7	(2)	16.7	(2)	16.7	(2)	50.0	(6)	100. (12)
TOTAL													100. (25)
Tau c = .64 p = .003													
WITH SIBLINGS													
Number of ERS SIIIX	3		4		5		6		7		8		TOTAL
	%	n	%	n	%	n	%	n	%	n	%	n	
LOW	5.0	(1)	15.0	(3)	35.0	(7)	5.0	(1)	25.0	(5)	15.0	(3)	100. (20)
HIGH	0.0	(0)	11.1	(2)	5.6	(1)	27.8	(5)	22.2	(4)	33.3	(6)	100. (18)
TOTAL													100. (38)
Tau c = .32 p = .04													

TABLE B-2

SIIX BY LENGTH OF ERS

LENGTH OF ERS	SHORT (1)		LOWER MID-RANGE (2)		UPPER MID-RANGE (3)		LONG (4)		TOTAL
	%	n	%	n	%	n	%	n	
LOW	21.2	(7)	27.3	(9)	18.2	(6)	33.3	(11)	100. (33)
HIGH	13.3	(4)	23.3	(7)	23.3	(7)	40.0	(12)	100. (30)
TOTAL									100. (63)

Tau c = .13 n.s.

SIIX BY LENGTH OF ERS CONTROLLING FOR

SIBLING STATUS: ONLY

LENGTH OF ERS	1		2		3		4		TOTAL
	%	n	%	n	%	n	%	n	
LOW	15.4	(2)	15.4	(2)	15.4	(2)	53.8	(7)	100. (13)
HIGH	8.3	(1)	41.7	(5)	25.0	(3)	25.0	(3)	100. (12)
TOTAL									100. (25)

Tau c = -.24 n.s.

WITH-SIBLINGS

LENGTH OF ERS	1		2		3		4		TOTAL
	%	n	%	n	%	n	%	n	
LOW	25.0	(5)	35.0	(7)	20.0	(4)	20.0	(4)	100. (20)
HIGH	16.7	(3)	11.1	(2)	22.2	(4)	50.0	(9)	100. (18)
TOTAL									100. (38)

Tau c = .35 p = .03

TABLE B-3

ATTITUDE TOWARD SCHOOL BY SII
ATTITUDE TOWARD SCHOOL BY SIIX BY SI

Attitude Toward School by SIIX				Only	
SIIX	Low	High	Total	Low	Hi
School Attitude					
Positive	41.7 (16)	58.3 (21)	100. (36)	46.7 (7)	53
Negative	66.7 (8)	33.3 (4)	100. (12)	62.5 (5)	37
Total			(48)		
Tau c = -.18				p = .06	
				Tau c	

TABLE B-4

SOCIAL ATTITUDE BY SIIX AND
SOCIAL ATTITUDE BY SIIX BY SIBLI

Social Attitude					
SIIX	Low	High	Total	Low	On Hi
Social Attitude					
Positive	41.0 (16)	59.0 (23)	100. (39)	43.8 (7)	56
Negative	77.8 (7)	22.2 (2)	(9)	60.0 (3)	40
Total			(48)		
Tau c = -.22				p = .02	
				Tau c	

TABLE B-3

ATTITUDE TOWARD SCHOOL BY SIBLING STATUS AND
 ATTITUDE TOWARD SCHOOL BY SIBLING STATUS

Controlling for Sibling Status						
Total	Only		Total	With-Siblings		Total
	Low	High		Low	High	
100. (36)	46.7 (7)	53.3 (8)	100. (15)	38.1 (8)	69.9 (13)	100. (2)
100. (12)	62.5 (5)	37.5 (3)	100. (8)	75.0 (3)	25.0 (1)	100. (4)
(48)			(23)			(25)
Tau c = -.14 n.s.			Tau c = .0.19 n.s.			

TABLE B-4

SOCIAL ATTITUDE BY SIBLING STATUS AND
 SOCIAL ATTITUDE BY SIBLING STATUS

Controlling for Sibling Status						
Total	Low	Only	Total	With-Siblings		Total
		High		Low	High	
100. (39)	43.8 (7)	56.3 (9)	100. (16)	39.1 (9)	60.9 (14)	100. (23)
(9)	60.0 (3)	40.0 (2)	100. (5)	100. (4)	0.0 (0)	100. (4)
(48)			(21)			(27)
Tau c = -.11 n.s.			Tau c = -.30 p = .01			

TABLE B-5

ATTITUDE TOWARD SEXUAL DEVELOPMENT BY SIIX
 ATTITUDE TOWARD SEXUAL DEVELOPMENT BY SIIX BY S

Sexual Development Attitude by SIIX				Controlling f		
SIIX	Low	High	Total	Low	Only High	Tot
Sexual Attitude						
Positive	37.5 (12)	62.5 (20)	100. (32)	38.5 (5)	61.5 (8)	100
Negative	75.9 (9)	25.0 (3)	100. (12)	66.7 (4)	33.3 (2)	100
Total			(44)			
	Tau c = -.29 p = .01			Tau c = -.24 n.s.		

TABLE B-5

ATTITUDE TOWARD SEXUAL DEVELOPMENT BY SIBLING STATUS AND
 TOWARD SEXUAL DEVELOPMENT BY SIBLING STATUS

Controlling for Sibling Status						
	Low	Only High	Total	Low	With-Siblings High	Total
32)	38.5 (5)	61.5 (8)	100. (13)	36.8 (7)	63.2 (12)	100. (19)
2)	66.7 (4)	33.3 (2)	100. (6)	83.3 (5)	16.7 (1)	100. (6)
4)			(19)			(25)
	Tau c = -.24 n.s.			Tau c = -.33 p = .02		

TABLE B-3
ATTITUDE TOWARD SCHOOL BY SIIIX AND
ATTITUDE TOWARD SCHOOL BY SIIIX BY SIBLING STATUS

SIIIX	Attitude Toward School by SIIIX			Controlling for Sibling Status						
	Low	High	Total	Only Low	Only High	Total	With-Siblings Low	With-Siblings High	Total	
School Attitude										
Positive	41.7 (16)	58.3 (21)	100. (36)	46.7 (7)	53.3 (8)	100. (15)	38.1 (8)	69.9 (13)	100. (2)	
Negative	66.7 (8)	33.3 (4)	100. (12)	62.5 (5)	37.5 (3)	100. (8)	75.0 (3)	25.0 (1)	100. (4)	
Total			100. (48)			100. (23)			100. (25)	
	Tau c = -.18 p = .06			Tau c = -.14 n.s.				Tau c = 0.19 n.s.		

TABLE B-4
SOCIAL ATTITUDE BY SIIIX AND
SOCIAL ATTITUDE BY SIIIX BY SIBLING STATUS

SIIIX	Social Attitude			Controlling for Sibling Status						
	Low	High	Total	Only Low	Only High	Total	With-Siblings Low	With-Siblings High	Total	
Social Attitude										
Positive	41.0 (16)	59.0 (23)	100. (39)	43.8 (7)	56.3 (9)	100. (16)	39.1 (9)	60.9 (14)	100. (23)	
Negative	77.8 (7)	22.2 (2)	100. (9)	60.0 (3)	40.0 (2)	100. (5)	100. (4)	0.0 (0)	100. (4)	
Total			100. (48)			100. (21)			100. (27)	
	Tau c = -.22 p = .02			Tau c = -.11 n.s.				Tau c = -.30 p = .01		

TABLE B-5

ATTITUDE TOWARD SEXUAL DEVELOPMENT BY SIBLING STATUS
ATTITUDE TOWARD SEXUAL DEVELOPMENT BY SIBLING STATUS

SIBLING STATUS	Attitude by SIBLING STATUS				Controlling for Sibling Status					
	Low	High	Total		Low	High	Total			
Sexual Attitude Positive	37.5 (12)	62.5 (20)	100. (32)		38.5 (5)	61.5 (8)	100. (13)	36.8 (7)	63.2 (12)	100. (19)
Sexual Attitude Negative	75.9 (9)	25.0 (3)	100. (12)		66.7 (4)	33.3 (2)	100. (6)	83.3 (5)	16.7 (1)	100. (6)
Total			100. (44)				100. (19)			100. (25)
	Tau c = -.29 p = .01				Tau c = -.24 n.s.				Tau c = -.33 p = .02	

TABLE B-8

STATISTICAL SUMMARY OF FAMILY INTERACTION
VARIABLES AND THE COMPONENTS
OF THE INDICES

INDEPENDENT VARIABLE	Original	Only	With-Siblings
COMPONENT OF INDICES	MEASURE OF ASSOCIATION (TAU C)	MEASURE OF ASSOCIATION	MEASURE OF ASSOCIATION
	LEVEL OF SIGNIFICANCE	LEVEL OF SIGNIFICANCE	LEVEL OF SIGNIFICANCE
<u>RELATIONSHIP WITH FATHER</u>			
Withdrawing Behavior	-.30	-.32	-.17
Environment Depressing	.21	0.0	.32
	n.s.	--	.05
	.05	--	n.s.
<u>PARENTAL RELATIONSHIP</u>			
Encouraging Behavior	.38	.44	.38
Discouraging Behavior	-.24	-.20	-.26
Dependent Behavior	.32	.43	.25
Hostile Behavior	.22	-.26	.53
Cheerful Behavior	-.25	-.01	-.43
	n.s.	n.s.	.01
	.005	--	.01
	.04	--	.10
	.02	.04	.10
	n.s.	n.s.	.009
	.05	n.s.	.01
<u>FAMILY ATMOSPHERE</u>			
Benevolent Behavior	-.24	.32	-.44
Accepting Environment	-.03	.21	-.15
Friendly Environment	-.20	-.06	-.27
Befriended in Environment:	.09	.17	.30
Cheerful "	-.27	-.16	-.42
Dependent "	.32	.43	.25
Hostile Behavior	.22	-.26	.53
Rejecting Behavior	.17	.19	.12
	n.s.	n.s.	n.s.
	.08	n.s.	.03
	n.s.	n.s.	.02
	.08	n.s.	n.s.
	n.s.	n.s.	.03
	.05	n.s.	.02
	.01	.04	.10
	n.s.	n.s.	.000
	.17	n.s.	n.s.

TABLE B-9
 STATISTICAL SUMMARY OF DEMOGRAPHIC VARIABLES
 AND COMPONENTS OF THE INDICES

INDEPENDENT VARIABLE	Original		Only		With-Siblings	
	MEASURE OF ASSOCIATION (TAU C)	SIGNIFI-CANCE	MEASURE OF ASSOCIATION	LEVEL OF SIGNIFI-CANCE	MEASURE OF ASSOCIATION	LEVEL OF SIGNIFI-CANCE
<u>MOTHER'S AGE AT BIRTH OF SUBJECT</u>						
Gregarious Behaviour	.07	n.s.	.45	.03	-.17	n.s.
Independent Behaviour	-.24	.04	-.08	n.s.	-.21	.10
Encouraging Behaviour	-.38	n.s.	-.55	--	-.29	.10
Environment Mistreating	.09	n.s.	0.0	n.s.	.45	.05
<u>WORKING STATUS OF MOTHER</u>						
Gregarious Behaviour	-.13	n.s.	0.0	n.s.	-.21	.04
Accepting Behaviour	-.15	n.s.	0.0	n.s.	-.26	.03
Cheerful Behaviour	-.12	n.s.	.31	.05	.08	n.s.
Manipulative Behaviour	-.44	.02	-.64	--	-.33	--
<u>SOCIO-ECONOMIC STATUS</u>						
Gregarious Behaviour	.33	.01	.51	.007	.21	n.s.
Withdrawing Behaviour	-.16	n.s.	.44	--	-.35	.04
Independent Behaviour	.22	.04	.21	n.s.	.19	.10
Dependent Behaviour	-.06	n.s.	.20	.05	-.40	.03
Environment Befriending	.11	n.s.	.33	.03	-.01	n.s.
Environment Rejecting	-.25	.04	.12	n.s.	-.28	n.s.

TABLE B-10

PEARSON CORRELATION COEFFICIENT AND SIGNIFICANCE LEVEL OF BEHAVIORAL
COMPONENTS OF SIX AND NSIX

	WITHDRAWING	HOSTILE	MANIPULATIVE	DEPENDENT	DISCOURAGING
GREGARIOUS	-0.1545 63 p = 0.113	-0.0502 63 p = 0.348	0.0437 63 p = 0.367	-0.0348 63 p = 0.393	0.1500 63 p = 0.120
BENEVOLENT	0.0295 63 p = 0.409	-0.2202 63 p = 0.041	-0.1983 63 p = 0.060	-0.1912 63 p = .067	-0.0043 63 p = 0.487
ALTRUISTIC	-0.0762 63 p = 0.276	0.1488 63 p = 0.122	-0.162 63 p = 0.450	0.1030 63 p = 0.211	0.3214 63 p = 0.005
INDEPENDENT	-0.2818 63 p = 0.013	0.0955 63 p = 0.228	-0.1120 63 p = 0.191	-0.5007 63 p = 0.000	-0.0084 63 p = 0.474
ENCOURAGING	-0.1661 63 p = 0.097	-0.3082 63 p = 0.007	-0.0275 63 p = 0.415	-0.1008 63 p = 0.216	-0.1381 63 p = 0.140

TABLE B-11
 PEARSON CORRELATION COEFFICIENT AND SIGNIFICANCE LEVEL OF ENVIRONMENTAL
 COMPONENTS OF SLIX AND NSIIX

	HOSTILE	REJECTING	MISTREATING	DEPRESSING
FRIENDLY	-0.2130 63	-0.2421 63	-0.1370 63	-0.2088 63
	p = 0.047	p = 0.028	p = 0.142	p = 0.050
ACCEPTING	-0.4392 63	-0.2883 63	-0.3389 63	-0.2440 63
	p = 0.000	p = 0.011	p = 0.003	p = 0.027
BENEFRIENDED	-0.1635 63	-0.2665 63	-0.4146 63	-0.1537 63
	p = 0.100	p = 0.017	p = 0.000	p = 0.115
CHEERFUL	-0.3773 63	-0.3619 63	-0.3006 63	-0.4560 63
	p = 0.001	p = 0.002	p = 0.008	p = 0.000

REFERENCES

- Ackerman, N. W. Psychodynamics of Family Life. New York: Basic Books, 1958.
- Adams, B. N. Birth order: A critical review. Sociometry, 1972, Vol. 35, 3, 411-439.
- Adler, A. What Life Should Mean To You. (Edited by Alan Porter). London: George Allen & Unwin, Ltd., 1932.
- Adler, A. The Individual Psychology of Alfred Adler. Ansbacher, Heinz, L., & Ansbacher, Rowena, R., (Eds.). New York: Harper & Row, 1964 (a).
- Adler, A. Social Interest: A Challenge to Mankind. New York: Capricorn Books, 1964 (b).
- Adler, A. Superiority and Social Interest: A Collection of Later Writings. H. L. Ansbacher & R. R. Ansbacher (Eds.). New York: Viking Press, 1973.
- Allport, G. W. Patterns of Growth in Personality. New York: Holt Rinehart & Winston, 1961.
- Altman, K. The relationship between social interest dimensions of early recollections and selected counselor variables. Unpublished doctoral dissertation, University of South Carolina, 1973.
- Ansbacher, H. L. ~~Anomie~~, the sociologist's conception of lack of social interest. Journal of Individual Psychology, 1959, 15, 2, 212-214.

- Ansbacher, H. L. The Concept of Social Interest. Journal of Individual Psychology, 1968, 24, 131-149.
- Ansbacher, H. L., & Ansbacher, R. R. (Eds.), The Individual Psychology of Alfred Adler. New York: Harper & Row, 1964. (First Edition, 1956, Basic Books Inc.)
- Baruth, L. G., & Eckstein, D. G. Life Style: Theory, Practice and Research. Dubuque, Iowa: Kendall/Hunt Publishing Co., 1978.
- Berne, E. Transactional Analysis in Psychotherapy. New York: Grove Press, 1961.
- Blake, J. "Can we believe the data on birth expectations in the United States?" Demography, 1974, 11 (1), 25-44.
- Bloom, B. S. Stability and Change in Human Characteristics. New York: John Wiley & Sons, Inc., 1964.
- Brim, O. G., Jr. Personality development as role-learning. I. Iscoe, & H. W. Stevenson (Eds.), Personality Development in Children. Austin: University of Texas Press, 1960, 127-159.
- Brim, O. G., Jr. Socialization through the life cycle. O. G. Brim, Jr., & S. Wheeler, Socialization After Childhood. New York: Wiley, 1966.
- Brim, O. G., Jr. Family structures and sex-role learning by children. Norman W. Bell & Ezra F. Vogel (Eds.), The Family. New York: Free Press, 1968.
- Brim, O. G., Jr., & Kagan, J. (Eds.), Constancy and Change in Human Development. Cambridge, Mass.: Harvard University Press, 1980.

Brodsky, P. The diagnostic importance of early recollections.

American Journal of Psychotherapy, 1952, 6, 484-493.

Brownfain, J. J. Stability of the self-concept as a dimension of personality. Journal of Abnormal Social Psychology, 1952, 47, 597-606.

Bubbenzer, D. L., Zarski, J. J., & Walter, D. A. Measuring Social Interest: A Validation Study. Journal of Individual Psychology, 1979, 35, 202-213.

Cheimers, M. M. The relationship between birth order and leadership styles. Journal of Social Psychology, 1970, 80, 233-235.

Coleman, J. C. Personality Dynamics and Effective Behavior. Chicago: Scott, Foresman, 1960.

coleman, J. C. Abnormal Psychology and Modern Life, 3rd Ed., Chicago: Scott Foresman, 1964.

Conners, C. K. Birth Order and Need for Affiliation. Journal of Personality, 1963, 31 (3), 409-416.

Cooley, C. H. Human Nature and Social Order. New York: Charles Scribner's Sons, 1902.

Coopersmith, S. The Antecedents of Self-Esteem. San Francisco: W. H. Freeman & Company, 1967.

Costa, P. T., Jr., & McCrae, R. R. Still stable after all these years: personality as a key to some issues in adulthood and old age.

Life-Span Development and Behavior, Vol. 3, Academic Press Inc., 1980, 65-102.

- Crandall, J. E. A scale for social interest. Journal of Individual Psychology, 1975, 31 (1), 187-195.
- Crandall, J. E. Adler's Concept of Social Interest: Theory Measurement, and Implications for Adjustment. Journal of Personality and Social Psychology, 1980, 39 (3), 481-495.
- Crandall, J. E., & Harris, M. D. Social Interest, Cooperation and Altruism. Journal of Individual Psychology, 1976, 32, 50-54.
- Denzin, N. Childhood Socialization. San Francisco: Jossey-Bass, Inc., 1977.
- Deutsch, M. Field theory in social psychology. In G. Lindzey and E. Aronson (Eds.) Handbook of Social Psychology, Vol. 1. Cambridge Addison-Wesley, 1968, 412-487.
- Dreikurs, R. Fundamentals of Adlerian Psychology. Chicago: Alfred Adler Institute, 1950.
- Dreikurs, R. Individual psychology: The Adlerian point of view. J. M. Wepman & R. W. Heine (Eds.), Concepts of Personality. Chicago: Aldine, 1963.
- Duncan, O. D. In Albert J. Reiss Jr., Occupations and Social Status. New York: Free Press, 1961.
- Edwards, A. L. Retention of affective experiences: A criticism and restatement of the problem. Psychological Review, 1942, 49, 43-53.
- Eisenman, R., & Taylor, R. E. Birth order and MMPI patterns. Journal of Individual Psychology, 1966, 22, 208-211.

- Erikson, E. H. Childhood and Society. (Second Edition). New York: W. W. Norton, 1963.
- Falbo, T. Does the Only Child Grow Up Miserable? Psychology Today, 1976, 9, 61-65.
- Falbo, T. The only child: a review. Journal of Individual Psychology, 1977, 33 (1), 47-61.
- Falbo, T. Only children and interpersonal behavior: An experimental survey study. Journal of Applied Social Psychology, 1978, 8 (3), 244-253.
- Falbo, T. Only children, achievement, and interpersonal orientation. Paper presented at the 88th Annual Meeting of the American Psychological Association, Montreal, 1980.
- Ferguson, E. D. The use of early recollections for assessing life style and diagnosing psychopathology. Journal of Projective Techniques and Personality Assessment, 1964, 28, 403-412.
- Forer, L., & Still, H. The Birth Order Factor. New York: Pocket Books, New York, 1977.
- Freud, S. Psychoanalysis. Joan Riviere (Trans. and Ed) New York: Pocket Books, Simon and Schuster, Inc., 1953.
- Fromm, E. The Anatomy of Human Destructiveness. New York: Holt, Rinehart & Winston, Inc., 1973.
- Gagnon, J. H. Human Sexuality. Glenview, Illinois: Scott, Foresman and Company, 1977.
- Galton, Sir F. English Men of Science: Their Nature and Nurture. London: Macmillan, 1874.

- Goffman, E. Presentation of Self in Everyday Life. Garden City, New York: Doubleday & Company, Inc., 1959.
- Gould, R. L. Transformations. New York: Simon and Schuster, 1978.
- Greenberg, M. S. Role-playing: An alternative to deception? Journal of Personality and Social Psychology, 1967, 7, 152-157.
- Greever, K. B., Tseng, M. S., & Friedland, B. H. Development of the Social Interest Index. Journal of Consulting and Clinical Psychology, 1973, 41, 454-458.
- Hall, G. S. Aspects of Child Life and Education. Boston: Ginn, 1927.
- Hall, C. S., & Lindzey, G. Theories of Personality (2nd Edition). New York: John Wiley & Sons, Inc., 1970.
- Hamilton, R. F. The behavior and values of skilled workers. A. B. Shostak and W. Gomberg (Eds.) Blue-collar World. Englewood Cliffs, New Jersey: Prentice-Hall, 1964, 42-57.
- Hardy, R. C. A developmental study between birth order and leadership styles for two different groups. Journal of Social Psychology, 1972, 87, 147-148.
- Harwood, B. T. Express preferences for information-seeking behavior and their relationship to birth order. Journal of Genetic Psychology, 1973, 123, 123-131.
- Havighurst, R. J. Human Development and Education. New York: Longmans, Green, 1953.
- Havighurst, R. J. The nature and values of meaningful free-time activity. In R. W. Kleemeier (Ed.) Aging and Leisure. New York: Oxford University Press, 1961, 309-344.

- Havighurst, R. J., & Feigenbaum, K. Leisure and life style. American Journal of Sociology, 1959, 64, 396-404.
- Hawke, S., & Knox, D. The One-Child Family: A New Life-Style. The Family Co-ordination. July, 1978, 215-219.
- Hogan, R. A., Kirchner, J. H., Hogan, K. A., & Fox, A. N. The Only Child Factor in Homosexual Development. Social Psychology: A Quarterly Journal on Human Behavior, 1980, Spring Vol. 17 (1), 19-33.
- Hoppe, R. A., Simmel, E. C., & Milton, G. A. (Eds.). Early Experiences and the Process of Socialization. New York: Academic Press, 1970.
- Horney, K. Neurotic Personality of Our Times. New York: Norton, 1937.
- Hornstein, H. A. Cruelty and Kindness: A New Look at Aggression and Altruism. Englewood Cliffs, N. J.: Prentice-Hall, 1976.
- Howe, M. G., & Madgett, M. E. Mental Health Problems Associated with the Only Child. Canadian Psychiatric Association Journal, 1975, 20 (3), 189-194.
- Hoyt, M. D., & Raven, B. H. Birth order and the 1971 Los Angeles earthquake. Journal of Personality and Social Psychology, 1973, 28 (1), 123-128.
- James, W. Psychology. New York: Henry Holt & Company, 1904.
- Janeway, E. Between myth and morning: Women-awakening. New York: William Morrow & Company, 1974.
- Kaplan, H. B. Self-derogation and childhood family structure. Journal of Nervous and Mental Disorders, 1970, 151, 13-23.

- Kaplan, H. B. Sex differences in Social interest. Journal of Individual Psychology, 1978, 34, 206-209.
- Kappelman, M. Raising the Only Child. New York: E. P. Dutton & Co., Inc., 1975.
- Kazan, S. Adler's Gemeinschaftsgefuehl and Meyeroff's Caring. Journal of Individual Psychology, 34, 1978, 3-10.
- Kohlberg, L. Stage sequence: The cognitive approach to socialization. In D. A. Goslin (Ed.) Handbook of Socialization Theory and Research. Chicago: Rand McNally, 1969.
- Kopp, R. R. Lecture delivered for the course "Life Style Assessment". Alfred Adler Institute of Chicago at Amherst, Mass., June, 1980.
- Lasch, C. The Culture of Narcissism. New York: Warren Books, W. W. Norton & Company, Inc., 1979.
- Lecky, P. Self-Consistency. New York: Doubleday, 1968.
- Levinson, D. L. The Seasons of a Man's Life. New York: Alfred A. Knopf, 1978.
- Lindzey, G., & Aronson, E. (Eds.) The Handbook of Social Psychology, 2nd Edition, Volume 3, Reading Mass.: Addison-Wesley Publishing Company, 1969.
- Long Laws, J., & Schwartz, P. Sexual Scripts. Hillsdale, Ill.: The Dryden Press, 1977.
- Mayeroff, M. On Caring. New York: Harper & Row Publishers, 1971.
- Mead, G. H. Mind, Self, and Society. Chicago: University of Chicago Press, 1936.

- Mead, G. H. The Psychology of George Herbert Mead, by A. Straus.
Chicago: University of Chicago Press, 1956.
- Merton, R. K. Social Theory and Social Structure. (Rev. Ed.), Glencoe,
Ill.: Free Press, 1957.
- Mischel, T. Human Action: Conceptual and Empirical Issues. New
York: Academic Press, 1969.
- Mosak, B., & Mosak, H. H. A Bibliography for Adlerian Psychology.
Washington: Hemisphere Publishing Corp., New York: (distributed
by) Halstead Press, 1975.
- Mosak, H. H. Early recollections as a projective technique. Journal of
Projective Techniques, 1958, 22 (3), 302-311.
- Mosak, H. Life style assessment: A demonstration focused on family
constellation. Harold Mosak, On Purpose. Alfred Adler
Institute of Chicago, 1977, 198-215.
- Mosak, H. H. Lecture delivered for the course "Introduction to
Adlerian Theory" Alfred Adler Institute of Ontario, Toronto,
Ontario, October, 1981.
- Mosak, H. H., & Shulman, B. H. The Life Style Inventory. Chicago:
Alfred Adler Institute, 1971.
- Moss, H. A., & Susman, E. J. Longitudinal Study of Personality
Development. Orville G. Brim, Jr., & Jerome Kagan (Eds.), Constancy
and Change. Cambridge, Mass.: Harvard University, 1980.
- Murray, H. A. Explorations in Personality. New York: Oxford, 1938.
- Murray, H. A. Toward a classification of interactions. In Talcott
Parsons & Edward A. Shils (Eds.), Toward a General Theory of
Action. Cambridge, Mass.: Harvard University Press, 1952, 434-464.

Nie, N., Hull, H. C., Jenkins, J. G., Steinbrenner, K., & Bent, D. H.

SPSS Statistical Package for the Social Sciences. New York:

McGraw-Hill, Inc., 1975.

Olson, H. A. Techniques of Interpretation. Early Recollections,

Harry A. Olson (Ed.). Springfield, Illinois: Charles C. Thomas

Publisher, 1979, 69-82.

Parsons, T. The Structure of Social Action. New York: McGraw Hill,

1937.

Parsons, T. Family structure and the socialization of the child.

In Talcott Parsons and Robert F. Bales Family, Socialization and

Interaction Process. Glenco: The Free Press of Glenco, 1955,

35-131.

Parsons, T., & Bales, R. F. Family, Socialization and Interaction

Process. Glenco: The Free Press of Glenco, 1955.

Parsons, T., & Shils, E. A. (Eds.) Toward A General Theory of Action.

Cambridge, Mass.: Harvard University Press, 1951.

Piaget, J. The Psychology of Intelligence. New York: Harcourt

Brace, 1950.

Quinn, J. Predicting Recidivism and Type of Crime From the Early

Recollections of Prison Inmates. Unpublished Doctoral Dissertation,

University of South Carolina, 1973.

Rainwater, L. Some Aspects of Lower Class Sexual Behavior. Journal of

Social Issues, 1966, 22, 96-108.

Reimanis, G. Relationship of childhood experience memories to anomie

later in life. Journal of Genetic Psychology, 1965, 106, 245-252.

- Reimanis, G. Childhood experience, memories and anomie in adults and college students. Journal of Individual Psychology, 1966, 22, 56-64.
- Reimanis, G. Anomie, crime, childhood memories, and development of social interest. Journal of Individual Psychology, 1974, 30, 53-58.
- Riesman, D. The Lonely Crowd. New York: Doubleday Anchor Books, 1953.
- Reiss, I. L. Social Class and Premarital Sexual Permissiveness: An Examination. American Sociological Review, 1965, 30, 747-756.
- Rosenberg, M. Society and the adolescent self-image. New Jersey: Princeton University Press, 1965.
- Rosenfield, H. Relationships of ordinal position to affiliation and achievement motives: directions and generality. Journal of Personality, 1966, 34 (4), 467-479.
- Rubin, Z. Children's Friendships. Harvard University Press, 1980.
- Rule, W. R. The relationship between early recollections and selected counselor and life style characteristics. Unpublished Doctoral Dissertation, University of South Carolina, 1972.
- Sarbin, T. R., & Allen, V. Role Theory in The Handbook of Social Psychology (2nd Ed.), (Vol. 1), Reading, Mass.: Addison-Wesley, 1968.
- Satir, V. M. Conjoint Family Therapy: A Guide to Theory and Technique. Palo Alto, California: Science and Behavior Books, 1964.
- Schachter, S. The Psychology of Affiliation. California: Stanford University Press, 1959.

- Schachter, S. Birth order and sociometric choice. Journal of Abnormal and Social Psychology, 1964, 68, 453-456.
- Schneider, L. J., & Reuterfors, D. L. The impact of birth and sex on social interest. Journal of Individual Psychology, 37 (1), 1981.
- Schneidman, E. S. Orientation toward death: a vital aspect of the study of lives. R. W. White (Ed.), The study of lives: Essays on Personality in Honor of Henry A. Murray. New York: Atherton, 1963, 220-227.
- Sears, R. R. Ordinal position in the family as a psychological variable. American Sociological Review, 1950, 15, 397-401.
- Sheehy, G. Passages: Predictable Crises in Adult Life. New York: Dutton, 1976.
- Shulman, B. H. Family constellation in personality diagnosis. Journal of Individual Psychology, 1962, 18, 35-47.
- Slater, P. Footholds. New York: E. P. Dutton & Co., Inc., 1977.
- Solomon, E. S., Clare, J. E., & Westoff, C. F. Social and psychological factors affecting fertility. The Millbank Memorial Fund Quarterly, 1956, 34 (2), 160-177.
- Steiner, C. M. Scripts People Live. New York: Bantam Book, Grove Press, Inc., 1974.
- Stern, A. Me: The Narcissistic American. New York: Ballantine Books, 1979.
- Stotland, E., & Dunn, R. E. Empathy, self-esteem, and birth order. Journal of Abnormal and Social Psychology, 1963, 66, 532-540.

- Stotland, E., Sherman, S. E., & Shaver, K. G. Empathy and birth order: Some experimental explorations. Lincoln, Nebraska: University of Nebraska, 1971.
- Stotland, E., & Walsh, J. A. Birth order and an experimental study of empathy. Journal of Abnormal and Social Psychology, 1963, 66, 610-614.
- Sullivan, H. S. The Interpersonal Theory of Psychiatry. New York: Norton, 1953.
- Taylor, J. A. Early recollections as a projective technique: A review of some recent validation studies. Journal of Individual Psychology, 1975, 31, 1, 213-218.
- Terhune, K. W. A review of the actual and expected consequences of family size. Washington, D. C.: U.S. Government Printing Office, 1975.
- Thompson, V. D. Family Size: Implicit policies and assumed psychological outcomes. Journal of Social Issues, 1974, 30 (4) 93-124.
- Toman, W. Family constellation: Its effect on personality and social behavior. New York: Springer, 1976.
- Toman, W., & Toman, E. Sibling position of a sample of distinguished persons. Perception and Motor Skills, 1970, 31 (3), 825-826.
- Waite, L. J., & Stolzenberg, R. M. Intended childbearing and labor force participation of young women: Insights from nonrecursive models. American Sociological Review, April 1976, 41, 235-52.

- Waldfoegel, S. The frequency of affective character of childhood memories. Psychological Monograph, 62 (Whole number 291), 1948.
- Webb, J. Bringing up baby - later. Macleans, May 4, 1981, 45-47, 49-50, 52.
- Whitehurst, R. N., & Veevers, J. E. Life-style: Variance in social and sexual space. Edgar W. Butler and Robert L. McGinley (Eds.), The Other Americans. Buena Park, California: Lifestyles Press, 1979.
- Williams, R. H. A concept of style of life induced from a study of aging. Journal of Individual Psychology, 1966, 22, 100-103.
- Williams, R. H., & Wirths, C. G. Lives through the years: Styles of life and successful aging. New York: Atherton Press, 1965.
- Zajonc, R. B., & Marcus, G. B. Birth Order and Intellectual Development. Psychological Review, 1975, 82 (1), 74-88.
- Zarski, J. The early recollections rating scale: Development and applicability in research. Leroy Baruth and Daniel Eckstein (Eds.), Life Style: Theory Practice and Research. Dubuque, Iowa: Kendal/Hunt Publishing Co., 1978.
- Zigler, E., & Child, I. L. Socialization. Handbook of Social Psychology (2nd Edition) (Vol. 3), Reading, Mass.: Addison Wesley, 1968, 450-589.
- Zimbardo, P. Age of Indifference. Psychology Today. August, 1980, Volume 14, 71-72.
- Zimbardo, P., & Formica, R. Emotional comparison and self-esteem as determinants of affiliation. Journal of Personality, 1963, 31, 141-162.

VITAE

Joan Winnifred (Bothwell) Edwards born in Hamilton Ontario attended elementary and secondary school in Chatham, Ontario, graduating from the Ursuline College in 1949. Graduating in Fashion Design from Ryerson Polytechnical Institute as a gold medalist, she worked in the retail trade before marrying Ross Edwards and moving to Windsor in 1952. While they raised two daughters and a son, she worked as a teacher and supervisor in Continuing Education for the Windsor Board of Education. She enrolled as a part-time student at the University of Windsor in 1975. As an undergraduate she was on the President's Roll of Scholars for three years. Graduating with a B.A. in Sociology in 1979, she was awarded a University of Windsor Scholarship for two years. As a graduate student, in the capacity of Teaching Assistant, she instructed in Statistics and Introductory Sociology and completed her requirements for her M.A. in 1982. In 1983 she was employed as a sessional instructor of Introductory Sociology and Sociological Analysis at the University of Windsor.