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Downward mobility aspirations among adolescents

Kittivibul, Tippawan, Ph.D.
The Ohio State University, 1987
Downward Mobility Aspirations among Adolescents

DISSERTATION

Presented in Partial Fulfillment of the Requirements for
the Degree Doctor of Philosophy in the Graduate
School of The Ohio State University

By
Tippawan Kittivibul, B.A.(Hons.), M.Ed.

* * * * *

The Ohio State University
1987

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CHAPTER I
INTRODUCTION

STATEMENT OF THE PROBLEM

Adolescence is the transitional period from childhood to adulthood. During this period, young people begin to seriously consider and prepare for adult life. Many seek information about career options; they examine the basic requirements for certain careers and contemplate whether they may one day meet those qualifications. In the American post-industrial society, most prestigious and well paid occupations require high levels of formal education and training. Today adolescents from lower middle and working class backgrounds who enter an occupation immediately after high school graduation have difficulty finding a job that will allow them to achieve upward mobility. Young people who do not graduate from high school face even worse prospects including the possibilities of unemployment and downward mobility (Loewenstein, 1985).

A long history of research on social stratification and status attainment has shown the importance of education for
achieved social status. From an intergenerational perspective, parental social status has an important influence on individuals' social status, including educational attainment. In particular, the father's educational level positively relates to his child's educational aspirations (Sewell and Shah, 1968; Garrison, 1982) and attainments (Blau and Duncan, 1967; Looker and Pineo, 1983). It is suggested that highly educated parents, especially highly educated fathers who usually occupy higher-income positions in the job market and are able to financially support their children's education, place a considerable value on education; this value, in turn, is transmitted to their children. Regardless of socioeconomic background, children generally aspire to and achieve an educational level that is not lower than the achieved level of their parents (Blake, 1985). The educational goals of adolescents with highly educated parents, thus, are higher than those of adolescents whose parents have low levels of education, a difference that is due largely to emphasis, values and direct support. This process takes place through familial socialization.

The major purpose of this study is to utilize a social psychological perspective to shed light on the factors that are associated with the somewhat unusual pattern whereby some adolescents' educational aspiration levels are lower
than their fathers' educational attainment levels. This educational discrepancy between adolescents and their fathers is referred to as "downward educational aspirations" here. Adolescents whose educational aspirations are "downward" relative to their fathers' educational achievement are perceived as possible candidates for downward mobility.

Adolescents with downward educational aspirations may or may not finally move down from their parental social status. Nevertheless, downward educational aspirations are an interesting phenomenon that should be empirically investigated. Since education in the United States is more available and more necessary now than in the past, it is important to know what makes some adolescents want to reach lower than their fathers' levels of educational attainment. Society, school and family emphasize the value of education and offer greater opportunities for young people to pursue higher education than was the case for previous generations. The existence of so many schools and post-secondary-educational institutions in this society facilitates opportunities to achieve high levels of education in almost any area of interest. It is assumed that adolescents have learned about the importance and necessity of education for their future life from family, school and other public media. Adolescents with downward educational
aspirations, though, do not seem to personally value the greater educational opportunities and resist the normative system that stresses competitiveness, materialistic achievement and upward-striving.

There is a second reason that downward educational aspirations are an interesting phenomenon that should be empirically investigated. On the average, educational attainment levels have risen over the generations (O'Neill and Sepielli, 1985), and so the average educational attainment level of offspring is higher than that of their parents (Garrison, 1982; Blake, 1985). Over time, particular jobs have required higher levels of education (Collins, 1979), and the effect of educational attainment on the level of earnings has grown stronger (Wanner and Lewis, 1982). These trends in educational attainment mean that young people must achieve higher levels of education than their parents in order to maintain or enhance their original social status.

A final reason that can be given for an empirical investigation of adolescents' downward educational aspirations is related to the high increase in youth unemployment, a matter that has become a national problem. Since 1975 the adolescent unemployment rate has ranged from 16 to 20 percent, the highest levels of youth unemployment since the
Great Depression in the United States in the 1930s (Andrisani and Daymont, 1982). Unemployed youth generally have low levels of education— not more than high school. It seems likely that adolescents with downward educational aspirations add to the number of unemployed youth. Because today's job market for young people with low levels of education is very limited, downwardly aspiring adolescents can be expected to face difficulties in getting jobs just as do other poor youth who lack the opportunity to pursue higher levels of education. Understanding adolescents' downward educational aspirations may provide some insight into ways to prevent young people from taking a downward path.

In sum, adolescents' downward educational aspirations are a phenomenon worthy of investigation. As yet, there has been no study that directly and thoroughly deals with this issue. Studies on social stratification, from the early mobility table presentations to the more recent structural equation models for status attainment, have not focused on how it is that some adolescents take a downward path in education compared to their fathers' attainment. A social psychological approach will contribute knowledge about the early signs of this type of downward mobility, one that is viewed as deviant in our society.
This social psychological research investigates the influence of three types of social factors on adolescents' downward educational aspirations (downward mobility aspirations or downward mobility tendency): the individual's group structure, the individual's social interactions, and the individual's attitudes or preferences. These factors can be divided into three different levels of influence: (1) social structure (family background factors) (2) interpersonal relation processes, and (3) personality. Social structure refers to the larger social context in which the individual lives. Interpersonal relations, in this study, refer to social interactions with significant others. Personality is defined as socially developed and evaluated self–other attitudes that the adolescent holds. Existing literature has identified these three levels of influence as relevant to aspiration formation, status attainment, and social mobility. Consideration of all three levels in a single study will allow for the development of a more comprehensive explanation of adolescents' downward educational aspirations.

The variables of concern at each of the three levels of influence are:

I Social Structure (Family Background Factors)
   A. Social Origins (Socioeconomic Characteristics)
      1. Parents' education
      2. Parents' occupation
3. Family income

B. Internal Family Structure
   1. Family size
   2. Family intactness

II Interpersonal Relation Processes
   A. Most Significant Other for Important Life Decisions
      1. Most significant other identification (Parent or non-parent)
      2. Most significant other's support for non-college decision

   B. Best Friend's Reinforcement
      1. Best friend's educational aspirations

III Personality (Self-Other Attitudes)
   A. Self Attitudes
      1. Internal locus of control
      2. Occupational aspirations (Career preferences)
      3. Timing of marriage (Delayed marriage preferences)

   B. Other Attitudes
      1. Employment of wives (Non-traditional sex roles)
      2. School experiences

These variables provide the basis for the formulation of the major research questions that are investigated in this study:

1. Are there social structural (family background) factors that contribute to downward educational aspirations among adolescents?
2. Do significant others influence downward educational aspirations among adolescents?

3. Are there personality factors (self-other attitudes) that are compatible with downward educational aspirations among adolescents?

**BASIC ASSUMPTIONS OF THE STUDY**

Two basic assumptions underlie this study. First, upward striving is a value in American society (Douvan and Adelson, 1958; Turner, 1964). It seems reasonable, therefore, to assume that downward educational aspirations are non-normative educational choices, especially when adolescents desire no more than a high-school education when their fathers have achieved higher than the high-school level.

Second, it is reasonable to assume that downward educational aspirations are an early sign of voluntary downward mobility. Aspiration is desire and preference, and aspiration level is the highest level that a person wants for himself or herself. The level of education has a strong effect on the level of achieved social status, especially earnings over time (Wanner and Lewis, 1982). Therefore, adolescents with downward educational aspirations have a higher chance of being downwardly mobile in the future, and
this is by preference. Preferences, of course, are influenced always by factors external to the individual and so do not indicate an absolutely free will.

It is important to note that upward educational aspirations do not necessarily reflect the possibility of upward mobility. At present, achieving higher education relative to fathers' educational attainments is relatively common and does not guarantee that individuals will achieve a higher social status than their fathers simply because educational levels for people in general have increased over time (O'Neill and Sepielli, 1985). All types of occupations have required increasingly higher levels of education over the generations (Collins, 1979; Wanner and Lewis, 1982). In short, upward mobility is currently harder than in the past because of changing demands of the job market and changing demographic trends (Loewenstein, 1985). Completing a college education may only help to prevent downward mobility, especially when the father has achieved a high social status (Blau and Duncan, 1967).

CONCEPTUAL FRAMEWORK

The conceptual framework for this study is guided by the Wisconsin social psychological theory of status attainment (Sewell et al., 1969; Sewell et al., 1970; Haller, 1982)
and other literature in the areas of aspirations and social mobility. As described by Haller (1982:6), the Wisconsin theory of status attainment combines concepts of social structure, of cognition, and of behavior. It sees the individual as active and future-oriented, with cognitions and behaviors that are tightly interwoven with those of others and geared into the social structures that human behavior creates and sustains.

Educational and occupational attainments are treated as status attainment behavior. Status (educational and occupational) aspirations are the important antecedents for status attainment. Three types of variables are antecedent to aspirations: social structural, cognitive (psychological), and interaction (social psychological). Educational aspirations, for example, are determined by social structure (an initial stratification position or socioeconomic status), cognitive factors (adolescents' mental ability and academic performance), and a social psychological or interpersonal relations factor (the influence of significant others—e.g., parents' and teachers' expectations regarding the individual's educational goals and peers' plans for a college education). According to the theory, significant others' influence directly affects aspirations. Academic performance precedes significant others' influence while mental ability has a direct effect on academic performance. Parents' socioeconomic status has a direct effect on both academic performance and significant others' influence. (The theory is presented graphically in Figure 1.)
The present study investigates downward educational aspirations using a social psychological framework (Figure 2). The conceptual framework of this study is an integration of status aspirations, status attainment, and social mobility literature. It is an extension of the Wisconsin social psychological theory of status attainment. Since this study is concerned with status mobility tendency rather than status aspirations, adolescents' aspirations are compared with parents' achievement instead of peers' aspirations as is usually done in studies of status aspirations and attainment. A few additional concepts appearing in other important studies on aspirations and social mobility are also included. The major objective of this study is to examine the downward mobility tendency, as reflected by adolescents' downward educational aspirations, and the
extent of downward at three different levels: social structure, interpersonal relations, and personality. The social structural level involves the influence of family background such as social origins (socioeconomic characteristics) and internal family structure (family size and family intactness). The interpersonal relations level is concerned with the influence of significant others'. The personality level takes account of the individuals' beliefs and attitudes about self and society.

![Diagram](image)

**Figure 2:** A Social Psychological Perspective of Downward Educational Aspirations

More specifically, downward educational aspirations, the tendency toward downward mobility, are thought to be directly associated with certain family background factors (such as having a low-educated mother, a low occupational prestige father, a low occupational prestige mother, low
family income, large family size and non-intact family unit). Some types of interpersonal relation processes may inhibit adolescents from aspiring to higher levels of education. For example, choosing someone other than a parent as the most significant other in life decisions may indicate that the adolescent does not have a close relationship with his/her parents. Being influenced by a non-parent with respect to important life decisions seems to be unusual for the adolescent. That most significant other may also support a lower educational goal for the adolescent relative to the achievement of the adolescent's father than a parent would. Furthermore, the best friend is an influential person for the adolescent's behavior and may have a low educational aspiration level. Best friends are likely to be persons who share common viewpoints, including perhaps the same level of educational aspirations. Moreover, adolescents with downward educational aspirations are thought to differ in personality, i.e., self-other attitudes, from other adolescents in that they are more likely to have a lower level of internal control and low occupational prestige aspirations, to hold negative attitudes toward their school experience, to disapprove of wives' employment (change in traditional sex roles), and to prefer to marry at a younger age (not delay gratification regarding timing of marriage).
Since the conceptual framework for this study is described as an extension of the Wisconsin theory of status attainment, it is useful to identify its major differences. They are mainly in the spheres of conceptualization, measurement refinement, and variable specification. First, as regards conceptualization, the Wisconsin theory looks at aspirations in terms of higher and lower but does not make a distinction as far as low is concerned. This study considers low aspirations as a separate category. Furthermore, the concern of the present work is with mobility aspirations and not status aspirations per se. Since the Wisconsin theory compares adolescents with their peers, it cannot address the issue of mobility. In this study, adolescents are compared with their parents, and so it is possible to ascertain whether they are aspiring to the same level as their parents or one that is either higher or lower.

With regard to measurement refinement, there are two ways that precision is improved in the work here. The first relates to the measure of educational aspirations. In the Wisconsin research, the major consideration is whether or not a high school senior plans to go to college the next year. A criticism of this approach (Alexander and Cook, 1979) is that the plan to attend college the next year may not capture the motivational aspect of attainment.
since some adolescents might answer according to an already-made decision. A plan on the part of senior high school students to go to college the next year is not synonymous with the desire to achieve a higher level of education. This study of mobility aspirations measures educational aspirations based on adolescents' responses concerning their the highest level of educational achievement they desire.

A second measurement issue involves the influence of significant others. In the Wisconsin study, significant others' influence is a single global response that is derived from individual reports about the perceived expectations of parents, teachers, and most friends on the issue of going to college. It is not ascertained that each adolescent has positive relationships with these people and that they influence his/her thought. In short, the importance of these people to respondent decisions is assumed in the Wisconsin study since no specific individuals were mentioned by the respondents as the person most likely to influence them. In contrast, adolescents in the present work were asked to identify the most significant other in their lives. They were also asked whether they perceived support from their most significant other for their educational goals.
Variable specification is another difference that distinguishes the conceptual framework here from the Wisconsin theory of status attainment. For example, unlike the Wisconsin work, cognitive ability is not included in this study because, for one thing, a good measure of it is not available in the data set being used. More importantly, though, its effect (academic performance) on educational aspirations (plan) has been found to be weak when compared to the effect of significant others' influence (Sewell et al., 1969). Instead of cognitive ability per se, the framework for this study concentrates on personality, i.e., self-other attitudes.

Although self-other attitudes are not part of the Wisconsin theory, research has shown that internal locus of control is positively related to academic aspirations and performance and social mobility (Frantz, 1982; Lefcourt, 1982). A traditional sex role orientation is inversely associated with achievement ambitions (Peplau, 1976; Spender and Featherman, 1978). And a positive school experience enhances ambitions (Turner, 1964) and one's educational attainment (Sewell and Hauser, 1980). Research has found a strong relationship between occupational and educational aspirations (Wilson and Portes, 1975; Haller, 1982) and has demonstrated that marriage plans affect the level of educational aspiration (Bayer, 1969) and educational attainment (Marini, 1978).
The internal family structure concept (family size and family intactness) is a second variable category that has been added in the present work. Its importance is based on the classic empirical work of Blau and Duncan (1967) and a study by Blake (1985). Blau and Duncan found that large family size and family non-intactness could pose disadvantages for intergenerational upward mobility. Blake found support for the inverse effect of family size on educational mobility.

HYPOTHESES

In an effort to understand the phenomenon of downward educational aspirations among adolescents, hypotheses based on the social psychological perspective are formulated and tested. Comparisons are made between downwardly aspiring adolescents and non-downwardly aspiring (upward and stable) adolescents in order to test the effect of social structure (family background), interpersonal relations (significant others' influence), and personality (self-other attitudes) factors on adolescents' downward educational aspirations. Various statistical techniques such as log-linear model analysis, logistic regression analysis, and multiple regression are used for the data analysis.
Downward versus Non-Downward Aspirations

Hypothesis 1: In terms of social structure, i.e., family background, adolescents with downward educational aspirations are more likely than adolescents with non-downward educational aspirations to reveal that their family backgrounds are characterized by factors that could be construed as disadvantageous to status attainment. In particular, downwardly aspiring adolescents are more likely to:

a. have mothers with lower levels of education;

b. have fathers with lower levels of occupational prestige;

c. have mothers with lower levels of occupational prestige;

d. have lower family income;

e. have lived in a non-intact family;

f. have more siblings.

Hypothesis 2: In terms of interpersonal relations, i.e., significant others' influence, adolescents with downward educational aspirations are more likely than those with non-downward educational aspirations to reveal that they have significant others who support their low-level of
educational goals. More specifically, downwardly aspiring adolescents are more likely to:

   a. identify a non-parent as the most significant other in their life decisions;
   b. have approval from the most significant other for their downward educational goals (decision not to attend college);
   c. have a best friend with low educational aspirations.

**Hypothesis 3:** Considering personality, i.e., self-other attitudes, adolescents with downward educational aspirations are more likely than the non-downward ones to reveal that they hold attitudes toward self and other social entities that are not congruent with high educational attainment. In particular, downward aspiring adolescents are more likely to:

   a. have a lower level of internal locus of control;
   b. have lower occupational prestige aspirations;
   c. desire to marry at an earlier age;
   d. hold a more negative attitude toward non-traditional sex-roles (wives' employment);
e. have a more negative attitude toward school-experiences.

Extent of Downward Educational Aspirations

The following hypotheses have been generated based on the number of years of discrepancy between father's educational attainment and adolescent's educational aspirations (the extent of downward educational aspirations or the extent of downward mobility tendency).

Hypothesis 4: In terms of social structure, i.e., family background, the extent of downward educational aspirations is increased for those adolescents whose family backgrounds are characterized by factors that could be construed as disadvantageous to status attainment. In particular, the extent of downward educational aspirations is:

a. negatively correlated with mother's education;

b. negatively correlated with father's occupational prestige;

c. negatively correlated with mother's occupational prestige;

d. negatively correlated with family income;

e. greater for those adolescents who live in a
non-intact family than it is for those who live in an intact family;

f. positively correlated with number of siblings.

**Hypothesis 5:** In terms of interpersonal relations, i.e., significant others' influence, the extent of downward educational aspirations is positively affected by having significant others who could reinforce or accept the adolescent's low educational goals. More specifically, the extent of downward educational aspirations is:

a. greater for those adolescents who identify a non-parent as the most significant other than it is for those who identify a parent (or parents) as the most significant other;

b. greater for those adolescents whose most significant other approves of low educational goals than it is for those adolescents whose most significant other does not approve;

c. negatively correlated with closest friend's educational aspirations.

**Hypothesis 6:** In terms of personality, i.e., self-other attitudes, the extent of downward educational aspirations is increased when adolescents hold attitudes toward self
and other entities that are not congruent with high educational attainment. More specifically, the extent of downward educational aspirations is:

a. negatively correlated with level of internal locus of control;

b. negatively correlated with occupational prestige aspirations;

c. negatively correlated with timing of marriage;

d. greater for those adolescents who hold a negative attitude toward wives' employment than for those who hold a positive attitude;

e. greater for those who hold a negative attitude toward school experiences than it is for those who hold a positive attitude.

SUMMARY

The social psychological research on adolescents' aspirations and adults' status attainments has devoted little attention to the non-normative situation whereby adolescents desire lower levels of education than their parents have achieved. Despite the fact that downward educational aspirations can lead to downward mobility, this phenomenon
has been overlooked. In summary, the objectives of the present study are:

1. to consider downward educational aspirations as an early sign of downward mobility, i.e., to test hypotheses to see how downward adolescents differ from non-downward (upward and stable) adolescents on important factors that are known to be correlated with educational aspirations and social mobility. The intent is to identify salient social structural, personality, and interpersonal-relations variables that are associated with downward educational aspirations among adolescent males and females;

2. to see if there are unique factors associated with the extent of downward educational aspirations (downward mobility tendency) among male and female adolescents;

3. to propose a social psychological explanation of downward educational aspirations, an early sign of downward mobility, using data obtained from a 1979 national sample of adolescents aged 15-19 years old.

The study presented here is relevant to the area of adolescent social psychology because it represents an initial attempt to generate a substantive theory of downward educational aspirations or downward mobility orientations among adolescents.
CHAPTER II
LITERATURE REVIEW

The literature review covers two areas of research that are relevant to this study: aspirations and social mobility. The development of the Wisconsin social psychological theory of status attainment is reviewed also.

THE WISCONSIN THEORY OF STATUS ATTAINMENT

Since 1957, scholars associated with the University of Wisconsin have constructed and developed a theory which focuses on the status attainment process from adolescence to young adulthood. The most important scholars whose works have continually contributed to the development of the general social psychological theory of status attainment are William H. Sewell, Archibald O. Haller, Robert M. Hauser, David L. Featherman and Alejandro Portes.

According to Haller (1982), the Wisconsin social psychological theory of status attainment has emerged from two theoretical traditions: social stratification and social psychology. The social stratification tradition focuses on
the influence of social structural factors on individuals' social status, whereas the social psychology tradition focuses on the influence that interpersonal relations have on individuals' social achievement, particularly those relations involving significant others.

The social stratification tradition originally developed from the work of Sorokin (1927). Later, Duncan (1968), and Haller (1970; 1982) described four classes of status content dimensions or status variables: wealth, power, prestige, and informational status. These classes recount differences in individuals' or groups' opportunities in access to limited resources and rewards in society. In general, wealth (often measured by family income), prestige (frequently measured by occupational prestige ratings) and informational status (usually measured by educational levels of attainment) are the three status content dimensions that have been studied in the social stratification area. Intergenerational social mobility has also been an important topic in social stratification.

The other theoretical tradition on which the general social psychological theory of status attainment is based is social psychology. Most relevant are the works of Mead (1934) and Sullivan (1940) for the concept of significant other, Lewin (1939) for the concept of aspirations, and
Heider (1958) for insight on interpersonal relations or interaction processes. The concepts in this tradition have been found to be more directly relevant to individuals' social achievement than social structural concepts, such as community (Sewell and Armer, 1968) and social origins (Sewell et al., 1969).

There are several assumptions underlying the Wisconsin social psychological theory of status attainment. First, before young people achieve their eventual status, they develop status-specific concepts of themselves and of others (their significant others). Second, there is a status-aspiration variable for each status content variable; that is, there is an educational, occupational, income or political aspiration variable. Third, there is a hierarchy of status aspiration for each status aspiration variable. Fourth, each adolescent develops a level of aspiration for each status variable. Finally, the adolescent's level of aspiration affects his or her level of attainment (Haller, 1982).

ASPIRATIONS

Aspiration studies have had a long history, and factors accounting for differences in level of aspiration have been investigated. The level of aspiration as a concept evolved
from the work of Kurt Lewin (1939) who conducted experiments on aspiration levels in group situations. Lewin explained level of aspiration from a field-theory perspective. In his view, level of aspiration refers to goal-setting behavior in group tasks and in a group environment. There are two types of goals -- ideal goals (wished for) and real goals (expected in the future). Level of aspiration, as defined by Lewin et al. (1944), included the levels of performance hoped for and expected. An individual's goal setting depends on certain ideal goals, and his/her level of aspiration is largely influenced by social facts (the presence or absence of other persons), competitive situations, and success/failure experiences. One's plan is made by taking ideal goals and realities into account in order not to structure it unrealistically. The level of aspiration can be changed or adjusted to be compatible with reality. Adolescence is the period in which an individual begins to be able to differentiate between the levels of which he/she dreams and which he/she expects in the future (Lewin, 1939). The level that one wishes for is more distant to the future than the expectation level and the plan level since the latter ones are more definite. Therefore, individual wish (or aspirations as typically considered but the ideal aspect of Lewin's level of aspirations) is more likely to be set higher than reality (expectation level).
In the years that followed Lewin's seminal work, social researchers have measured level of aspiration by directly asking respondents about desires, hopes, plans, goals, and ambitions for future life (with regard to education and occupation). Over time, however, the term, aspiration, has become confusing with researchers using it interchangeably with plan and expectation. Some researchers (Brookover et al., 1967; Rohberg, 1967; Marini and Greenberger, 1978) have begun to use two concepts, aspiration and expectation (or plan), in their studies in order to more clearly distinguish conceptual meaning. Findings have confirmed the existence of a difference between aspiration and expectation; the educational aspiration level is slightly higher than the educational expectation level among both male and female adolescents (Marini and Greenberger, 1978).

In this study, the term, aspiration, is the affective or motivational component of attainment. The level of one's aspirations reflects a level of achievement preference regardless of present personal constraints and limitations (Rohberg, 1967; Spenner and Featherman, 1978). Aspiration level, i.e., what a person aspires to, normally is not lower than the expectation level, i.e., what he or she expects to obtain. Put another way, people usually desire a higher level than they think they may actually achieve given their knowledge of their limitations at that time. Educational
aspiration is, therefore, the highest level of education that an adolescent wants for himself/herself. Moreover, one can assume that, without a desire for a high level of educational attainment, that level of attainment will not be achieved since educational accomplishment requires persistent effort and other resources. Therefore, educational aspirations typically are not lower but the same or higher than final attainment level.

An important distinction related to educational aspiration is that it does not have the same characteristics as achievement motivation or need for achievement. Spenner and Featherman (1978) have noted that the need for achievement reflects the deep and unconscious demand to perform excellently, whereas status (educational and occupational) aspiration reflects the conscious attempt to attain a desired position. Educational aspiration is more specific to one educational level and is not as strong a drive as achievement motivation. Rather, educational aspiration expresses an individual's preference for educational achievement. It also reflects the value that that person puts on education. Research has shown that aspirations have a stronger effect on status attainment than does the need for achievement (Haller, 1982).
In the Wisconsin studies, the term, educational aspirations, was used when educational plans were measured. Hauser, et al. (1983) argued that the issue of using these two terms interchangeably is not so critical since the difference between reports on educational aspirations and plans is trivial. Therefore, this literature review includes research concerned with aspirations, even though what was actually assessed were plans or expectations. It should be mentioned that the term, expectation, has been used by the Wisconsin researchers to refer to the expectations of others for an ego's educational goal (Haller, 1968).

EDUCATIONAL ASPIRATIONS AND SOCIAL MOBILITY

Educational aspiration is a key concept with respect to educational attainment and social mobility. In mainstream studies on the status attainment process, educational aspiration is viewed as a mediator between parental backgrounds and individual's educational attainment (Haller, 1982). Much evidence confirms that educational attainment leads to occupational attainment and income (Blau and Duncan, 1967; Sewell and Hauser, 1975; Sewell and Hauser, 1976; Haller, 1982). Also, there is a significant positive relationship between adolescents' educational aspirations and their educational attainments in later years (Wilson and Portes, 1975; Sewell et al., 1976; Haller, 1982).
This study focuses on adolescents' educational aspirations rather than adolescents' educational attainments for several reasons. Since formal education is the avenue to achieved social status, many persons do not terminate the educational attainment process during adolescence. Because educational attainment requires significant amounts of effort, time, finances and ability, some adolescents leave school temporarily and return later in life when the situation is more conducive to pursue levels of formal education that are consistent with their aspirations. This means, of course, that adolescents' current educational attainment levels may not reflect final educational attainments. For these reasons educational aspirations are a more appropriate focus when adolescents are being investigated.

Although occupational prestige categories have been the focus of conventional studies on social mobility, measures of educational level are more objective and specific than measures of occupational prestige. Furthermore, there is evidence that father's education is a more reliable indicator of socioeconomic background than is father's occupation (Davies and Kandel, 1981). It has been suggested that intergenerational change in education, another dimension of social stratification, should be investigated for a better understanding of the current social mobility phenomenon
Since educational attainments largely determine occupational attainments and since final educational attainments, to a certain degree, are reflected in adolescents' educational plans and aspirations, educational aspirations can be used to measure the social mobility tendency, especially downward educational mobility among adolescents. Young people with downward educational aspirations have elected a downward path in education. They want to achieve educational levels lower than their fathers' educational attainments, a fact that demonstrates their downward mobility tendency.

The focus of this study, downward educational aspirations, differs from previous research on aspirations and social mobility in several respects. This study classifies downwardly-aspiring adolescents by comparing the level (year) of adolescent educational aspirations with the level (year) of father's educational attainment. Previous studies have compared son's occupational aspirations with father's occupational attainment (Douvan and Adelson, 1959) and son's occupational type with father's occupational type (Wilensky and Edwards, 1958; Blau and Duncan, 1967; Lopreato and Hazelrigg, 1972; Goldthorpe, 1980; Loewenstein, 1983). Turner (1964) compared adolescents' ambition index (combined values from educational, occupational, and material ambitions) with background index (values from
family breadwinner's education, occupation, and independent employee status). He also compared son's occupational ambition with family breadwinner's occupational attainment. Other studies, for example, Blake (1985), have chosen to investigate educational mobility, considering educational attainments of fathers and sons. Some studies used adolescent's goal for a college education as an indicator of upward mobility for adolescents from lower status backgrounds and for the offspring of immigrants (Turner, 1964; Freeman, 1984).

**ASPIRATIONS/MOBILITY AND FAMILY BACKGROUND**

When educational aspirations are equated with educational plans, socioeconomic status has been shown to have a very strong effect on adolescent's educational aspirations in the case of both males and females (Bayer, 1969). Garrison (1982) found that there is a strong positive relationship between father's education and high school student's college plans; the higher the father's education, the more likely the son is to have a college plan. However, when a distinction is made between educational aspirations and expectations, the correlation between socioeconomic status and educational aspirations is not strong and is lower than the correlation between socioeconomic status and educational expectations (Brookover, et al., 1967).
In Turner's (1964) study of high school seniors' ambitions (educational and occupational goals), he found that ambitions are strongly associated with background (including family breadwinner's educational and occupational attainments) among both male and female students. Students from higher level backgrounds place greater emphasis on education than those from lower level backgrounds. Turner concluded that educational and occupational goals are shaped by social origin, but the process is complicated. For example, the traditional middle-class values of self-reliance (as opposed to mutual aid) and deferred gratification distinguished students with high ambitions (including high educational ambition) but did not distinguish students from higher level backgrounds. This result led Turner to contend that students' backgrounds did not provide a sufficient reference group for students' upward ambitions.

Previous studies have tended to collapse various measures of socioeconomic status into a single global factor. Therefore, the effect of each component (e.g., mother's education) has not been fully explored. This study will investigate the association between different indicators of family socioeconomic status such as mother's education, father's occupation, mother's occupation and family income and downward educational aspirations.
The influence of family background on educational and occupational achievement has been persistent across generations. Since educational attainment provides opportunity for upward mobility, disadvantages in family background can lead to disadvantages in achieving upward mobility (Alwin and Thornton, 1984). The effect of socioeconomic background on an individual's educational attainment, especially with respect to post-high school education, is independent of an individual's ability, and it is hard to escape the effect of socioeconomic background on other individual attainments (Sewell and Hauser, 1976).

Even though the United States has a high rate of social mobility (Blau and Duncan, 1967; Lipset and Bendix, 1967; Lopreato and Hazelrigg, 1972), social origin is still a strong influence on individual social achievement. Blau and Duncan (1967) revealed that such internal family structural factors as family size and family intactness also are associated with chances for upward mobility. Having many siblings and coming from a broken home can be handicaps to upward occupational attainment. Duncan, et al. (1972) further found that family intactness (family stability is their term) has an impact on an individual's educational attainment. Compared to broken homes, intact family situations increase schooling by one year.
A recent study by Blake (1985) revealed that number of siblings negatively affects educational mobility. An individual with a small or medium number of siblings has a better chance of moving beyond the father's level of educational attainment. The influence of father's education on son's education, therefore, is contingent on the number of siblings. These aspects of internal family structure, i.e., family intactness and family size, as well as social origin, i.e., socioeconomic characteristics, are explored in this study for their association with downward educational aspirations.

**ASPIRATIONS/MOBILITY AND INFLUENCE OF OTHERS**

In the literature, the influence of other people on one's aspirations has been expressed with two theoretical concepts -- reference group and significant other. Reference group (Hyman, 1966, 1968; Merton and Rossi, 1966; Sherif and Sherif, 1969) refers to a group in which an individual wants to be a member; the values and standards of that group have some influence on the individual's aspirations and behaviors. Significant other refers to a specific influential person in an individual's life. Significant other can be a model and/or a definer (one that communicates his/her expectations for the individual's behaviors) (Haller and Portes, 1973). According to a social role
perspective, the significant other can control punishments and rewards valued by an individual (Heiss, 1981). The influence of the significant other on one's aspirations and behaviors is assumed to emit in interpersonal relations. The specificity of the concept, significant other, makes it more suitable for this study, because it is not limited to the influence of a group as is the reference group concept. An adolescent's aspirations may be greatly influenced by a specific, intimate person and, in fact, significant other is the concept that has been used in most of the previous research that has examined the influence of other persons on status aspirations (Haller, 1982).

Although a variety of measures have been used to assess significant other's influence, the results have consistently shown the relevance of this concept to adolescent aspirations (Bordua, 1960; Alexander and Campbell, 1964; Haller and Butterworth, 1969; Davies and Kandel, 1981). Parents and friends have been most frequently mentioned as significant others with respect to one's educational aspirations (Kahl, 1953; Kerckhoff and Huff, 1974; Looker and Pineo, 1983), i.e., as being perceived sources of support and encouragement. Some studies (Kandel and Lesser, 1972; Picon and Carter, 1976; Davies and Kandel, 1981) have compared the relative influence of parent to that of best friend (peer of same approximate age) on one's educational
aspirations. The findings from those studies are not consistent. Kandel and Lesser (1972) found that parents (especially mother) have more influence on adolescent's educational goals than does the best friend. Contrastly, Picou and Carter (1976) found that, in general, friends are more influential than parents, but that for urban adolescents, parents are perceived as more influential. Davies and Kandel (1981) found that parental influence on adolescents' educational plans is greater than the best friend's influence, and that parental influence does not decrease during the adolescent period.

Some studies (Duncan et al., 1968; Davies and Kandel, 1981) assumed that the influence between the best friend and the adolescent is reciprocal. Rather than being assumed, reciprocation of friendship choice was assessed in Alexander and Campbell's (1964) study; they found that the best friend's expectation of college attendance and reciprocation of friendship choice are related to adolescent's educational aspirations. In Turner's (1964) study, students tended to choose as preferred students in class those with ambitions similar to their own. Turner anticipated that students with low ambition may be trapped by their social ties to other less ambitious students and that this can, later, obstruct them from developing upward aspirations.
The influence of influential persons on one's aspirations reflects the influence of interpersonal relationships, and these have been found to be very important for aspiration formation. A concern of this study is the association between significant others' influence and adolescents' downward educational aspirations.

In social mobility literature, the concept of reference group has been used more often than that of significant other's influence. The term, mobility, generally refers to upward mobility -- young people moving up from lower class, immigrant, and minority backgrounds. Receiving support to "move up" from parents, friends, and relatives in the original status group facilitates an individual's upward move. When upward striving is valued by one's original group, the upward striving person (a marginal person) is less likely to face the conflict of being between two classes -- the old and the new (Turner, 1964). Goldthorpe (1980) has revealed that in modern British society, downward mobility is experienced by a very small proportion (five percent) of the sample; downwardly mobile men maintain social ties with the service class (non-manual or professional, administrative and managerial positions) members more than upwardly mobile men maintain social ties with members of their original class.
Mobility, of course, can be downward, as well as upward, and it is the downward mobility tendency which is of particular interest in this study. Of concern is whether downwardly aspiring adolescents have support from important others. Literature on adolescent society (Coleman, 1961) and the influence of the peer group on adolescents' aspirations and behaviors (Sherif and Sherif, 1969) suggests that the influence of same-age friends may strongly influence downwardly aspiring adolescents. This study examines the possibility that the best friends of these downward adolescents may have low aspirations.

ASPIRATIONS/MOBILITY AND PERSONALITY

Personality is "a product of individual experience in a cultural environment and social interaction........(It is a) relatively organized configuration of typical patterns of behavior, attitudes, beliefs, and values characteristic of a person, and recognized as such by himself and others" (Theodorson and Theodorson, 1979:296). Personality characteristics have been long known to be correlates of aspirational level (Lewin, et al., 1944). Since attitudes are relatively enduring predispositions for individual to act (Zimbardo and Ebbesen, 1970), the relationships between some attitudes and young people's aspirations has been investigated.
In the literature, self concept has been perceived as an attitude toward self (Rosenberg, 1981; House, 1981); thus internal-external locus of control could be perceived as one kind of attitude toward self. Studies have shown a positive relationship between internal locus of control (perceived self-efficacy) and educational aspirations, educational expectations, academic performance, upward mobility, and willingness to delay gratification (Frantz, 1980; Lefcourt, 1982; Ferrone, 1984).

Turner (1964) found that delayed gratification, a personality trait, is related to high ambition in male adolescents; this includes delaying the timing of marriage for the educational and occupational training that is necessary for achieving a high status occupation. Bayer (1969), too, found that adolescents' late marital plans increase the likelihood that they will have higher educational aspirations (plans).

Occupational aspirations, which reflect the personal value placed on occupational prestige and future career, also are strongly associated with educational aspirations (Haller, 1982). One possible reason is that education is a necessary condition for a high status occupation (Sewell et al., 1969). The direction of influence, though, is not entirely clear. Adolescents first may aspire to certain
occupations and later develop the necessary levels of educational aspiration that correspond to the educational requirements for those occupations.

Attitudes toward sex roles have been found to be relevant to achievement ambition (Spender and Featherman, 1978). Peplau (1976) concluded that traditional sex-role attitudes are associated with lower achievement among women. In an experiment on competition, female college students with traditional sex-role attitudes "performed significantly better on a verbal task when working as a team with their boyfriend than when working in individual competition against the boyfriend" (Peplau, 1976:561). Subjects with non-traditional sex-role attitudes performed in an opposite way. On the questionnaire responses, female college students with traditional sex-role attitudes were more likely than those with non-traditional sex-role attitudes to reveal lower educational aspirations, less interest in a career, and a lower self-evaluation of intelligence. They ranked higher, however, in their perceptions of themselves as desirable marriage partners.

Attitudes toward self, late marriage, occupational prestige, and changes in traditional women's roles involve individual cognition; they seem to be interrelated since a person tends to try to maintain a balanced state
(consonance or no conflict) with regard to their cognitions (Heider, 1958; Shaw and Costanzo, 1982). It is conceivable that young people's attitudes toward these issues might be relevant to downward educational aspirations.

In much of the earlier research, the causes of social mobility were investigated in light of the individual's need for achievement (Crockett, 1966) and other personality traits such as autonomy, energy and liveliness and self acceptance and confidence (Douvan and Adelson, 1958). According to Smelser and Smelser (1981), those personality characteristics and their relationships with social mobility are rarely examined in the recent research.

DOWNWARD MOBILITY

Generally, researchers imply that downward and upward mobility are influenced by the same factors, even though they have tended not to study downward mobility directly. The American value system is such that downward mobility is not in most people's minds when they talk about social mobility (Berger and Berger, 1972). Downward mobility is an underdeveloped area in social stratification research (Lopreato and Hazelrigg, 1972); it has been the focus of only a few studies.
In the limited amount of research on downward mobility that has been done, the term "downwardly mobile" usually refers to unemployed young people whose fathers have had secure jobs and to manual or blue-collar workers whose fathers have worked in white-collar or professional-type jobs. When the macro perspective has been applied, downward mobility has tended to be viewed as the result of social limitations and societal changes, in particular, changes in demographics, the occupational structure and the economic situation. Downward mobility is equated with social change victimization rather than individual failure (Smelser and Smelser, 1981; Lowenstein, 1985).

The micro perspective as applied to the downwardly mobile has been very different. They tend to be considered deviants or rebels and not victims (Lipset and Bendix, 1967). Some research that has compared the personality characteristics of downwardly mobile students with stable and upwardly (or non-downwardly) mobile students, indicates that differences in personality characteristics are a possible cause of individual social mobility (Douvan and Adelson, 1958; Lipset and Bendix, 1967). The studies reviewed by Lipset and Bendix (1967) suggest that downward mobility is due to ability deficiency or low intelligence and low achievement motivation. In short, studies based on the micro perspective emphasize personal characteristics or
limitations as the cause of downward mobility. It should be pointed out that the data in most of these personality studies were collected several decades ago, from the 1940s to the 1960s. Recent studies that deal with micro and macro factors as they relate to downward mobility are rare.

It is known that intergenerational mobility basically depends on educational mobility. Educational attainment is the mediator between social origin and social achievement in the Blau and Duncan (1967) model of status attainment. In other words, the conditions for individual social mobility are social origin, level of educational attainment, and first job prestige. However, there is an interesting point about the level of education and the chance of being downwardly mobile. Blau and Duncan found that those individuals who have some college education (who did not complete four years of college) have a higher chance of being downwardly mobile relative to their parents' social achievement than those individuals with other levels of educational attainment. This result confirmed the finding of a previous study by Wilensky and Edwards (1959) which indicated that manual workers who were intergenerationally downwardly mobile were more likely to have had some college education than those who were non-downwardly mobile. Blau and Duncan speculated that a possible reason for these findings might be that the starting point for the downwards was higher
than for the non-downwards in that the parents of the down­
wards may have been sufficiently well-off to have sent them
to college in the first place.

These studies suggest that some college education, but
less than four years, promises a higher chance of downward
mobility for individuals from a high social-origin back­
ground. It is necessary to point out that in the studies
mentioned, mobility refers to intergenerational occupacion­
al mobility. Blau and Duncan (1967) also have shown the
effect of educational attainment on levels of intergenera­
tional upward mobility, i.e., low versus high discrepancy
between father's and son's occupational attainment. The
chance of higher discrepancy increases with increasing lev­
els of educational attainment. However, for non-whites
(blacks), having a higher education has a small effect on
opportunity for upward mobility, except in cases where non­
whites have completed a four-year college education.

This study investigates extent of downward mobility ten­
dency by looking at the extent of downward educational
aspirations (years of discrepancy) and its association with
other factors. It is thought that the extent of downward
mobility tendency could be determined by factors at three
levels: social structural, interpersonal relations, and
personality.
CHAPTER III
METHODOLOGY

THE DATA SET AND SAMPLING PROCEDURES

This study uses data from the National Longitudinal Survey (NLS) of Labor Force Behavior, Youth Survey, 1979, the first year of the annual interview project. In compiling this data set, the Center for Human Resource Research at the Ohio State University was contracted by the United States Department of Labor to design the questionnaires, analyze the data, and distribute the findings for public use. The National Opinion Research Center (NORC) was responsible for sampling procedures, field work and data reduction.

The 1979 NLS Youth Survey was conducted between late January and mid August 1979. The target population consisted of ten groups of youth between the ages of 14 and 21 on January 1, 1979. A total of 12,686 persons were interviewed. The approximate breakdown for the ten sample subsets is as follows: 1) Hispanic males--946; 2) Hispanic females--978; 3) Non-Hispanic black males--1,444; 4) Non-
Hispanic black females—1,479; 5) Non-Hispanic, non-black, economically disadvantaged males—744; 6) Non-Hispanic, non-black, economically disadvantaged females—899; 7) all Non-Hispanic, non-black males—2,441; 8) all Non-Hispanic, non-black females—2,475; 9) male military personnel—823; 10) female military personnel—457.

According to the Center for Human Resource Research (1983), the sampling procedures were chosen with respect to the purpose of the study, youth labor force behavior. Individuals were considered in the population if they were living within the 50 states (or if they were on active military duty outside the United States). Persons living in institutions on a permanent basis were excluded.

A multistage, stratified area probability sample of dwelling units and group quarter units was used. (This sampling technique was not used for the groups on active military duty.) A screening interview was administered at about 75,000 dwellings and group quarters distributed across 202 Primary Sampling Units (PSU)—a county or group of counties. Information was obtained that could be used to identify persons eligible for sample membership. One hundred and two of the PSU constitute a cross-sectional sample, and the other 100 PSU constitute a special purpose sample. The cross-sectional sample was designed to
maximize statistical efficiency with respect to the general population. Through several stages of sample selection -- counties, district-block groups, sample listing units -- probabilities of selection were based upon either the total population or total housing units. The special purpose sample was designed to produce statistically efficient samples of Groups 1 through 6. All stages of sampling, except the final stage, were carried out with the probabilities proportional to a linear combination of population size for these groups. In the final stage of sample selection, minimum oversampling was employed in order to increase the sample composition with respect to Groups 1 through 6. Samples in Groups 7 and 8 were selected from the cross-sectional sample. Samples for Groups 1 through 6 were selected from individuals identified in both the cross-sectional sample and the special purpose sample. Sample selection procedures were intended to minimize selective probability differences.

Most research on adolescents' aspirations have used high-school student samples in limited geographic settings such as a certain state and have collected data by administering questionnaires in schools. The findings from such studies have limited generalizability since the samples are not nationally representative and are confined to adolescents in high school. The 1979 NLS Youth Survey is based
on a large national sample that consists of males and females 14-22 years of age both in and out of school. The data were collected using a structured interview technique.

SAMPLE CHARACTERISTICS

The present study focuses on those male and female adolescents who were 15 to 19 years of age in 1979, regardless of whether they were in or out of school. As shown in Table 1, the part of the sample that is in the 15 to 19 age category constitutes 62 percent of the whole sample. There is no sex difference in frequency distribution among age groups.

Table 1
1979 Youth NLS Respondents' Age Groups by Sex (Percentages)

<table>
<thead>
<tr>
<th>Age Group</th>
<th>Males</th>
<th>Females</th>
</tr>
</thead>
<tbody>
<tr>
<td>14 years old</td>
<td>7.9</td>
<td>7.1</td>
</tr>
<tr>
<td>15-19 years old</td>
<td>62.2</td>
<td>63.0</td>
</tr>
<tr>
<td>20-22 years old</td>
<td>29.9</td>
<td>29.9</td>
</tr>
<tr>
<td>Total (N)</td>
<td>(6400)</td>
<td>(6286)</td>
</tr>
</tbody>
</table>
The primary concern is adolescents' downward educational aspirations, and it can be seen from Table 2 that the large majority of downward adolescents have fathers with more than a high school education. To have some control over the level of fathers' education when adolescents with downward educational aspirations are compared with adolescents with non-downward (stable and upward) educational aspirations, the sample is confined to adolescents whose fathers have more than 12 years of schooling. The total sample size is 1,506, 781 males and 725 females.

Table 2
Adolescents' Relative Educational Aspirations and Fathers' Educational Attainment by Sex

<table>
<thead>
<tr>
<th>Father's Education</th>
<th>Adolescent Educational Aspirations</th>
<th>Upward</th>
<th>Stable</th>
<th>Downward</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Grade school</td>
<td>Male</td>
<td>1431</td>
<td>9</td>
<td>12</td>
<td>1452</td>
</tr>
<tr>
<td></td>
<td></td>
<td>(98.6)</td>
<td>(.6)</td>
<td>(.8)</td>
<td>(100)</td>
</tr>
<tr>
<td></td>
<td>Female</td>
<td>1485</td>
<td>7</td>
<td>8</td>
<td>1500</td>
</tr>
<tr>
<td></td>
<td></td>
<td>(99.0)</td>
<td>(.5)</td>
<td>(.5)</td>
<td>(100)</td>
</tr>
<tr>
<td>High school</td>
<td>Male</td>
<td>680</td>
<td>451</td>
<td>10</td>
<td>1141</td>
</tr>
<tr>
<td></td>
<td></td>
<td>(59.6)</td>
<td>(39.5)</td>
<td>(.9)</td>
<td>(100)</td>
</tr>
<tr>
<td></td>
<td>Female</td>
<td>760</td>
<td>370</td>
<td>14</td>
<td>1144</td>
</tr>
<tr>
<td></td>
<td></td>
<td>(66.5)</td>
<td>(32.3)</td>
<td>(1.2)</td>
<td>(100)</td>
</tr>
<tr>
<td>More than 12 years</td>
<td>Male</td>
<td>297</td>
<td>256</td>
<td>228</td>
<td>781</td>
</tr>
<tr>
<td></td>
<td></td>
<td>(38.0)</td>
<td>(32.8)</td>
<td>(29.2)</td>
<td>(100)</td>
</tr>
<tr>
<td></td>
<td>Female</td>
<td>279</td>
<td>209</td>
<td>237</td>
<td>725</td>
</tr>
<tr>
<td></td>
<td></td>
<td>(38.5)</td>
<td>(28.8)</td>
<td>(32.7)</td>
<td>(100)</td>
</tr>
</tbody>
</table>
Looking more closely at the educational attainment of fathers in this study (Table 3), about one-third of the adolescents have fathers with four years of college (a bachelor's degree). Approximately forty percent have fathers with some college education (more than high school but less than four years of college) and about one-fourth have very highly educated fathers (more than four years of college).

Table 3

Educational Aspirations of Adolescents with High Education Fathers and Fathers' Educational Attainment by Sex (Percentages)

<table>
<thead>
<tr>
<th>Educational Level</th>
<th>Fathers' Attainment</th>
<th>R's Aspirations</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Males</td>
<td>Females</td>
</tr>
<tr>
<td>High school or less</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>College (less than 4 years)</td>
<td>41.3</td>
<td>42.8</td>
</tr>
<tr>
<td>College (4 years)</td>
<td>34.4</td>
<td>34.3</td>
</tr>
<tr>
<td>College (more than 4 years)</td>
<td>24.3</td>
<td>22.9</td>
</tr>
<tr>
<td>Total (N)</td>
<td>(782)</td>
<td>(724)</td>
</tr>
</tbody>
</table>

Table 3 also reveals that, as far as adolescents themselves are concerned, nearly half aspire to a four-year
college degree. Thirty-one percent of the males and twenty-six percent of the females aspire to levels higher than a bachelor's degree. About fifteen percent of the males and twelve percent of the females aspire to no more than a high school education, and only ten percent of the males and fifteen percent of the females aspire to more than a high school education but less than four years of college. It can be concluded from the data in Table 3 that both male and female adolescents whose fathers have at least some college education tend not to aspire to lower but rather to higher educational levels than their fathers. This finding provides further evidence that downward educational aspirations are non-normative.

VARIABLE DESCRIPTION AND MEASUREMENT

Educational aspirations refer to the highest level of schooling an adolescent desires ultimately to achieve in life. Measurement is based on the question: "What is the highest grade or year of regular school, that is, elementary school, college, or graduate school, that you would like to complete?" The response can be coded from 1-18 with respect to the highest grade or year of schooling desired, e.g., one year of college is coded 13; two years of college are coded 14; three years of college are coded 15; etc. This variable is different from the educational expectation
variable used in this survey in that the latter is assessed by asking, "As things now stand, what is the highest grade or year you think you will actually complete?" As noted earlier, the measure of educational aspirations in the Wisconsin model is the educational plans (decisions to go to college next year or not) of high-school seniors. It has been criticized on the basis that it does not assess motivation for attainment but rather the prospects for a very near future event (Alexander and Cook, 1979). In the present study, educational aspirations are defined not as educational expectations or plans for next year but educational preference levels.

Mobility aspirations or relative educational aspirations are derived by comparing respondents' level of educational aspirations with their fathers' level of educational attainment. Educational levels classified for this comparison are 1) less than 12 years, 2) 12 years (high school), 3) 13 through 15 years (some college), 4) 16 years (four years of college), 5) 17 years (five years of college), and 6) 18 or more (six or more years of college). Downward educational aspirations characterize adolescents who aspire to a level of education that is lower than their father's educational attainment level. Upward educational aspirations characterize adolescents who aspire to a level that is higher than their father's educational attainment level.
Adolescents with stable educational aspirations are those who aspire to the same educational level as that attained by their fathers. The category, non-downward educational aspirations, includes adolescents whose aspirations are either upward or stable.

Extent of downward educational aspirations (the extent of downward mobility tendency) is the discrepancy in years between respondent's educational aspirations and father's educational attainment. This is only for those who aspire to a lower level of education than that which their fathers have achieved.

The rationale for comparing female adolescents with their fathers rather than with their mothers to determine direction of aspirations and mobility tendency needs to be elaborated. Young women in this sample would have grown up under the influence of the Women's Movement which got underway in the early 1960s. It is likely that their educational aspirations would have been raised as a result of the Women's Movement, since one goal of the Women's Movement has been educational opportunities for women equal to those of men (beyond the impact of all occupational types requiring higher educational levels over the generations). The mothers of these adolescents, with educational levels that tend to be lower than their husbands, would have grown
up without the social influence of the Women's Movement, i.e., at a time when men were expected and encouraged to attain higher levels of education than women. Comparing female adolescents who were exposed to the effects of the Women's Movement with their fathers, then, would seem to be a more appropriate strategy than employing a different standard of comparison for males and females. To see if there are any major differences that result from the two approaches, however, the analysis in this study will consider downwardly aspiring females relative to the mother's education as well as father's education.

Parents' education includes both father's and mother's educational attainments. Measurement is based on the highest grade of schooling (0-18 years) completed by each parent. The coding is the same as that used in educational aspirations. For categorical analysis, mother's education is classified into two levels based on the median value in this sample (12 years of education): 1) high school or less, and 2) more than high school. Father's education is categorized into two levels based on the median value in this sample (16 years of education): 1) some college and 2) 4 or more years of college.

Parents' occupation represents responses to the questions, "Last year, that is during 1978, what kind of work
was your father (your mother) doing?"; "During 1978, what kind of work did he (she) do the longest?"; and "What were some of his (her) main activities or duties?" (This variable includes only those work for pay) Census occupational classifications are regrouped into eight categories:

1) Private household and service workers (coded 1);
2) Farm laborers, foreman farmers, farm managers, and laborers (coded 2);
3) Operative and kindred, and armed forces (coded 3)
4) Craftman, foreman and kindred (coded 4);
5) Clerical and kindred (coded 5);
6) Sales workers (coded 6);
7) Managers, officials and proprietors (coded 7);
8) Professional, technical and kindred (coded 8).

It can be assumed that the higher the coding number the higher the occupational prestige. For categorical analysis, mother's occupation is classified into two levels based on median value of this sample: 1) lower (categories 1 to 5) and 2) higher (categories 6 to 8). Father's occupation is classified into two levels based on the median value in this sample: 1) non-professional (categories 1 through 7) and 2) professional (category 8).

The variable, family income, is the dollar amount of total net family income reported for the year 1978. For categorical analysis, this variable is divided into two
categories based on the median value, $25,000: 1) $25,000 or less and 2) more than $25,000.

Family size is a variable represented by the respondent's number of (living) siblings. Coding is based on the actual number of siblings. For categorical analysis, the variable is coded one if the respondent has zero to two siblings, and two if he/she has three or more.

The variable, family intactness, reflects the respondent's response to the question, "With whom were you living when you were 14 years old?" This dichotomous variable is coded one if the respondent's answer is "mother and father", and zero otherwise.

The variable, significant others' influence, has three measures: identification of the most significant other, most significant other's support for the adolescent's low educational goals, and closest friend's educational aspiration level. The measure, most significant other, is represented by the person chosen by the respondent as the most significant other and is based on the question: "Who has influenced you the most on how you feel about such things like school, marriage, jobs, and having children?" For general purposes, this variable is coded one if the respondent answered "parent or parents", and zero otherwise. It is significant that the most significant other, rather than
being assumed, is identified by the adolescent and could be any person including parent(s), teacher, or peer.

Most significant other's support for a decision not to pursue post-secondary education is assessed in a question that asks about the most significant other's approval of the respondent's decision not to attend college: "We would like to ask you what your (relationship) would probably feel if you decided not to go to college. Would (he/she) strongly approve, somewhat approve, somewhat disapprove or strongly disapprove?" This variable is coded one if the respondent answered that the most significant other would strongly disapprove, two if he/she would somewhat disapprove, three if he/she would somewhat approve, and four if he/she would strongly approve. For categorical analysis, this variable is regrouped into two levels, disapprove and approve.

Best friend's educational aspiration level is reflected in the respondent's answer to the question: "Now think about your best or closest friend. What is the highest grade or year of regular school that this friend wants to complete?" This measure is continuous and coded 1-18 in the same way as the educational aspiration variable. For categorical analysis, this variable is classified into two levels based on the median (16 years of education aspired
to by best friend in this sample): 1) less than four years of college and 2) four or more years of college.

Self-other attitudes refer to beliefs, feelings and behavioral intentions on issues of self (locus of control, occupational aspirations, timing of marriage) and others (school and people in school and the change in traditional sex roles, i.e., wives' employment).

Internal locus of control is a concept that refers to the degree to which a respondent feels that the outcome of events in his/her life depends upon his/her own actions or relatively permanent characteristics as opposed to external factors such as chance, fate and luck (Frantz, 1980). This concept is measured by an abbreviated version of the Rotter Internal-External Locus of Control Scale (Rotter, 1966). The 1979 NLS youth data set contains four questions, and in each question, the respondents were asked to specify to what extent they felt their answer revealed either external or internal locus of control. The response to each question is scored on a scale of 1 (when respondent feels "very strongly" about the external control answer) to 4 (when respondent feels "very strongly" about the internal control answer). The total scores, then, range from 4 (least internal) to 16 (most internal). For categorical analysis, this variable is classified into two levels, low and high:
low is lower or equal to 12, and high is higher than 12. This is based on the median score, i.e., 12.

Attitude toward wives' employment (non-traditional sex roles) is measured with eight attitudinal (Likert-type) statements about the necessity of wives' work outside the home and its consequences. Each response reflects degree of agreement: "strongly agree" on a positive statement about wives' employment is scored 4 and "strongly disagree" is scored 1. The reverse scoring is applied for negative attitudinal statements. The total score from these eight items reflects the respondent's attitude toward non-traditional sex roles (wives' employment). A higher score indicates a more positive attitude. For categorical analysis, this variable is regrouped into two levels, low (23 or lower, the median score), and high (higher than 23).

School experience is measured by ascertaining respondent's feelings toward friends, teachers, teaching, lessons, school work, school atmosphere and global satisfaction in school. This measure consists of ten attitudinal (Likert-type) statements. The response for each item is assigned a score of 4, 3, 2, or 1 for each level of endorsement of a positive statement about school experience (from very true, somewhat true, not too true, to not true at all, respectively). The total score for these ten items
represents the respondent's attitude toward his/her school experience. The higher the score, the more positive the attitude. For categorical analysis, this variable is classified into two levels—low (32 or lower, the median score) and high (higher than 32).

Occupational aspirations reflect the respondent's preferred occupation for himself/herself in the future. Measurement is based on the question, "What kind of work would you like to be doing when you are 35 years old?" Responses are coded in the same manner as the variable, father's occupation. Lower coding numbers represent lower occupational prestige. For categorical analysis, this variable is classified into two levels, based on the median of 8: 1) non-professional (categories 1 through 7) and 2) professional (category 8).

Timing of marriage is a variable represented by the respondent's preferred age at marriage. It reflects the respondent's response to the question, "At what age would you like to marry?" The variable is dichotomous and is coded one if the respondent answered "never" or "older than 24" (considered delayed age at marriage), and zero otherwise.

The means and standard deviations for many of the variables in this study are presented in Table 4.
Table 4
Descriptive Statistics for Select Independent Variables by Sex

<table>
<thead>
<tr>
<th>Variables</th>
<th>Males</th>
<th>Females</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>X</td>
<td>S.D.</td>
</tr>
<tr>
<td>Father's education (number of years)</td>
<td>15.5 1.6</td>
<td>15.5 1.6</td>
</tr>
<tr>
<td>Mother's education</td>
<td>13.3 2.5</td>
<td>13.2 2.3</td>
</tr>
<tr>
<td>Father's occupational prestige (1-8)</td>
<td>6.2 2.0</td>
<td>6.1 2.1</td>
</tr>
<tr>
<td>Mother's occupational prestige (1-8)</td>
<td>5.1 2.3</td>
<td>5.2 2.4</td>
</tr>
<tr>
<td>Family income (in thousand $)</td>
<td>27.1 16.2</td>
<td>26.7 15.1</td>
</tr>
<tr>
<td>Number of siblings</td>
<td>2.8 2.1</td>
<td>2.9 2.0</td>
</tr>
<tr>
<td>Support for no-college decision (1-4)</td>
<td>1.8 .9</td>
<td>1.8 .8</td>
</tr>
<tr>
<td>Closest's friend aspirations (1-18)</td>
<td>15.2 2.1</td>
<td>15.2 1.9</td>
</tr>
<tr>
<td>Internal locus of control (4-16)</td>
<td>11.9 2.4</td>
<td>11.8 2.4</td>
</tr>
<tr>
<td>School experience (10-40)</td>
<td>32.0 3.7</td>
<td>31.5 4.1</td>
</tr>
<tr>
<td>Wives' employment (8-32)</td>
<td>22.0 2.9</td>
<td>23.5 3.1</td>
</tr>
<tr>
<td>Occupational aspirations (1-8)</td>
<td>6.8 2.0</td>
<td>6.9 2.1</td>
</tr>
<tr>
<td>Educational aspirations (1-18)</td>
<td>15.7 1.9</td>
<td>15.6 1.8</td>
</tr>
</tbody>
</table>

Note
- X = Mean
- S.D. = Standard deviation
DATA ANALYSIS TECHNIQUES

Males and females are considered separately for the purpose of data analysis. There are two dependent variables in this study: mobility aspirations (downward versus non-downward educational aspirations) and the extent of downward educational aspirations or extent of downward mobility tendency (varied from 1 to 5). To analyze mobility aspirations, log-linear model analysis is first applied by using the BMDP 4F program for multivariate analysis of categorical variables. The first step of the analysis is to test the hypotheses by identifying the significant independent variables at each level of influence -- structural (family background such as social origin and internal family structure), interpersonal relations (significant others' influence), and personality (self-other attitudes) -- that are associated with mobility aspirations (downward versus non-downward). The next step is to develop explanations for the dependent variable by testing models which are based on results obtained in the earlier step using BMDP LR for logistic regression analysis. Original scales of the independent variables, i.e., either continuous or categorical, can be used in logistic analysis.

Multiple regression analysis in two steps is used to analyze the extent of downward educational aspirations
(extent of downward mobility tendency). The first step is to identify the important variables at each level of influence that are associated with the dependent variable. The second step is to formulate an explanation by testing a model consisting of the significant variables selected on the basis of the results obtained in the first step.

**Log-Linear Analysis Procedure**

Log-linear model analysis is a technique in which the parameters for the effects of categorical variables are estimated using a maximum likelihood, iterative, proportional fitting technique. The estimation procedures work with hierarchical models, which require that when a variable is included in a higher order term, all lower order terms involving that variable must be included in the model (Cleary and Angel, 1984). Log-linear analysis is a powerful technique for the multivariate analysis of categorical variables, and it can be used to test whether an effect is produced by an independent variable or through its interaction with other control variables (Kaufman and Schervish, 1986). However, log-linear analysis limits the number of variables that can be handled simultaneously (Kar and Talbot, 1980). The sample size and the skewness of the data in this study limit the maximum number of variables that might be analyzed at one time, in order not to have zero frequencies within the cells, to five.
Separate log-linear analyses are conducted for particular types of independent variables, i.e., social origins (four variables), internal family structure (two variables), significant others' influence (three variables), self attitudes (three variables), and other attitudes (two variables). Each variable has been dichotomized based either on its categorical nature or median value. Variables within each type of independent variable are simultaneously analyzed to see whether they are associated with mobility aspirations and whether there are higher order interaction effects.

The log-linear approach used in this study is the logit model and not the general log-linear model since a dependent variable, mobility aspirations or relative educational aspirations, is specified. According to Knoke and Burke (1980), the logit models of log-linear techniques are useful for categorical variable analysis and analogous to ordinary linear regression techniques that require continuous dependent variables. The correlations among the independent variables are taken into account even though these relationships do not explicitly appear in the regression equation. The criterion analyzed in the logit model is the odds of the expected cell frequencies for the dependent variable. In this study, the odds is the ratio between frequency of being in the downward educational aspirations
category and the frequency of not being in that category. Its interpretation is the chance that an adolescent selected at random will fall into one category rather than another. The log of odds is called the logit.

In log-linear analysis, the pattern of relationships between the dependent and independent variables can be found by choosing the model that best fits the observed data. The results of the analysis concerning the direction and magnitude of independent variable effects are based on the estimated parameter effects and expected cell frequencies of the chosen model. Finding a model that is parsimonious and fits the data are the criteria used for identifying a best fit model. In this study, an acceptable fit is determined by the goodness-of-fit statistic, i.e., when the likelihood ratio chi square ($G^2$ or $L^2$) value is small and not significant at a probability level less than .10. The smaller the $G^2$ value relative to degrees of freedom and the higher the probability value, the lower is the unexplained variation and, thus, the better the fit of the model to the data. The model is parsimonious when it is not necessary to include higher order interaction parameters. When a simpler model yields a small $G^2$ value with a probability level greater than .10, it is interpreted as providing an acceptable fit. If there is more than one acceptable model, the models with different hierarchical interaction effects are
compared to ascertain that the difference in the $G^2$ value ($\Delta G^2$) relative to the difference in degrees of freedom ($\Delta \text{df}$) represents a significant improvement in fit at a significance level of less than .05. To see whether the more complex model is necessary to fit the data, a forward stepwise procedure for model selection is used. The first baseline model of the logit model is the one in which none of the independent variables has a significant relationship with the dependent variable. It is the simplest one which contains interactions among all independent variables and the effect of dependent variable marginals. For example, when $A,B,C$ are the independent variables and $D$ is the dependent variable, the simplest model fits the $(ABC)(D)$ marginal table among these three; it includes the relationships of independent variables not involving the dependent variable. The logit model requires that the marginal table for all independent variables be automatically fitted (Knoke and Burke, 1980) since we are interested in the interaction effects of the dependent variable and independent variable(s).

Specifically, the model selection involves adding in various interactions and observing the resultant drop in value of likelihood ratio chi square ($G^2$) until no effects that could be added yield a significant decrease in $G^2$ value (significant improvement of fit). If the difference in
the $G^2$ of the simpler model and the alternative model is significant, it means that one or more effects of the independent variables or their interactions that have been added in the alternative model must be included in the final model. The more complex relationships that are added in the alternative models reveal the hierarchical structure of the estimation method for log-linear models.

In order to present the direction and magnitude of the relationships between the independent and dependent variables, the beta coefficients (Knoke and Burke, 1980) and odds ratios are calculated. (Beta is two times lambda; lambda, a log-linear parameter estimate, is a natural log of tau, and tau is a multiplicative parameter estimate from the logit model.) As suggested by Knoke and Burke (1980), it is only for dichotomous variable analysis that the single beta coefficients for partial relationship can be interpreted as the effects of independent variables on the log odds of the dependent variable. Moreover, within an analysis, the values of betas can be compared to see the relative importance of the significant independent variables since the values are in the standard form of odds ratio. As Page (1977) suggested, the odds ratios calculated from modeled frequencies (expected cell frequencies) can be used to interpret the magnitude of the effect represented by log-linear effect coefficients (lambdas and taus).
In the case of dichotomous variables, the odds ratios involving two variables measure the increase or decrease in the likelihood of a given value occurring, given the level of the other variable. Log-linear parameters and odds ratios express relative differences in effects because of their mathematical properties (Kaufman and Schervish, 1986). Thus, the interpretations of betas (calculated from log-linear parameter estimates) and odds ratios (calculated from expected cell frequencies or multiplicative parameter estimates) are consistent and useful.
CHAPTER IV

RESULTS

MOBILITY ASPIRATIONS (DOWNWARD VERSUS NON-DOWNWARD)

The major dependent variable is mobility aspirations or relative educational aspirations (downward versus non-downward educational aspirations) which is conceptually dichotomous. Because of the nature of the data set, the number of independent variables, the uneven number of cases for different variables, and the small number of cases in the downward category, data analysis for mobility aspirations is done in two steps. In the first step, all independent variables are dichotomized and several log-linear analyses are conducted for the purpose of testing hypotheses and eliminating insignificant independent variables. (The major advantage of log-linear analysis is that the interaction effects can be tested in model selection procedure.) In the second step, all significant variables identified as a result of the log-linear analyses are included in a model and simultaneously tested by logistic regression analysis. The final model for explaining downward educational aspirations among adolescents is selected by a
stepwise procedure. Since the logistic regression analysis can be applied to both continuous and categorical independent variables, the original scale of measurement of each independent variable is used to maintain its information.

Log-Linear Model Analysis

Social Structural Level

A crosstabulation of dependent and independent variables is the initial step in log-linear model analysis. There are four variables in the social origins category (mother's education, mother's occupation, father's occupation, and family income). Different combinations of these variables are examined to ascertain the effects of social origin variables on mobility aspirations. Two three-way, two four-way, and one five-way log-linear analyses are performed for each gender. (To avoid the complex interpretation, in general the maximum number of variables that are simultaneously tested by log-linear analysis is four.) The first three-way analysis considers father's occupation (O), family income (I), and mobility aspirations (D). As shown in Tables 5 and 6, the best-fitting models are (IO) (DO) for both the male and female samples. (For males and females, respectively, G² = 1.91 and .10; df=2 and 2; p=.39 and .95.) The (IO) (DO) model indicates that the association of mobility aspirations with father's occupation is a
Table 5
Log-Linear Analysis of Father's Occupation (O), Family Income (I), and Mobility Aspirations (D) for Male Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>$G^2$</th>
<th>df</th>
<th>p</th>
<th>Compare to</th>
<th>$G^2$</th>
<th>df</th>
<th>dif.</th>
<th>$G^2$</th>
<th>df</th>
<th>dif.</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 (IO)(D)</td>
<td>7.93</td>
<td>3</td>
<td>.047</td>
<td>_</td>
<td>_</td>
<td>_</td>
<td>_</td>
<td>_</td>
<td>_</td>
<td>_</td>
<td>_</td>
</tr>
<tr>
<td>2 (IO)(DI)</td>
<td>7.41</td>
<td>2</td>
<td>.025</td>
<td>1</td>
<td>.52</td>
<td>1</td>
<td>ns</td>
<td>.014</td>
<td>.014</td>
<td>ns</td>
<td>.014</td>
</tr>
<tr>
<td>*3 (IO)(DO)</td>
<td>1.91</td>
<td>2</td>
<td>.385</td>
<td>1</td>
<td>6.02</td>
<td>1</td>
<td>.014</td>
<td>.014</td>
<td>.014</td>
<td>ns</td>
<td>.014</td>
</tr>
<tr>
<td>4 (IO)(DO)(DI)</td>
<td>1.75</td>
<td>1</td>
<td>.185</td>
<td>3</td>
<td>.16</td>
<td>1</td>
<td>ns</td>
<td>.014</td>
<td>.014</td>
<td>ns</td>
<td>.014</td>
</tr>
<tr>
<td>5 (DIO)</td>
<td>.00</td>
<td>0</td>
<td>1.000</td>
<td>4</td>
<td>1.75</td>
<td>1</td>
<td>ns</td>
<td>.014</td>
<td>.014</td>
<td>ns</td>
<td>.014</td>
</tr>
</tbody>
</table>

* The model is chosen.

Note
dif. = difference
ns = not significant at p<.05
N = 481
Table 6

Log-Linear Analysis of Father's Occupation (O), Family Income (I), and Mobility Aspirations (D) for Female Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>G$^2$</th>
<th>df</th>
<th>p</th>
<th>Compare to G$^2$</th>
<th>df</th>
<th>dif.</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 (IO)(D)</td>
<td>10.78</td>
<td>3</td>
<td>.013</td>
<td>_</td>
<td>_</td>
<td>_</td>
<td>_</td>
</tr>
<tr>
<td>2 (IO)(DI)</td>
<td>10.29</td>
<td>2</td>
<td>.006</td>
<td>1</td>
<td>.49</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>*3 (IO)(DO)</td>
<td>.10</td>
<td>2</td>
<td>.950</td>
<td>1</td>
<td>10.68</td>
<td>1</td>
<td>.001</td>
</tr>
<tr>
<td>4 (IO)(DO)(DI)</td>
<td>.07</td>
<td>1</td>
<td>.797</td>
<td>3</td>
<td>.03</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>5 (DIO)</td>
<td>.00</td>
<td>0</td>
<td>1.000</td>
<td>4</td>
<td>.07</td>
<td>1</td>
<td>ns</td>
</tr>
</tbody>
</table>

* The model is chosen.

Note

dif. = difference
ns = not significant at p<.05
N = 428
simple association, i.e., it does not vary over the level of family income. Moreover, family income has no effect on mobility aspirations.

The results from the odds ratios of mobility aspirations and father's occupation (DO) reveal that the odds of having downward aspirations are greater when fathers have higher-prestige occupations. Male adolescents with higher-prestige fathers are 1.6 times as likely as male adolescents with lower-prestige fathers to have downward aspirations. Considering female adolescents, the odds are twice as great when fathers have higher prestige occupations. The beta coefficients are -.25 for males and -.35 for females.

Since the variables are dichotomous, the results from the odds ratios and beta coefficients can be interpreted to mean that adolescents with downward aspirations are more likely than those with non-downward aspirations to have fathers with higher occupational prestige. These results do not support Hypothesis 1b which posited that adolescents with downward aspirations would be more likely than those with non-downward aspirations to have fathers with lower occupational prestige.

The data analyses involving mother's education (E), mother's occupation (M), and mobility aspirations (D)
reveal that mother's education and mother's occupation are not associated with mobility aspirations for either the male or female samples. As shown in Tables 7 and 8, the best-fitting models are (ME) (D), i.e., the first baseline models. ($G^2 = 2.89$, df=3, $p=.41$ — males; $G^2 = 1.49$, df=3, $p=.69$ — females.)

Table 7

<table>
<thead>
<tr>
<th>Model</th>
<th>$G^2$</th>
<th>df</th>
<th>$p$</th>
<th>Compare $G^2$ to</th>
<th>df</th>
<th>$p$</th>
</tr>
</thead>
<tbody>
<tr>
<td>*1 (ME)(D)</td>
<td>2.89</td>
<td>3</td>
<td>.409</td>
<td>_</td>
<td>_</td>
<td>_</td>
</tr>
<tr>
<td>2 (ME)(DE)</td>
<td>2.88</td>
<td>2</td>
<td>.237</td>
<td>1</td>
<td>.01</td>
<td>1</td>
</tr>
<tr>
<td>3 (ME)(DM)</td>
<td>.88</td>
<td>2</td>
<td>.643</td>
<td>1</td>
<td>2.01</td>
<td>1</td>
</tr>
<tr>
<td>4 (ME)(DM)(DE)</td>
<td>.61</td>
<td>1</td>
<td>.436</td>
<td>3</td>
<td>.27</td>
<td>1</td>
</tr>
<tr>
<td>5 (DME)</td>
<td>.00</td>
<td>0</td>
<td>1.000</td>
<td>4</td>
<td>.61</td>
<td>1</td>
</tr>
</tbody>
</table>

* The model is chosen.

Note

dif. = difference
ns = not significant at $p<.05$
N = 477
Table 8
Log-Linear Analysis of Mother's Education (E), Mother's Occupation (M), and Mobility Aspirations (D) for Female Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>G²</th>
<th>df</th>
<th>p</th>
<th>Compare G² to</th>
<th>df</th>
<th>dif.</th>
<th>df</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>*1 (ME)(D)</td>
<td>1.49</td>
<td>3</td>
<td>.686</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2 (ME)(DE)</td>
<td>.13</td>
<td>2</td>
<td>.938</td>
<td>1</td>
<td>1</td>
<td>.36</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>3 (ME)(DM)</td>
<td>1.11</td>
<td>2</td>
<td>.575</td>
<td>1</td>
<td>1</td>
<td>.38</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>4 (ME)(DM)(DE)</td>
<td>.11</td>
<td>1</td>
<td>.741</td>
<td>3</td>
<td>1</td>
<td>.00</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>5 (DME)</td>
<td>.00</td>
<td>0</td>
<td>1.000</td>
<td>4</td>
<td>.11</td>
<td></td>
<td>1</td>
<td></td>
</tr>
</tbody>
</table>

* The model is chosen.

Note
- dif. = difference
- ns = not significant at p<.05
- N = 468
To further ascertain social origin effects, a four-way analysis involving mother's education (E), father's occupation (O), family income (I), and mobility aspirations (D) is performed for each sex group. Tables 9 and 10 reveal that the best-fitting models are (IOE) (DO) for both the male and female samples. (G² = 6.62 and 2.21, df = 6 and 6, and p = .36 and .90, respectively.) The model indicates that there is only one main effect, father's occupation, and that the effect of father's occupation on mobility aspirations does not vary with mother's education or family income. Neither mother's education nor family income has a main effect. Result from the odds ratios reveals values similar to the previous analysis. The odds of having downward aspirations are 1.6 times greater for males whose fathers have higher-prestige occupations than for males whose fathers have lower-prestige occupations irrespective of the level of mother's education and family income. Considering female adolescents, the odds are twice as great when fathers have higher prestige occupations. (The beta coefficients are -.35 for both the male and female samples.)
Table 9
Log-Linear Analysis of Mother's Education (E), Father's Occupation (O), Family Income (I), and Mobility Aspirations (D) for Male Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>$G^2$</th>
<th>df</th>
<th>p</th>
<th>Compare to</th>
<th>$G^2$</th>
<th>df</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 (IOE)(D)</td>
<td>12.66</td>
<td>7</td>
<td>.081</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2 (IOE)(DE)</td>
<td>12.61</td>
<td>6</td>
<td>.050</td>
<td>1</td>
<td>.05</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>3 (IOE)(DI)</td>
<td>12.35</td>
<td>6</td>
<td>.051</td>
<td>1</td>
<td>.31</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>*4 (IOE)(DO)</td>
<td>6.62</td>
<td>6</td>
<td>.356</td>
<td>1</td>
<td>6.03</td>
<td>1</td>
<td>.014</td>
</tr>
<tr>
<td>5 (IOE)(DO)(DI)</td>
<td>6.59</td>
<td>5</td>
<td>.253</td>
<td>4</td>
<td>.04</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>6 (IOE)(DO)(DE)</td>
<td>6.38</td>
<td>5</td>
<td>.271</td>
<td>4</td>
<td>.24</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>7 (IOE)(DO)(DE)(DI)</td>
<td>6.31</td>
<td>4</td>
<td>.177</td>
<td>4</td>
<td>.31</td>
<td>2</td>
<td>ns</td>
</tr>
<tr>
<td>8 (IOE)(DIO)</td>
<td>4.92</td>
<td>4</td>
<td>.295</td>
<td>4</td>
<td>1.72</td>
<td>2</td>
<td>ns</td>
</tr>
<tr>
<td>9 (IOE)(DOE)</td>
<td>6.23</td>
<td>4</td>
<td>.182</td>
<td>4</td>
<td>.39</td>
<td>2</td>
<td>ns</td>
</tr>
</tbody>
</table>

* The model is chosen.

Note
- dif. = difference
- ns = not significant at p<.05
- N = 469
Table 10

Log-Linear Analysis of Mother's Education (E), Father's Occupation (O), Family Income (I), and Mobility Aspirations (D) for Female Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>$G^2$</th>
<th>df</th>
<th>p</th>
<th>Compare G$^2$ to</th>
<th>df</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 (IOE)(D)</td>
<td>12.81</td>
<td>7</td>
<td>.077</td>
<td>-</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2 (IOE)(DI)</td>
<td>12.09</td>
<td>6</td>
<td>.060</td>
<td>1</td>
<td>.72</td>
<td>1</td>
</tr>
<tr>
<td>3 (IOE)(DE)</td>
<td>11.45</td>
<td>6</td>
<td>.075</td>
<td>1</td>
<td>1.36</td>
<td>1</td>
</tr>
<tr>
<td>*4 (IOE)(DO)</td>
<td>2.21</td>
<td>6</td>
<td>.900</td>
<td>1</td>
<td>10.60</td>
<td>1</td>
</tr>
<tr>
<td>5 (IOE)(DO)(DE)</td>
<td>1.40</td>
<td>5</td>
<td>.924</td>
<td>4</td>
<td>.81</td>
<td>1</td>
</tr>
<tr>
<td>6 (IOE)(DO)(DI)</td>
<td>2.09</td>
<td>5</td>
<td>.836</td>
<td>4</td>
<td>.12</td>
<td>1</td>
</tr>
<tr>
<td>7 (IOE)(DO)(DE)(DI)</td>
<td>1.36</td>
<td>4</td>
<td>.850</td>
<td>4</td>
<td>.85</td>
<td>2</td>
</tr>
<tr>
<td>8 (IOE)(DOE)</td>
<td>.42</td>
<td>4</td>
<td>.981</td>
<td>4</td>
<td>1.79</td>
<td>2</td>
</tr>
<tr>
<td>9 (IOE)(DIO)</td>
<td>1.99</td>
<td>4</td>
<td>.737</td>
<td>4</td>
<td>.22</td>
<td>2</td>
</tr>
</tbody>
</table>

* The model is chosen.

Note

dif. = difference
ns = not significant at p < .05
N = 421
For each sex group, two additional log-linear analyses are conducted, one a four-way involving father's occupation (O), mother's occupation (M), family income (I), and mobility aspirations (D), and the other a five-way that includes all four social origin variables along with the dependent variable. The results from these two analyses are the same. For males, no independent variable effects on mobility aspirations are found (Tables 11 and 13). The best-fitting models are the baseline models: (IMO) (D) for the four-way analysis ($G^2 = 5.04, \text{df}=7, \ p=.65$) and (IMEO) (D) for the five-way analysis ($G^2 = 11.51, \text{df}=15, \ p=.72$). For females (Tables 12 and 14), there is only one main effect and it is the same one that was found earlier, father's occupation. The best-fitting models are (IMO) (DO) for the four-way analysis ($G^2 = 6.99, \text{df}=6, \ p=.32$) and (IMEO) (DO) for the five-way analysis ($G^2 = 18.57, \text{df}=14, \ p=.18$). As before, the association between father's occupation and mobility aspirations does not vary with other independent variables.
Table 11
Log-Linear Analysis of Father's Occupation (O), Mother's Occupation (M), Family Income (I), and Mobility Aspirations (D) for Male Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>$G^2$</th>
<th>df</th>
<th>p</th>
<th>Compare $G^2$ df</th>
<th>dif.</th>
<th>dif.</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>*1 (IMO)(D)</td>
<td>5.04</td>
<td>7</td>
<td>.650</td>
<td>_</td>
<td>_</td>
<td>_</td>
<td>_</td>
</tr>
<tr>
<td>2 (IMO)(DI)</td>
<td>5.02</td>
<td>6</td>
<td>.540</td>
<td>1 .02</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>3 (IMO)(DO)</td>
<td>4.42</td>
<td>6</td>
<td>.620</td>
<td>1 .62</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>4 (IMO)(DM)</td>
<td>2.42</td>
<td>6</td>
<td>.880</td>
<td>1 2.62</td>
<td>1</td>
<td>.10</td>
<td></td>
</tr>
<tr>
<td>5 (IMO)(DO)(DM)</td>
<td>1.63</td>
<td>5</td>
<td>.898</td>
<td>4 .79</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>6 (IMO)(DMO)</td>
<td>.86</td>
<td>4</td>
<td>.930</td>
<td>4 1.56</td>
<td>2</td>
<td>ns</td>
<td></td>
</tr>
</tbody>
</table>

* The model is chosen.

Note

dif. = difference
ns = not significant at p<.05
N = 315
Table 12
Log-Linear Analysis of Father's Occupation (O), Mother's Occupation (M), Family Income (I), and Mobility Aspirations (D) for Female Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>$G^2$</th>
<th>df</th>
<th>p</th>
<th>Compare $G^2$ to df</th>
<th>dif.</th>
<th>df</th>
<th>dif.</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 (IMO)(D)</td>
<td>11.12</td>
<td>7</td>
<td>.130</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2 (IMO)(DM)</td>
<td>11.12</td>
<td>6</td>
<td>.080</td>
<td>1</td>
<td>.00</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>3 (IMO)(DI)</td>
<td>9.94</td>
<td>6</td>
<td>.130</td>
<td>1</td>
<td>1.18</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>5 (IMO)(DO)(DM)</td>
<td>6.98</td>
<td>5</td>
<td>.222</td>
<td>4</td>
<td>.01</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>6 (IMO)(DIO)</td>
<td>4.93</td>
<td>4</td>
<td>.295</td>
<td>4</td>
<td>2.06</td>
<td>2</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>7 (IMO)(DMO)</td>
<td>4.67</td>
<td>4</td>
<td>.323</td>
<td>4</td>
<td>2.32</td>
<td>2</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>8 (IMO)(DMO)(DIO)</td>
<td>1.48</td>
<td>2</td>
<td>.480</td>
<td>4</td>
<td>5.51</td>
<td>4</td>
<td>ns</td>
<td></td>
</tr>
</tbody>
</table>

* The model is chosen.

Note
- dif. = difference
- ns = not significant at $p<.05$
- $N = 297$
Table 13

Log-Linear Analysis of Father's Occupation (O), Mother's Education (E), Mother's Occupation (M), Family Income (I), and Mobility Aspirations (D) for Male Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>(G^2)</th>
<th>df</th>
<th>(p)</th>
<th>(\text{Compare } G^2)</th>
<th>(\text{df})</th>
<th>(\text{diff.})</th>
<th>(\text{dif.})</th>
<th>(p)</th>
</tr>
</thead>
<tbody>
<tr>
<td>*1 (IMEO)(D)</td>
<td>11.51</td>
<td>15</td>
<td>.716</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>2 (IMEO)(DI)</td>
<td>11.43</td>
<td>14</td>
<td>.652</td>
<td>1</td>
<td>.08</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>3 (IMEO)(DM)</td>
<td>10.16</td>
<td>14</td>
<td>.750</td>
<td>1</td>
<td>1.35</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>4 (IMEO)(DE)</td>
<td>10.92</td>
<td>14</td>
<td>.692</td>
<td>1</td>
<td>.59</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>5 (IMEO)(DO)</td>
<td>10.75</td>
<td>14</td>
<td>.706</td>
<td>1</td>
<td>.76</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>6 (IMEO)(DE)(DO)</td>
<td>9.93</td>
<td>13</td>
<td>.699</td>
<td>1</td>
<td>2.58</td>
<td>2</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>7 (IMEO)(DMO)</td>
<td>8.66</td>
<td>12</td>
<td>.731</td>
<td>1</td>
<td>2.85</td>
<td>3</td>
<td>ns</td>
<td></td>
</tr>
</tbody>
</table>

* The model is chosen.

Note

dif. = difference
ns = not significant at \(p<.05\)

\(N = 307\)
Table 14

Log-Linear Analysis of Father's Occupation (O), Mother's Education (E), Mother's Occupation (M), Family Income (I), and Mobility Aspirations (D) for Female Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>$G^2$</th>
<th>df</th>
<th><em>p</em></th>
<th>Compare to</th>
<th>$G^2$</th>
<th>df</th>
<th><em>p</em></th>
</tr>
</thead>
<tbody>
<tr>
<td>1 (IMEO)(D)</td>
<td>23.22</td>
<td>15</td>
<td>.080</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2 (IMEO)(DI)</td>
<td>21.89</td>
<td>14</td>
<td>.081</td>
<td>1</td>
<td>1.33</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>3 (IMEO)(DM)</td>
<td>23.22</td>
<td>14</td>
<td>.057</td>
<td>1</td>
<td>.00</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>4 (IMEO)(DE)</td>
<td>20.26</td>
<td>14</td>
<td>.122</td>
<td>1</td>
<td>2.96</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>*5 (IMEO)(DO)</td>
<td>18.57</td>
<td>14</td>
<td>.182</td>
<td>1</td>
<td>4.66</td>
<td>1</td>
<td>.031</td>
</tr>
<tr>
<td>6 (IMEO)(DO)(DE)</td>
<td>16.25</td>
<td>13</td>
<td>.236</td>
<td>5</td>
<td>2.32</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>7 (IMEO)(DMO)</td>
<td>15.91</td>
<td>12</td>
<td>.195</td>
<td>5</td>
<td>2.66</td>
<td>2</td>
<td>ns</td>
</tr>
</tbody>
</table>

* The model is chosen.

Note

dif. = difference
ns = not significant at p<.05
N = 294
The results from the different contingency-table analyses show that father's occupation is the only single variable in social origins that affects downward aspirations among both males and females, although the results are more consistent in the case of females than in the case of males. Because of its significance, father's occupation will be included in the logistic regression analysis.

Internal family structure is a second type of social structural variable. Three-way log-linear analyses are performed to test the association of mobility aspirations (D) and two internal family structure variables, i.e., family intactness (L) and family size (S). As shown in Table 16, the best-fitting model for the female sample is the first baseline model, (SL) (D). In other words, neither of the internal family structure variables affects mobility aspirations: \( \chi^2 = 5.21, \text{df}=3, p=.16. \) However, as shown in Table 15, the best-fitting model for the male sample is (SL) (DL) which specifies that family intactness has a main effect on mobility aspirations. There is no third order interaction: \( \chi^2 = 3.51, \text{df}=2, p=.17. \) The odds ratio of family intactness and mobility aspirations (DL) reveals that the odds of having downward aspirations are about one and a half times higher for males who have lived in a non-intact family than for those who have lived in an intact family, irrespective of family size. The beta coefficient is .19.
In sum, the results show that family intactness affects mobility aspirations among males. Neither of the internal family structure variables is relevant to the mobility aspirations of females. This means that there is partial support for Hypothesis 1e regarding the relationship of family intactness and mobility aspirations. Family intactness, therefore, will be included in the logistic regression analysis for the male sample. Hypothesis 1f regarding the effect of family size on adolescent mobility aspirations is not supported.
Table 15
Log-Linear Analysis of Family Intactness (L), Family Size (S), and Mobility Aspirations (D) for Male Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>$G^2$</th>
<th>df</th>
<th>p</th>
<th>Compare</th>
<th>$G^2$</th>
<th>df</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 (SL)(D)</td>
<td>7.38</td>
<td>3</td>
<td>.061</td>
<td>_</td>
<td>_</td>
<td>_</td>
<td>_</td>
</tr>
<tr>
<td>2 (SL)(DS)</td>
<td>6.65</td>
<td>2</td>
<td>.036</td>
<td>1</td>
<td>.72</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>*3 (SL)(DL)</td>
<td>3.51</td>
<td>2</td>
<td>.173</td>
<td>1</td>
<td>3.87</td>
<td>1</td>
<td>.049</td>
</tr>
<tr>
<td>4 (SL)(DL)(DS)</td>
<td>2.78</td>
<td>1</td>
<td>.095</td>
<td>3</td>
<td>.73</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>5 (DSL)</td>
<td>.00</td>
<td>0</td>
<td>1.000</td>
<td>3</td>
<td>3.51</td>
<td>2</td>
<td>ns</td>
</tr>
</tbody>
</table>

* The model is chosen.

Note
- dif. = difference
- ns = not significant at p<.05
- N = 782
Table 16

Log-Linear Analysis of Family Intactness (L), Family Size (S), and Mobility Aspirations (D) for Female Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>$G^2$</th>
<th>df</th>
<th>p</th>
<th>Compare $G^2$ to</th>
<th>df</th>
<th>dif.</th>
<th>df</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 (SL)(D)</td>
<td>5.21</td>
<td>3</td>
<td>.157</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>2 (SL)(DL)</td>
<td>5.21</td>
<td>2</td>
<td>.074</td>
<td>1</td>
<td>.00</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>3 (SL)(DS)</td>
<td>4.83</td>
<td>2</td>
<td>.089</td>
<td>1</td>
<td>.39</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>4 (SL)(DL)(DS)</td>
<td>4.83</td>
<td>1</td>
<td>.028</td>
<td>1</td>
<td>.38</td>
<td>2</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>5 (DSL)</td>
<td>.00</td>
<td>0</td>
<td>1.000</td>
<td>1</td>
<td>5.21</td>
<td>3</td>
<td>ns</td>
<td></td>
</tr>
</tbody>
</table>

* The model is chosen.

Note

- dif. = difference
- ns = not significant at p<.05
- $N = 724$
Interpersonal Relations Level

At the interpersonal relations level, there are three variables assessing significant others' influence. They include best friend's educational aspirations (B), most significant other identification (W), and perceived approval for a downward educational goal from the most significant other (N). The four-way log-linear analysis (the three independent variables and mobility aspirations) was conducted separately for the male and female samples. As the results show in Tables 17 and 18, the best-fitting model for males is (NWB) (DB) (DN), while the best-fitting model for females is (NWB) (DB) (DN) (DW). ($G^2 = 8.00$, df=5, $p=.16$ — males; $G^2 = 1.07$, df=4, $p=.90$ — females.) No other third order interactions are necessary to be added in the models to fit the data.

The (NWB) (DB) (DN) model for males specifies that mobility aspirations are contingent on the best friend's educational aspirations as well as the perceived approval for a non-normative educational goal and that each has a separate effect. The most significant other identification (i.e., whether parent was identified as the most significant other for major life decisions) is unrelated to mobility aspirations.
The odds ratios reveal that the odds of downward aspirations for male adolescents whose best friends have low educational aspirations (desire less than a four-year college education) are about three times larger than they are for male adolescents whose best friends have high educational aspirations, independent of perceived support and most significant other identification. Male adolescents with perceived approval from the most significant other for a downward educational goal (not going to college) are about three and a half times as likely as those who lack that support to have downward aspirations, irrespective of whether the most significant other is a parent, and whether the best friend has low or high educational aspirations.

The odds ratios and the beta coefficients (.62 for support and .57 for best friend) indicate that the positive effect of perceived approval on downward aspirations is slightly stronger than the effect of having the best friend with low educational aspirations. Both variables, however, increase the likelihood that male adolescents will have downward aspirations.

Within the female sample, the best fitting model is (NWB) (DB) (DN) (DW). This means that all of the variables at the interpersonal relations level, i.e., best friend's educational aspirations, perceived approval for a downward
educational goal, and the most significant other identifi-
cation have main effects on mobility aspirations. There
are no third-order interaction effects. The odds ratios
reveal that the odds of downward aspirations for female
adolescents whose best friend has low educational aspira-
tions are about two and a half times larger than the odds
for those whose best friend has high educational aspira-
tions, irrespective of perception of support and most sig-
nificant other identification. The odds of downward aspi-
rations are almost two times higher for female adolescents
who chose a non-parent as the most significant other than
for those who chose a parent as the most important person
in their major life decisions, irrespective of the level of
best friend's educational aspirations and perceived support
for an educational goal. Female adolescents who perceive
approval for a low educational goal are almost three times
as likely as those that do not perceive approval to have
downward aspirations, regardless of best friend's educa-
tional aspiration level and most significant other identi-
fication.

The results from the beta coefficients are consistent
with those from the odds ratios. That is, of the three main
effects, the relative importance of choosing the non-parent
as the most significant other (beta=.34) is the least pro-
nounced. Perceiving approval for a non-normative
educational goal has a slightly stronger effect (beta=.50) than best friend's educational aspirations (beta=.44).

In sum, the results for the female sample fully support all three hypotheses regarding the influence of interpersonal relations on adolescents' downward aspirations. Downward adolescents are more likely than the non-downward ones to have a best friend with low educational aspirations, to perceive approval for a non-normative educational goal from their most significant other, and to consider someone other than a parent as the most significant other for their major life decisions. The results from male sample support two of the three hypotheses on the influence of interpersonal relations. The identification of parent versus other as the most significant other is not associated with downward aspirations among male adolescents. For both the male and female samples, the effect of perceived approval is slightly more pronounced than is best friend's educational aspirations. All of the significant variables at the interpersonal relations level will be included in the logistic regression analysis.
Table 17

Log-Linear Analysis of Best Friend's Educational Aspirations (B), the Most Significant Other (W), Support (N), and Mobility Aspirations (D) for Male Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>$G^2$</th>
<th>df</th>
<th>$p$</th>
<th>Compare $G^2$ to dif.</th>
<th>df</th>
<th>dif.</th>
<th>$p$</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 (NWB)(D)</td>
<td>71.25</td>
<td>7</td>
<td>.000</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>2 (NWB)(DW)</td>
<td>62.63</td>
<td>6</td>
<td>.000</td>
<td>1</td>
<td>8.63</td>
<td>1</td>
<td>.003</td>
</tr>
<tr>
<td>3 (NWB)(DN)</td>
<td>33.24</td>
<td>6</td>
<td>.000</td>
<td>1</td>
<td>38.01</td>
<td>1</td>
<td>.000</td>
</tr>
<tr>
<td>4 (NWB)(DB)</td>
<td>31.54</td>
<td>6</td>
<td>.000</td>
<td>1</td>
<td>39.71</td>
<td>1</td>
<td>.000</td>
</tr>
<tr>
<td>*5 (NWB)(DB)(DN)</td>
<td>8.00</td>
<td>5</td>
<td>.160</td>
<td>4</td>
<td>23.54</td>
<td>1</td>
<td>.000</td>
</tr>
<tr>
<td>6 (NWB)(DB)(DN)(DW)</td>
<td>6.94</td>
<td>4</td>
<td>.139</td>
<td>5</td>
<td>1.06</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>7 (NWB)(DNB)</td>
<td>5.66</td>
<td>4</td>
<td>.226</td>
<td>5</td>
<td>2.34</td>
<td>1</td>
<td>ns</td>
</tr>
<tr>
<td>8 (NWB)(DWB)(DW)</td>
<td>4.80</td>
<td>3</td>
<td>.187</td>
<td>5</td>
<td>3.20</td>
<td>2</td>
<td>ns</td>
</tr>
<tr>
<td>9 (NWB)(DNW)(DB)</td>
<td>4.26</td>
<td>3</td>
<td>.234</td>
<td>5</td>
<td>2.68</td>
<td>2</td>
<td>ns</td>
</tr>
<tr>
<td>10 (NWB)(DWB)(DN)</td>
<td>6.2</td>
<td>3</td>
<td>.102</td>
<td>5</td>
<td>.74</td>
<td>2</td>
<td>ns</td>
</tr>
</tbody>
</table>

* The model is chosen.

Note

dif. = difference
ns = not significant at $p<.05$

$N = 455$
Table 18

Log-Linear Analysis of Best Friend's Educational Aspirations (B), the Most Significant Other (W), Support (N), and Mobility Aspirations (D) for Female Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>G²</th>
<th>df</th>
<th>p</th>
<th>Compare G² to</th>
<th>df</th>
<th>dif.</th>
<th>df</th>
<th>dif.</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 (NWB)(D)</td>
<td>41.71</td>
<td>7</td>
<td>.000</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2 (NWB)(DW)</td>
<td>33.35</td>
<td>6</td>
<td>.000</td>
<td>1</td>
<td>8.36</td>
<td>1</td>
<td>.000</td>
<td></td>
<td></td>
</tr>
<tr>
<td>3 (NWB)(DN)</td>
<td>23.99</td>
<td>6</td>
<td>.001</td>
<td>1</td>
<td>17.72</td>
<td>1</td>
<td>.000</td>
<td></td>
<td></td>
</tr>
<tr>
<td>4 (NWB)(DB)</td>
<td>20.94</td>
<td>6</td>
<td>.002</td>
<td>1</td>
<td>20.78</td>
<td>1</td>
<td>.000</td>
<td></td>
<td></td>
</tr>
<tr>
<td>5 (NWB)(DB)(DN)</td>
<td>8.14</td>
<td>5</td>
<td>.149</td>
<td>4</td>
<td>12.80</td>
<td>1</td>
<td>.000</td>
<td></td>
<td></td>
</tr>
<tr>
<td>*6 (NWB)(DB)(DN)(DW)</td>
<td>1.07</td>
<td>4</td>
<td>.900</td>
<td>5</td>
<td>7.07</td>
<td>1</td>
<td>.005</td>
<td></td>
<td></td>
</tr>
<tr>
<td>7 (NWB)(DNW)(DB)</td>
<td>1.04</td>
<td>3</td>
<td>.792</td>
<td>6</td>
<td>.03</td>
<td>1</td>
<td>ns</td>
<td></td>
<td></td>
</tr>
<tr>
<td>8 (NWB)(DWB)(DN)</td>
<td>.09</td>
<td>3</td>
<td>.992</td>
<td>6</td>
<td>.08</td>
<td>1</td>
<td>ns</td>
<td></td>
<td></td>
</tr>
<tr>
<td>9 (NWB)(DNB)(DW)</td>
<td>1.07</td>
<td>3</td>
<td>.785</td>
<td>6</td>
<td>.00</td>
<td>1</td>
<td>ns</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

* The model is chosen.

Note

dif. = difference
ns = not significant at p<.05
N = 393
Personality Level

To test the hypotheses that specify relationships between self-attitudes and mobility aspirations, two separate four-way log-linear analyses are performed for the male and female samples. The four variables are occupational prestige aspirations or career preference (A), internal locus of control (R), timing of marriage (Y), and mobility aspirations (D). As shown in Table 19, the best fitting model for males is (ARY) (DA) (DR); it specifies that the associations of mobility aspirations with occupational preference and internal locus of control are in a simple association, i.e., not varying over the third variable; there are only two main effects. The likelihood ratio chi-square, $G^2$, is 3.30, $df=5$, $p=.65$.

The odds ratio calculation reveals that the odds of having downward aspirations are 2.7 times higher among male adolescents who prefer a low prestige occupation than among male adolescents who indicate a high occupational prestige preference, independent of the locus of control level and the timing of marriage (DA). The odds ratios (DR) show that male adolescents with a low level of internal locus of control are about one and a half times more likely than those who have a high level of internal locus of control to have downward aspirations, irrespective of the level of occupational prestige aspirations and timing of marriage.
The beta coefficients, beta=.50 for occupational prestige aspiration and beta=.20 for internal locus of control, indicate that preference for a lower prestige occupation has a more pronounced effect on downward aspirations than low internal locus of control. (This result is the same as that from the odds ratios.) In short, given either the preference for a lower prestige occupation or the possession of a lower level of internal locus of control, the likelihood increases that male adolescents will have downward aspirations.

In females, as shown in Table 20, the best fitting model is (ARY) (DA) (DY) (DR) which specifies that there are three variables that have main effects on mobility aspirations: occupational preference, timing of marriage, and internal locus of control. (G²= 1.63, df=4, p=.80.) The odds ratios reveal that the odds of having downward aspirations are three times larger among female adolescents who indicate a low occupational prestige preference than among those who indicate a high occupational prestige preference, irrespective of locus of control level and timing of marriage. Female adolescents who desire to marry at an earlier age (younger than 25 years of age) are almost two times as likely than those who do not want to marry before 25 to have downward aspirations, independent of the levels of occupational prestige preference and locus of control.
Moreover, female adolescents with a lower internal locus of control level are about one and a half times as likely as those with a higher internal locus of control level to have downward aspirations, irrespective of occupational preference and timing of marriage.

The results from the beta coefficients confirm those from the odds ratios. Of the three main effects, low internal locus of control level (beta=.23) has the least pronounced effect. The variable, low occupational prestige aspirations has a stronger effect (beta=.54) than does the effect of preferring to marry at an earlier age (beta=.32).

The results from the female sample fully support all three hypotheses about the relationships between self-attitudes and downward aspirations among adolescents. The downward adolescents are more likely than the non-downward ones to have low occupational aspirations, to have a low level of internal locus of control, and to plan to marry at a younger age. The results from the male sample support two of three hypotheses regarding the effects of self-attitudes. Preferred age of marriage is the one variable that is not relevant to downward aspirations among male adolescents. In both the male and female samples, the main effect of occupational preference is more pronounced than that of locus of control.
Table 19

Log-Linear Analysis of Occupational Aspirations (A), Internal Locus of Control (R), Timing of Marriage (Y), and Mobility Aspirations (D) for Male Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>$G^2$</th>
<th>df</th>
<th>$p$</th>
<th>Compare $G^2$ to</th>
<th>df</th>
<th>$p$</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 (ARY)(D)</td>
<td>39.63</td>
<td>7</td>
<td>.000</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>2 (ARY)(DY)</td>
<td>39.26</td>
<td>6</td>
<td>.000</td>
<td>1</td>
<td>.37</td>
<td>1</td>
</tr>
<tr>
<td>3 (ARY)(DR)</td>
<td>33.93</td>
<td>6</td>
<td>.000</td>
<td>1</td>
<td>5.70</td>
<td>1</td>
</tr>
<tr>
<td>4 (ARY)(DA)</td>
<td>7.95</td>
<td>6</td>
<td>.242</td>
<td>1</td>
<td>31.68</td>
<td>1</td>
</tr>
<tr>
<td>*5 (ARY)(DA)(DR)</td>
<td>3.30</td>
<td>5</td>
<td>.653</td>
<td>4</td>
<td>4.65</td>
<td>1</td>
</tr>
<tr>
<td>6 (ARY)(DA)(DR)(DY)</td>
<td>2.56</td>
<td>4</td>
<td>.634</td>
<td>5</td>
<td>.74</td>
<td>1</td>
</tr>
<tr>
<td>7 (ARY)(DAR)</td>
<td>2.63</td>
<td>4</td>
<td>.621</td>
<td>5</td>
<td>.67</td>
<td>1</td>
</tr>
<tr>
<td>8 (ARY)(DAR)(DY)</td>
<td>1.86</td>
<td>3</td>
<td>.602</td>
<td>5</td>
<td>1.44</td>
<td>2</td>
</tr>
<tr>
<td>9 (ARY)(DAR)(DRY)</td>
<td>1.54</td>
<td>2</td>
<td>.785</td>
<td>5</td>
<td>1.76</td>
<td>3</td>
</tr>
</tbody>
</table>

* The model is chosen.

Note

dif. = difference
ns = not significant at $p<.05$
N = 664
Table 20

Log-Linear Analysis of Occupational Aspirations (A), Internal Locus of Control (R), Timing of Marriage (Y), and Mobility Aspirations (D) for Female Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>$G^2$</th>
<th>df</th>
<th>p</th>
<th>Compare $G^2$ to</th>
<th>df</th>
<th>dif.</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 (ARY)(D)</td>
<td>43.28</td>
<td>7</td>
<td>.000</td>
<td>_</td>
<td></td>
<td>_</td>
<td>_</td>
</tr>
<tr>
<td>2 (ARY)(DR)</td>
<td>37.25</td>
<td>6</td>
<td>.000</td>
<td>1</td>
<td>6</td>
<td>.03</td>
<td>1</td>
</tr>
<tr>
<td>3 (ARY)(DY)</td>
<td>31.83</td>
<td>6</td>
<td>.000</td>
<td>1</td>
<td>11</td>
<td>.44</td>
<td>1 .001</td>
</tr>
<tr>
<td>4 (ARY)(DA)</td>
<td>13.55</td>
<td>6</td>
<td>.035</td>
<td>1</td>
<td>29</td>
<td>.73</td>
<td>1 .000</td>
</tr>
<tr>
<td>5 (ARY)(DA)(DR)</td>
<td>9.70</td>
<td>5</td>
<td>.084</td>
<td>4</td>
<td>3</td>
<td>.85</td>
<td>1 .050</td>
</tr>
<tr>
<td>6 (ARY)(DA)(DY)</td>
<td>5.72</td>
<td>5</td>
<td>.334</td>
<td>4</td>
<td>7</td>
<td>.83</td>
<td>1 .005</td>
</tr>
<tr>
<td>7 (ARY)(DA)(DY)(DR)</td>
<td>1.63</td>
<td>4</td>
<td>.803</td>
<td>6</td>
<td>4</td>
<td>.09</td>
<td>1 .043</td>
</tr>
<tr>
<td>8 (ARY)(DAY)(DR)</td>
<td>1.63</td>
<td>3</td>
<td>.652</td>
<td>7</td>
<td>.00</td>
<td>1 ns</td>
<td></td>
</tr>
<tr>
<td>9 (ARY)(DAR)(DY)</td>
<td>.88</td>
<td>3</td>
<td>.829</td>
<td>7</td>
<td>.75</td>
<td>1 ns</td>
<td></td>
</tr>
<tr>
<td>10(ARY)(DRY)(DA)</td>
<td>1.29</td>
<td>3</td>
<td>.732</td>
<td>7</td>
<td>.34</td>
<td>1 ns</td>
<td></td>
</tr>
</tbody>
</table>

* The model is chosen.

Note

dif. = difference
ns = not significant at p<.05
N = 479
Turning to "other" attitudes, three-way log-linear analyses of attitude toward school experience (C), attitude toward employment of wives (G), and mobility aspirations (D) are carried out separately for the male and female samples. As shown in Tables 21 and 22, the best-fitting model for both samples is (GC) (D), the first baseline model. \( G^2 = 3.38, \text{df}=3, p=.34 \) — males; \( G^2 = .57, \text{df}=3, p=.90 \) — females.) The (GC) (D) model indicates that mobility aspirations are not associated with any of the "other" attitude variables. Having negative attitudes toward school experience and toward change in traditional sex-roles are not related to downward aspirations among adolescents. Hypotheses 3d and 3e, then, are not confirmed by the data.

Based on the log-linear analysis, it can be concluded that mobility aspirations or relative educational aspirations (downward versus non-downward), whether in males or females, are associated with much the same set of variables. In both samples, adolescents with downward aspirations are more likely than the non-downward ones to have a father with higher levels of occupational prestige, a best friend with low educational aspirations, perceived support for a low educational goal, low occupational prestige aspirations, and a low level of internal locus of control. The sex differences in the results are that family intactness is relevant to mobility aspirations in males only, whereas
Table 21
Log-Linear Analysis of Attitude toward School Experiences (C), Attitude toward Wives' Employment (G), and Mobility Aspirations (D) for Male Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>$G^2$</th>
<th>df</th>
<th>p</th>
<th>Compare $G^2$ to</th>
<th>df</th>
<th>dif.</th>
<th>dif.</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>*1 (GC)(D)</td>
<td>3.38</td>
<td>3</td>
<td>.336</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>2 (GC)(DG)</td>
<td>2.53</td>
<td>2</td>
<td>.283</td>
<td>1</td>
<td>.86</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>3 (GC)(DC)</td>
<td>1.62</td>
<td>2</td>
<td>.444</td>
<td>1</td>
<td>1.76</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>4 (GC)(DC)(DG)</td>
<td>.84</td>
<td>1</td>
<td>.358</td>
<td>3</td>
<td>.78</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>5 (DGC)</td>
<td>.00</td>
<td>0</td>
<td>1.000</td>
<td>4</td>
<td>.84</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
</tbody>
</table>

* The model is chosen.

Note

dif. = difference

ns = not significant at p<.05

N = 469
Table 22

Log-Linear Analysis of Attitude toward School Experiences (C), Attitude toward Wives' Employment (G), and Mobility Aspirations (D) for Female Sample

<table>
<thead>
<tr>
<th>Model</th>
<th>$G^2$</th>
<th>df</th>
<th>p</th>
<th>Compare $G^2$</th>
<th>df</th>
<th>dif.</th>
<th>dif.</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>*1 (GC)(D)</td>
<td>.57</td>
<td>3</td>
<td>.902</td>
<td>—</td>
<td></td>
<td>—</td>
<td>—</td>
<td>—</td>
</tr>
<tr>
<td>2 (GC)(DG)</td>
<td>.54</td>
<td>2</td>
<td>.762</td>
<td>1</td>
<td>.11</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>3 (GC)(DC)</td>
<td>.46</td>
<td>2</td>
<td>.795</td>
<td>1</td>
<td>.03</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>4 (GC)(DC)(DG)</td>
<td>.43</td>
<td>1</td>
<td>.514</td>
<td>3</td>
<td>.03</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
<tr>
<td>5 (DGC)</td>
<td>.00</td>
<td>0</td>
<td>1.000</td>
<td>4</td>
<td>.42</td>
<td>1</td>
<td>ns</td>
<td></td>
</tr>
</tbody>
</table>

* The model is chosen.

Note
- dif. = difference
- ns = not significant at $p < .05$
- $N = 412$
the most significant other identification (parent versus non-parent) and timing of marriage are associated with mobility aspirations among female adolescents only.

**Logistic Regression Analysis**

The purpose of the second step of the analysis is to find the model that best explains downward educational aspirations among adolescents using logistic regression analysis. The log-linear analysis served to identify significant variables within each of the three levels of influence -- social structural, interpersonal relations, and personality. The advantage of log-linear analysis over logistic regression analysis is that interaction effects can be observed. However, all of the variables in the study could not be handled simultaneously with log-linear analysis due to the limit on number of independent variables imposed by this technique. It should be noted that all of the variables found to be significant in the log-linear analysis are included in the logistic regression analysis.

Maximum likelihood logistic regression analysis yields consistent estimates of parameters and is appropriate whether the data distributed multivariate normally or not. When the dependent variable is dichotomous and the independent variables are continuous and/or categorical, logistic
regression is preferable to ordinary least squares (OLS) regression (Cleary and Angel, 1984). The original scales of measurement of the independent variables in this study can be used in logistic regression analysis. All of significant variables from the first step of analysis were included in a model to test their impacts on mobility aspirations (downward or not) at the value of P which represents the actual proportion of the sample having downward aspirations (at mean of dependent variable).

The best fit and most parsimonous model is selected using a stepwise procedure. The suppression effects of the coefficients are checked. The changes in the magnitudes of the Likelihood Ratio Statistic (LRS) and the Pseudo $R^2$ are compared as variables are added or deleted. Improvement of fit is evaluated by comparing the LRS and Pseudo $R^2$ of various equations. The stepwise procedure for model selection and the final model are presented in Tables 23 and 25.

The logit coefficient ($B_x$) for each independent variable represents the magnitude of increment to the log odds of having downward aspirations associated with a unit change in the independent variable. To facilitate the interpretation of the logit coefficients, they have been transformed into proportional effects, i.e., the predicted change in the proportion of cases falling into category 1 (downward)
rather than category 0 (non-downward) for a unit change in the independent variable. Therefore, the estimates of change in the probability ($\Delta P$) of having downward aspirations resulting from a unit change in the independent variable, evaluated at the point at which the dependent variable takes on the value of $P$, were computed. According to Peterson (1985), the correct formula, is:

$$\Delta P = \frac{\exp(L_1)}{1+\exp(L_1)} - \frac{\exp(L_0)}{1+\exp(L_0)} \quad (1)$$

where $L_0$ is the logit before the unit change in the independent variable ($X_j$): $L_0 = \ln(P/(1-P))$;
$L_1$ is the logit after the unit change in $X_j$:
$L_1 = L_0 + B_j$;

Logit ($L$) is the logarithm of the odds ratio;
$\exp$ is exponentiation.

Since the magnitude of the logit coefficients and the associated t-values are not standardized values, they do not indicate order of importance for the independent variables. The semi-standardized changes in the probabilities (the semi-standardized $\Delta P$), which are based on the logit coefficients and the standard deviations corresponding to each variable, are computed to determine the relative importance of the independent variables in the final model. (The formula for the logit after the unit change in the independent variable, $L_1$, then, is $L_0 + B_j + S_j$, and the semi-
standardized $\Delta P$ is calculated in the same way as the $\Delta P$.
The results with respect to the logit coefficients, t-values, estimated change in probability, and semi-standardized change in probability for the variables in the final models are presented in Tables 24 and 26.

Table 24 reports the best fit and most parsimonous model for male adolescents' downward aspirations. Significant effects, in order of importance, are father's occupation, perceived support for a downward educational goal from the most significant other, occupational preference, best friend's educational aspirations and family intactness. Internal locus of control is not included in the final model since it does not significantly affect downward aspirations when other variables are controlled in the baseline model, as shown in Table 23. Results from the $\Delta P$, the estimated change in probability of having downward aspirations for a unit change in an independent variable evaluated at the sample mean on the dependent variable, indicate that, among male adolescents, a unit increase in father's occupational prestige (1-8 scale) increases the probability of having downward aspirations by six percent, when the effects of other independent variables are held constant. A unit increase in the four-point scale of the perceived approval from the most significant other for a downward educational goal increases the probability of having
downward aspirations by thirteen percent. A unit decrement in the eight-point scale for occupational preference increases the probability of having downward aspirations by five percent. A year decrease in educational aspirations of the best friend increases the probability of having downward aspirations by four percent. And, the disadvantage of having lived in a non-intact family as opposed to an intact family (with both parents) is reflected in the seventeen percent greater probability of having downward aspirations, after controlling for the effects of other variables.

The semi-standardized change in probability assesses the predicted change in the probability of having downward aspirations that is associated with the change in one standard deviation of the independent variable. This figure is used to evaluate the relative importance of the independent variables. It is found that father's occupation has the strongest effect, followed by the effect of perceived support, occupational preference and best friends' educational aspirations, respectively. Family intactness has the least effect on downward aspirations among male adolescents. The semi-standardized change in probability can be interpreted as meaning that one standard deviation change in father's occupation, for example, is associated with a thirteen percent increase in the probability of having downward aspirations.
Tables 25 and 26 show that the best fit and most parsimonous model for female adolescents' downward aspirations contain four significant effects; ranked in order of importance, they are father's occupation, best friend's educational aspirations, occupational preference, and most significant other. Internal locus of control, perceived support and timing of marriage are excluded from the final model since their effects on downward aspirations are not highly significant when other variables are included in the model, as shown in Table 25.

Results from the estimated change in probability (ΔP) reveal that, among female adolescents, a unit increase in the father's occupational prestige increases the probability of having downward aspirations by seven percent, when controlling for other variables. A unit decrement in the best friend's educational aspirations and a unit decrement in the occupational aspirations increase the probability of having downward aspirations by five and four percent, respectively, when other variables are held constant. In addition, having a non-parent as the most significant other increases the probability of having downward aspirations by twelve percent.

In the case of both males and females, the first three independent variables, ranked according to relative
importance, represent different levels of influence: social structural, interpersonal relations, and personality. At the social structural level, having fathers with more prestigious occupations, instead of reducing the likelihood of downward aspirations, increases it. The results suggest that downward educational aspirations are not the same as low educational aspirations; downwardly aspiring adolescents tend not to come from a socioeconomically disadvantaged background; as revealed in aspiration studies, low aspiring adolescents do. At the interpersonal relations level, perceived support for a downward educational goal is the second most crucial variable affecting downward aspirations among males; best friend's educational aspirations have the second strongest impact on the downward aspirations of females. At the personality level, lower occupational prestige aspirations are strongly associated with downward aspirations in both the male and female samples. The fourth significant variable also is at the interpersonal relations level: among males, it is best friend's educational aspirations; among females, it is the most significant other. It can be concluded that significant others' influence is a major factor in the downward mobility aspirations that characterize some adolescents.
Table 23
Model Selection for Male Sample Using Logistic Regression Analysis

<table>
<thead>
<tr>
<th>Model</th>
<th>LRS</th>
<th>df</th>
<th>LRS</th>
<th>df</th>
<th>dif.</th>
<th>dif.</th>
<th>R²</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 FAOC SUPP OCPR BASP FAMI LOCO</td>
<td>73.497*</td>
<td>6</td>
<td>-</td>
<td>-</td>
<td>.174</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2 FAOC SUPP OCPR BASP FAMI</td>
<td>72.221*</td>
<td>5</td>
<td>1.276</td>
<td>1</td>
<td>.171</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Log Likelihood of model,

- \( \ln L \) model 1 = -165.884
- \( \ln L \) model 2 = -166.522
- \( \ln L \) null = -202.632

* The Chi-square is significant at \( p < .001 \), two-tailed prob.

Note
- Likelihood Ratio Statistic (LRS) = \(-2(\ln L \text{ null} - \ln L \text{ model})\)
- \( \ln L \) null = \(N1[ \ln(N1/N1+N2)] + N2[ \ln(N2/N1+N2)]\)
- Pseudo \( R^2 \) = \(LRS/N+LRS\)
- FAOC = Father's Occupation
- SUPP = Perceived Support
- OCPR = Occupational Aspirations
- BASP = Best Friend's Educational Aspirations
- FAMI = Family Intactness
- LOCO = Internal Locus of Control
Table 24

Effects of Social Structural, Interpersonal Relation and Personality Variables on Downward Educational Aspirations: Results on the Logistic Regression Analysis (Final Model)
For Male Sample

<table>
<thead>
<tr>
<th>Independent Variables (I.V.)</th>
<th>S.D. (Sx)</th>
<th>Logit coefficient (Bx)</th>
<th>T-Ratio* (Δ P)</th>
<th>Change in Probability (Δ P)</th>
<th>Semi-Standardized of A P I.V.</th>
<th>Rank</th>
</tr>
</thead>
<tbody>
<tr>
<td>FAOC</td>
<td>2.120</td>
<td>.277</td>
<td>3.682</td>
<td>.057</td>
<td>.129</td>
<td>1</td>
</tr>
<tr>
<td>SUPP</td>
<td>.883</td>
<td>.590</td>
<td>3.603</td>
<td>.129</td>
<td>.113</td>
<td>2</td>
</tr>
<tr>
<td>OCPR</td>
<td>1.928</td>
<td>-.289</td>
<td>-3.917</td>
<td>-.053</td>
<td>-.094</td>
<td>3</td>
</tr>
<tr>
<td>BASP</td>
<td>2.057</td>
<td>-.241</td>
<td>-3.553</td>
<td>-.044</td>
<td>-.085</td>
<td>4</td>
</tr>
<tr>
<td>FAMI</td>
<td>.364</td>
<td>-1.226</td>
<td>-3.394</td>
<td>-.170</td>
<td>-.078</td>
<td>5</td>
</tr>
<tr>
<td>Constant</td>
<td>2.757</td>
<td>2.390</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

N = 350; P = .266
Log Likelihood = -166.522
Likelihood Ratio Statistic (LRS) = 72.221
Degrees of Freedom = 5
Pseudo R² = .171

* All logit coefficients are significant at P<.05, two-tailed t-test

Note
FAOC = Father's Occupation
SUPP = Perceived Support
OCPR = Occupational Aspirations
BASP = Best Friend's Educational Aspirations
FAMI = Family Intactness
LOCO = Internal Locus of Control
Table 25

Model Selection for Female Sample Using Logistic Regression Analysis

<table>
<thead>
<tr>
<th>Model</th>
<th>LRS</th>
<th>df</th>
<th>dif.</th>
<th>dif. R²</th>
<th>Pseudo R²</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>40.490*</td>
<td>7</td>
<td>.148</td>
<td>.148</td>
<td></td>
</tr>
<tr>
<td>2</td>
<td>40.456*</td>
<td>6</td>
<td>.034</td>
<td>.147</td>
<td></td>
</tr>
<tr>
<td>3</td>
<td>40.372*</td>
<td>5</td>
<td>.084</td>
<td>.147</td>
<td></td>
</tr>
<tr>
<td>4</td>
<td>38.034*</td>
<td>4</td>
<td>2.338</td>
<td>.140</td>
<td></td>
</tr>
</tbody>
</table>

Log Likelihood of model,  
\[ \ln L \text{ model 1} = -118.012 \]  
\[ \ln L \text{ model 2} = -118.029 \]  
\[ \ln L \text{ model 3} = -118.071 \]  
\[ \ln L \text{ model 4} = -119.240 \]  
\[ \ln L \text{ null} = -138.257 \]

* The Chi-square is significant at p<.001, two-tailed prob.

Note

Likelihood Ratio Statistic (LRS) = \(-2(\ln L \text{ null} - \ln L \text{ model})\)

\[ \ln L \text{ null} = N_1 \left( \ln N_1 / (N_1 + N_2) \right) + N_2 \left( \ln N_2 / (N_1 + N_2) \right) \]

Pseudo R² = \( \frac{LRS}{N + LRS} \).

FAOC = Father's Occupation
BASP = Best Friend's Educational Aspirations
OCPR = Occupational Aspirations
SIGO = Most Significant Other
AGEM = Timing of Marriage
SUPP = Perceived Support
LOCO = Internal Locus of Control
### Table 26

Effects of Social Structural, Interpersonal Relation, and Personality Variables on Downward Educational Aspirations: Results of the Logistic Regression Analysis (Final Model) for Female Adolescents

<table>
<thead>
<tr>
<th>Independent Variables (I.V.)</th>
<th>Logit coefficient (Bx)</th>
<th>Change in Probability (ΔP)</th>
<th>Semi-standardized of ΔP</th>
<th>Rank</th>
</tr>
</thead>
<tbody>
<tr>
<td>FAOC</td>
<td>2.246</td>
<td>3.880</td>
<td>.071</td>
<td>.169</td>
</tr>
<tr>
<td>BASP</td>
<td>1.848</td>
<td>-3.050</td>
<td>-.050</td>
<td>-.126</td>
</tr>
<tr>
<td>OCPR</td>
<td>2.158</td>
<td>-2.967</td>
<td>-.041</td>
<td>-.114</td>
</tr>
<tr>
<td>SIGO</td>
<td>.428</td>
<td>-1.967</td>
<td>-.119</td>
<td>.057</td>
</tr>
<tr>
<td>Constant</td>
<td>3.058</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

N = 234; P = .278
Log Likelihood = -119.240
Likelihood Ratio Statistic (LRS) = 38.034
Degrees of Freedom = 5
Pseudo R² = .140

* All logit coefficients are significant at P<.05, two-tailed t-test

FAOC = Father's Occupation
BASP = Best Friend's Educational Aspirations
OCPR = Occupational Aspirations
SIGO = Most Significant Other
AGEM = Timing of Marriage
SUPP = Perceived Support
LOCO = Internal Locus of Control
EXTENT OF DOWNWARD EDUCATIONAL ASPIRATIONS

Variables at three levels of influence (social structural, interpersonal relations, and personality) are tested to see whether they can explain the extent of downward educational aspirations among adolescents (the extent of downward mobility tendency). An ordinary least squares (OLS) multiple regression technique was used in two steps. First, simultaneous multiple regression analyses were employed to find the significant variables within each level of influence that are associated with the extent of downward educational aspirations. The variables from all three levels of influence were not simultaneously included in this step because of the small sample size relative to the number of independent variables and the theoretical interest in the results from different levels of influence. In the first step, a multiple regression analysis was conducted for each level of influence. The independent variables whose slope coefficients (B) are statistically significant at less than the .10 level for the two-tailed test (p<.05 one-tailed test) were selected to be included in the next step. The second step was for the purpose of finding a model which best explained the extent of downward educational aspirations, using stepwise procedure. The standardized coefficient (beta) values indicate the relative impacts of independent variables and the magnitudes of
their effects on the extent of downward educational aspirations. Again, a separate analysis was performed for the male and female samples.

At the social structural level, there are four social origin variables (mother's education, father's occupation, mother's occupation and family income) and two internal family structure variables (family intactness and family size). As shown in Tables 27 and 28, the simultaneous multiple regression for the first step of the analysis revealed that only two of the six variables at the social structural level are significantly related to the extent of downward educational aspirations -- mother's occupation and family size in the male sample and mother's occupation and family intactness in the female sample. These relationships are consistent with the hypotheses with the exception of family size. The findings indicate an inverse relationship between extent of downward aspirations and number of siblings among male adolescents.

Three variables at the interpersonal relations level are best friend's educational aspirations, support for a low educational goal, and most significant other identification. The analyses, as shown in Tables 29 and 30, produced the same results for males and females. Only one variable, best friend's educational aspirations, is significantly
related to the extent of downward educational aspirations. This finding confirms the hypothesis that the extent of downward educational aspirations is negatively correlated to best friend's educational aspirations.

At the personality level, there are five variables: occupational prestige aspirations, internal locus of control, timing of marriage, attitude toward school experiences, and attitude toward change in traditional sex-roles. The analyses for this level, as shown in Tables 31 and 32, revealed that, in female sample, occupational aspirations (preference) and internal locus of control are statistically related to the extent of downward educational aspirations in the expected directions. In the male sample, none of the variables at this level is significantly related to the extent of downward educational aspirations.
## Table 27
Multiple Regression Showing Effects of Social Structural Variables on Extent of Downward Educational Aspirations for Male Sample

<table>
<thead>
<tr>
<th>Variables</th>
<th>B</th>
<th>beta</th>
<th>T value</th>
<th>p</th>
<th>R²</th>
<th>F value</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>MOED</td>
<td>-.075</td>
<td>-.169</td>
<td>-1.443</td>
<td>.153</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>FAOC</td>
<td>.063</td>
<td>.113</td>
<td>1.072</td>
<td>.287</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>MOOC*</td>
<td>-.152</td>
<td>-.329</td>
<td>-2.794</td>
<td>.006</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>INC</td>
<td>.000</td>
<td>.021</td>
<td>.167</td>
<td>.868</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>FAMI</td>
<td>.144</td>
<td>.050</td>
<td>.430</td>
<td>.668</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>SIB*</td>
<td>-.125</td>
<td>-.233</td>
<td>-2.213</td>
<td>.030</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>3.824</td>
<td></td>
<td>5.034</td>
<td>.000</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

* The coefficient is significant at p<.05 (two-tailed), and the variable is selected for the next step.

**Note**
- MOED = Mother's Education
- FAOC = Father's Occupation
- MOOC = Mother's Occupation
- INC = Family Income
- FAMI = Family Intactness
- SIB = Family Size

N = 89
Table 28

Multiple Regression Showing Effects of Social Structural Variables on Extent of Downward Educational Aspirations for Female Sample

<table>
<thead>
<tr>
<th>Variables</th>
<th>B</th>
<th>beta</th>
<th>T value</th>
<th>p</th>
<th>R²</th>
<th>F value</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>MOED</td>
<td>.003</td>
<td>.005</td>
<td>.041</td>
<td>.967</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>FAOC</td>
<td>.007</td>
<td>.012</td>
<td>.110</td>
<td>.913</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>MOOC*</td>
<td>-.121</td>
<td>-.260</td>
<td>-2.064</td>
<td>.042</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>INC</td>
<td>-.000</td>
<td>-.109</td>
<td>-1.007</td>
<td>.317</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>FAMI*</td>
<td>-.646</td>
<td>-.190</td>
<td>-1.813</td>
<td>.073</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>SIB</td>
<td>-.010</td>
<td>-.014</td>
<td>-.136</td>
<td>.892</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>3.492</td>
<td>4.156</td>
<td>.000</td>
<td>.146</td>
<td>2.396</td>
<td>.035</td>
<td></td>
</tr>
</tbody>
</table>

* The coefficient is significant at p<.10 (two-tailed), and the variable is selected for the next step.

Note
MOED = Mother's Education
MOOC = Mother's Occupation
FAOC = Father's Occupation
INC = Family Income
FAMI = Family Intactness
SIB = Family Size
N = 91
Table 29
Multiple Regression Showing Effects of Interpersonal Relation Variables on Extent of Downward Educational Aspirations for Male Sample

<table>
<thead>
<tr>
<th>Variables</th>
<th>B</th>
<th>beta</th>
<th>T value</th>
<th>p</th>
<th>R²</th>
<th>F value</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>SIGO</td>
<td>-.155</td>
<td>-.059</td>
<td>-.633</td>
<td>.528</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>SUPP</td>
<td>.057</td>
<td>.046</td>
<td>.454</td>
<td>.651</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>BASP*</td>
<td>-.109</td>
<td>-.189</td>
<td>-1.967</td>
<td>.051</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>3.847</td>
<td>4.056</td>
<td>.000</td>
<td>.054</td>
<td>2.385</td>
<td>.072</td>
<td></td>
</tr>
</tbody>
</table>

* The coefficient is significant at p<.10 (two-tailed), and the variable is selected for the next step.

Note
SIGO = Most Significant Other
SUPP = Perceived Support
BASP = Best Friend's Educational Aspirations
N = 129
### Table 30

Multiple Regression Showing Effects of Interpersonal Relation Variables on Extent of Downward Educational Aspirations for Female Sample

<table>
<thead>
<tr>
<th>Variables</th>
<th>B</th>
<th>beta</th>
<th>T value</th>
<th>p</th>
<th>R²</th>
<th>F value</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>SIGO</td>
<td>-.301</td>
<td>-.113</td>
<td>-1.298</td>
<td>.197</td>
<td>.067</td>
<td>2.987</td>
<td>.034</td>
</tr>
<tr>
<td>SUPP</td>
<td>.152</td>
<td>.108</td>
<td>1.198</td>
<td>.233</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>BASP*</td>
<td>-.105</td>
<td>-.172</td>
<td>-1.908</td>
<td>.059</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>3.607</td>
<td>4.017</td>
<td>.000</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

* The coefficient is significant at p<.10 (two-tailed), and the variable is selected for the next step.

**Note**

SIGO = Most Significant Other  
SUPP = Perceived Support  
BASP = Best Friend's Educational Aspirations  
N = 128
Table 31

Multiple Regression Showing Effects of Personality Variables on Extent of Downward Educational Aspirations for Male Sample

<table>
<thead>
<tr>
<th>Variables</th>
<th>B</th>
<th>beta</th>
<th>T value</th>
<th>p</th>
<th>R²</th>
<th>F value</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>LOCO</td>
<td>-.042</td>
<td>-.083</td>
<td>-.880</td>
<td>.381</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>OCPR</td>
<td>-.065</td>
<td>-.138</td>
<td>-1.467</td>
<td>.145</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>AGEM</td>
<td>.262</td>
<td>.112</td>
<td>1.197</td>
<td>.234</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>SCHO</td>
<td>-.047</td>
<td>-.143</td>
<td>-1.533</td>
<td>.128</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>ROLE</td>
<td>-.004</td>
<td>-.010</td>
<td>-.104</td>
<td>.917</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>4.619</td>
<td>3.422</td>
<td>.001</td>
<td></td>
<td></td>
<td>.062</td>
<td>1.418</td>
</tr>
</tbody>
</table>

Note
LOCO = Internal Locus of Control
OCPR = Occupational Aspirations
AGEM = Timing of Marriage
SCHO = Attitude toward School Experience
ROLE = Attitude toward Sex Roles
N = 114
Table 32

Multiple Regression Showing Effects of Personality Variables on Extent of Downward Educational Aspirations for Female Sample

<table>
<thead>
<tr>
<th>Variables</th>
<th>B</th>
<th>beta</th>
<th>T value</th>
<th>p</th>
<th>R²</th>
<th>F value</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>LOCO*</td>
<td>-.104</td>
<td>-.197</td>
<td>-1.731</td>
<td>.088</td>
<td>0.098</td>
<td>1.545</td>
<td>.187</td>
</tr>
<tr>
<td>OCPR*</td>
<td>-.104</td>
<td>-.232</td>
<td>-1.993</td>
<td>.050</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>AGEM</td>
<td>-.269</td>
<td>-.102</td>
<td>-.860</td>
<td>.393</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>SCHO</td>
<td>.011</td>
<td>.042</td>
<td>.360</td>
<td>.720</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>ROLE</td>
<td>-.018</td>
<td>-.046</td>
<td>-.394</td>
<td>.695</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>4.286</td>
<td></td>
<td>2.571</td>
<td>.012</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

* The coefficient is significant at p<.10 (two-tailed), and the variable is selected for the next step.

Note
LOCO = Internal Locus of Control
OCPR = Occupational Aspirations
AGEM = Timing of Marriage
SCHO = Attitude toward School Experience
ROLE = Attitude toward Sex Roles
N = 77
All variables at the three levels of influence that were found to be significant in the first step were included in the second step of the analysis. This means that there were three determinants for males and five determinants for females. In this step, the best model to explain the extent of downward aspirations was selected by using step-wise multiple regression analysis. In the final models, all unstandardized regression coefficients are statistically significant at a less-than .05 probability level (two-tailed test). The standardized coefficients are useful for ranking the importance of the independent variables in a model. The analyses in the final step revealed that, in the case of males, all three variables that were found to be significant in the first step are in the model that best explains male adolescents' extent of downward educational aspirations. As shown in Table 33, mother's occupation has the largest effect, followed by family size and best friend's educational aspirations. More specifically, the extent of downward educational aspirations among male adolescents is determined by having a mother with lower occupational prestige, having fewer siblings, and having a best friend with lower educational aspirations. Eighteen percent of the variance in the extent of downward aspirations is explained by these three determinants ($R^2 = .18$).
Turning to females, three of the five variables that were found to be significant in the first step of the analysis were kept in the final model (Table 34). The standardized coefficients in the model that best explains extent of downward educational aspirations among female adolescents show that family intactness has the largest effect, followed by internal locus of control and occupational aspirations, as shown in Table 35. Extent of downward educational aspirations is greater for those females who have lived in a non-intact family, have a lower internal locus of control, and have a lower level of occupational aspirations. Twenty percent of the variance in female adolescents' extent of downward educational aspirations can be explained by these three factors ($R^2 = .20$).
Table 33

Multiple Regression Showing Effects of Predictors Identified at Three Levels of Influence on Extent of Downward Educational Aspirations (Final Model) for Male Sample

<table>
<thead>
<tr>
<th>Variables</th>
<th>B</th>
<th>beta</th>
<th>T value</th>
<th>p</th>
<th>R²</th>
<th>F value</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>MOOC</td>
<td>-.167</td>
<td>-.317</td>
<td>-3.903</td>
<td>.000</td>
<td>.175</td>
<td>9.786</td>
<td>.000</td>
</tr>
<tr>
<td>SIB</td>
<td>-.134</td>
<td>-.210</td>
<td>-2.623</td>
<td>.010</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>BASP</td>
<td>-.122</td>
<td>-.204</td>
<td>-2.517</td>
<td>.013</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>5.198</td>
<td>7.305</td>
<td></td>
<td>.000</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Note
MOOC = Mother's Occupation
SIB = Family Size
BASP = Best Friend's Educational Aspirations
N = 142
Table 34

Multiple Regression Showing Effects of Predictors Identified at Three Levels of Influence on Extent of Downward Educational Aspirations for Female Sample

<table>
<thead>
<tr>
<th>Variables</th>
<th>B</th>
<th>beta</th>
<th>T value</th>
<th>p</th>
<th>R²</th>
<th>F value</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>MOOC</td>
<td>-0.061</td>
<td>-0.118</td>
<td>-1.172</td>
<td>0.244</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>FAMI</td>
<td>-0.782</td>
<td>-0.236</td>
<td>-2.407</td>
<td>0.018</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>BASP</td>
<td>-0.062</td>
<td>-0.010</td>
<td>-1.172</td>
<td>0.244</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>LOCO</td>
<td>-0.130</td>
<td>-0.227</td>
<td>-2.344</td>
<td>0.021</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>OCPR</td>
<td>-0.075</td>
<td>-0.162</td>
<td>-1.640</td>
<td>0.105</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>6.090</td>
<td>6.018</td>
<td></td>
<td>0.000</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Note
MOOC = Mother's Occupation
FAMI = Family Intactness
BASP = Best Friend's Educational Aspirations
LOCO = Internal Locus of Control
OCPR = Occupational Aspirations
N = 92

R² = 0.224, F value = 4.969, p = 0.001
Table 35

Multiple Regression Showing Effects of Predictors Identified at Three Levels of Influence on Extent of Downward Educational Aspirations (Final Model) for Female Sample

<table>
<thead>
<tr>
<th>Variables</th>
<th>B</th>
<th>beta</th>
<th>T value</th>
<th>p</th>
<th>R²</th>
<th>F value</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>FAMI</td>
<td>-.883</td>
<td>-.267</td>
<td>-2.786</td>
<td>.006</td>
<td>.199</td>
<td>7.295</td>
<td>.000</td>
</tr>
<tr>
<td>LOCO</td>
<td>-.148</td>
<td>-.258</td>
<td>-2.704</td>
<td>.008</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>OCPR</td>
<td>-.094</td>
<td>-.202</td>
<td>-2.107</td>
<td>.038</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>5.267</td>
<td>7.312</td>
<td></td>
<td>.000</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Note
FAMI = Family Intactness
LOCO = Internal Locus of Control
OCPR = Occupational Aspirations
N = 92
FEMALE MOBILITY ASPIRATIONS RELATIVE TO MOTHER'S EDUCATION

The analysis in this study considers mobility aspirations of female adolescents relative to the educational attainment of their mothers as well as fathers to determine if there are any major differences that result from the two approaches. Only a descriptive (bivariate, t-test and chi-square) analysis is performed since the number of cases of downward females relative to the mothers' education is very small.

There are two comparisons in this section. First, female mobility aspirations relative to mother's education and female mobility aspirations relative to father's education are investigated in the sample with post-secondary educated fathers. This sample was used in the multivariate analysis of mobility aspirations relative to father's education. The multivariate analysis revealed similar predictors for the male and female samples. A second comparison of female mobility aspirations uses the whole sample of females aged 15 to 19. When mother's education is used as the standard of comparison for mobility aspirations, the selection of those respondents with fathers who have post-secondary education may be too limiting since the mean level of mother's education is lower than that of the father.
Based on the frequency distribution of the mothers' educational attainment, this variable, as well as the adolescents' educational aspirations, is recoded into eight categories: no education, grades one to eight, grades nine to eleven, grade twelve, one to three years of college, four years of college, five to six years of college, and seven or more years of college (Table 36).

The proportion of downward females relative to their mothers' education in the female sample with fathers having post secondary education is eight percent. (The proportion of downward females relative to their fathers' education is thirty-one percent of the female sample having fathers with post secondary education.) In the whole female sample, the proportion of downward females relative to mothers' education is only three percent. (The proportion of downward females relative to the fathers' education is seven percent of the whole female sample.) In both the limited (having a highly educated father) and larger female samples, the results indicate that the use of mother's education versus father's education as the standard of comparison for mobility aspirations does make a difference (Tables 37, 38, 39 and 40).
Table 36

Female Adolescents' Mobility Aspirations Relative to Mothers' Education and Mothers' Educational Attainments for the Whole Sample (Frequencies)

<table>
<thead>
<tr>
<th>Mother's Education</th>
<th>Female Mobility Aspirations</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Downward</td>
<td>Non-Downward</td>
<td>Total</td>
</tr>
<tr>
<td>No education</td>
<td>-</td>
<td>34</td>
<td>34</td>
</tr>
<tr>
<td>Grades 1-8</td>
<td>-</td>
<td>708</td>
<td>708</td>
</tr>
<tr>
<td>Grades 9-11</td>
<td>4</td>
<td>992</td>
<td>996</td>
</tr>
<tr>
<td>High school</td>
<td>11</td>
<td>1423</td>
<td>1434</td>
</tr>
<tr>
<td>1-3 years of college</td>
<td>36</td>
<td>290</td>
<td>326</td>
</tr>
<tr>
<td>4 years of college</td>
<td>27</td>
<td>168</td>
<td>195</td>
</tr>
<tr>
<td>5-6 years of college</td>
<td>15</td>
<td>8</td>
<td>23</td>
</tr>
<tr>
<td>More than 6 years of college</td>
<td>21</td>
<td>8</td>
<td>29</td>
</tr>
<tr>
<td>Total</td>
<td>114</td>
<td>3631</td>
<td>3745</td>
</tr>
</tbody>
</table>
Table 37

Descriptive Statistics for Downward and Non-Downward Females Relative to Mothers' Education (Sample Having Fathers with Post-Secondary Education)

<table>
<thead>
<tr>
<th>Variable</th>
<th>Downward</th>
<th></th>
<th>Non-Downward</th>
<th></th>
<th>T-Test</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mean</td>
<td>S.D.</td>
<td>N</td>
<td>Mean</td>
<td>S.D.</td>
<td>N</td>
</tr>
<tr>
<td>FAED</td>
<td>15.778</td>
<td>1.734</td>
<td>54</td>
<td>15.478</td>
<td>1.611</td>
<td>655</td>
</tr>
<tr>
<td>MOED</td>
<td>15.889</td>
<td>1.930</td>
<td>54</td>
<td>12.988</td>
<td>2.185</td>
<td>655</td>
</tr>
<tr>
<td>FAOC</td>
<td>6.362</td>
<td>1.927</td>
<td>47</td>
<td>6.129</td>
<td>2.140</td>
<td>581</td>
</tr>
<tr>
<td>MOOC</td>
<td>6.512</td>
<td>2.357</td>
<td>41</td>
<td>5.082</td>
<td>2.329</td>
<td>427</td>
</tr>
<tr>
<td>INC*</td>
<td>23.780</td>
<td>11.521</td>
<td>35</td>
<td>26.820</td>
<td>15.274</td>
<td>443</td>
</tr>
<tr>
<td>SIB</td>
<td>2.944</td>
<td>1.867</td>
<td>54</td>
<td>2.930</td>
<td>2.050</td>
<td>655</td>
</tr>
<tr>
<td>SUPP</td>
<td>2.125</td>
<td>1.035</td>
<td>24</td>
<td>1.755</td>
<td>1.788</td>
<td>364</td>
</tr>
<tr>
<td>BASP</td>
<td>14.415</td>
<td>2.125</td>
<td>53</td>
<td>15.248</td>
<td>1.883</td>
<td>654</td>
</tr>
<tr>
<td>LOCO</td>
<td>11.111</td>
<td>2.625</td>
<td>54</td>
<td>11.782</td>
<td>2.375</td>
<td>648</td>
</tr>
<tr>
<td>OCPR</td>
<td>6.176</td>
<td>2.588</td>
<td>34</td>
<td>6.933</td>
<td>2.049</td>
<td>460</td>
</tr>
<tr>
<td>SCHO</td>
<td>29.143</td>
<td>3.546</td>
<td>28</td>
<td>31.622</td>
<td>4.092</td>
<td>389</td>
</tr>
<tr>
<td>ROLE</td>
<td>23.880</td>
<td>3.354</td>
<td>50</td>
<td>23.451</td>
<td>3.075</td>
<td>627</td>
</tr>
<tr>
<td>%</td>
<td></td>
<td></td>
<td></td>
<td>%</td>
<td></td>
<td></td>
</tr>
<tr>
<td>FAMI</td>
<td></td>
<td></td>
<td></td>
<td>N</td>
<td></td>
<td></td>
</tr>
<tr>
<td>non</td>
<td>24.1</td>
<td>13</td>
<td>17.1</td>
<td>112</td>
<td>1.23</td>
<td>.268</td>
</tr>
<tr>
<td>intact</td>
<td>75.9</td>
<td>41</td>
<td>82.9</td>
<td>543</td>
<td>.01</td>
<td>.977</td>
</tr>
<tr>
<td>SIGO</td>
<td></td>
<td></td>
<td></td>
<td>N</td>
<td></td>
<td></td>
</tr>
<tr>
<td>non</td>
<td>28.0</td>
<td>7</td>
<td>25.6</td>
<td>95</td>
<td>.01</td>
<td>.977</td>
</tr>
<tr>
<td>parent</td>
<td>72.0</td>
<td>18</td>
<td>74.4</td>
<td>276</td>
<td>.01</td>
<td>.939</td>
</tr>
<tr>
<td>AGEM</td>
<td></td>
<td></td>
<td></td>
<td>N</td>
<td></td>
<td></td>
</tr>
<tr>
<td>young</td>
<td>60.4</td>
<td>19</td>
<td>62.1</td>
<td>385</td>
<td>.01</td>
<td>.939</td>
</tr>
<tr>
<td>delay</td>
<td>39.6</td>
<td>29</td>
<td>37.9</td>
<td>235</td>
<td>.01</td>
<td>.939</td>
</tr>
</tbody>
</table>

* Family income is in thousands of dollars.

Note

FAED = Father's Education
MOED = Mother's Education
FAOC = Father's Occupation
MOOC = Mother's Occupation
INC = Family Income
SUPP = Perceived Support
BASP = Best Friend's Educational Aspirations
LOCO = Internal Locus of Control
OCPR = Occupational Aspirations
SCHO = Attitude toward School Experiences
ROLE = Attitude toward Sex Roles
FAMI = Family Intactness
SIGO = Most Significant Other
AGEM = Timing of Marriage
S.D. = Standard Deviation
### Table 38

Descriptive Statistics for Downward and Non-Downward Females Relative to Fathers' Education (Sample Having Fathers with Post-Secondary Education)

<table>
<thead>
<tr>
<th>Variable</th>
<th>Downward Mean</th>
<th>S.D.</th>
<th>N</th>
<th>Non-Downward Mean</th>
<th>S.D.</th>
<th>N</th>
<th>T-Test</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>FAED</td>
<td>16.418</td>
<td>1.683</td>
<td>225</td>
<td>15.082</td>
<td>1.394</td>
<td>499</td>
<td>10.40</td>
<td>.000</td>
</tr>
<tr>
<td>MOED</td>
<td>13.222</td>
<td>2.555</td>
<td>221</td>
<td>13.203</td>
<td>2.175</td>
<td>488</td>
<td>.10</td>
<td>.924</td>
</tr>
<tr>
<td>FAOC</td>
<td>6.528</td>
<td>2.099</td>
<td>195</td>
<td>5.944</td>
<td>2.137</td>
<td>445</td>
<td>3.22</td>
<td>.001</td>
</tr>
<tr>
<td>MOOC</td>
<td>5.255</td>
<td>2.400</td>
<td>145</td>
<td>5.196</td>
<td>2.349</td>
<td>327</td>
<td>.25</td>
<td>.803</td>
</tr>
<tr>
<td>INC*</td>
<td>27.032</td>
<td>15.565</td>
<td>155</td>
<td>26.534</td>
<td>14.908</td>
<td>331</td>
<td>.33</td>
<td>.739</td>
</tr>
<tr>
<td>SIB</td>
<td>2.880</td>
<td>1.790</td>
<td>225</td>
<td>2.950</td>
<td>2.149</td>
<td>499</td>
<td>-.46</td>
<td>.649</td>
</tr>
<tr>
<td>SUPP</td>
<td>1.953</td>
<td>.900</td>
<td>129</td>
<td>1.688</td>
<td>.745</td>
<td>266</td>
<td>2.90</td>
<td>.004</td>
</tr>
<tr>
<td>BASP</td>
<td>14.640</td>
<td>2.015</td>
<td>222</td>
<td>15.430</td>
<td>1.813</td>
<td>498</td>
<td>-5.01</td>
<td>.000</td>
</tr>
<tr>
<td>LOCO</td>
<td>11.674</td>
<td>2.429</td>
<td>221</td>
<td>11.792</td>
<td>2.378</td>
<td>495</td>
<td>-.60</td>
<td>.547</td>
</tr>
<tr>
<td>OCPR</td>
<td>6.014</td>
<td>2.556</td>
<td>144</td>
<td>7.222</td>
<td>1.797</td>
<td>361</td>
<td>-5.18</td>
<td>.000</td>
</tr>
<tr>
<td>SCHO</td>
<td>31.254</td>
<td>4.425</td>
<td>126</td>
<td>31.560</td>
<td>3.933</td>
<td>298</td>
<td>-.67</td>
<td>.502</td>
</tr>
<tr>
<td>ROLE</td>
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<td></td>
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<tr>
<td>SIGO</td>
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<td>delay</td>
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<td>67</td>
<td>40.3</td>
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</tbody>
</table>

* Family income is in thousands of dollars.

**Note**

FAED = Father's Education  
MOED = Mother's Education  
FAOC = Father's Occupation  
MOOC = Mother's Occupation  
INC = Family Income  
SIB = Family Size  
SUPP = Perceived Support  
BASP = Best Friend's Educational Aspirations  
LOCO = Internal Locus of Control  
OCPR = Occupational Aspirations  
SCHO = Attitude toward School Experiences  
ROLE = Attitude toward Sex Roles  
FAMI = Family Intactness  
SIGO = Most Significant Other  
AGEM = Timing of Marriage  
S.D. = Standard Deviation
Table 39

Descriptive Statistics for Downward and Non-Downward Females Relative to Mothers' Education (the Whole Sample)

<table>
<thead>
<tr>
<th>Variable</th>
<th>Downward Mean</th>
<th>S.D.</th>
<th>N</th>
<th>Non-Downward Mean</th>
<th>S.D.</th>
<th>N</th>
<th>T-Test</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
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<td>106</td>
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<td>3.813</td>
<td>3176</td>
<td>8.08</td>
<td>.000</td>
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<tr>
<td>MOED</td>
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<td>114</td>
<td>10.586</td>
<td>3.022</td>
<td>3631</td>
<td>22.07</td>
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<td>2.500</td>
<td>191</td>
<td>3.628</td>
<td>2.320</td>
<td>2628</td>
<td>5.28</td>
<td>.000</td>
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<td>2.500</td>
<td>77</td>
<td>3.628</td>
<td>2.320</td>
<td>2132</td>
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<td>.000</td>
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<tr>
<td>SIB</td>
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<tr>
<td>BASP</td>
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<td>112</td>
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<tr>
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<td>parent</td>
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<td>67.6</td>
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<td>AGEM</td>
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<td>42</td>
<td>36.0</td>
<td>1180</td>
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</tbody>
</table>

* Family income is in thousands of dollars.

**Note**

FAED = Father's Education  MOED = Mother's Education
FAOC = Father's Occupation  MOOC = Mother's Occupation
INC  = Family Income  SIB  = Family Size
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LOCO = Internal Locus of Control
OCPR = Occupational Aspirations
SCHO = Attitude toward School Experiences
ROLE = Attitude toward Sex Roles  FAMI = Family Intactness
SIGO = Most Significant Other  AGEM = Timing of Marriage
S.D. = Standard Deviation
Table 40
Descriptive Statistics for Downward and Non-Downward Females Relative to Fathers' Education (the Whole Sample)

<table>
<thead>
<tr>
<th>Variable</th>
<th>Downward</th>
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<th>Mean</th>
<th>S.D.</th>
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<th>Chi square</th>
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<td>.34</td>
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<td>18</td>
<td>32.4</td>
<td>674</td>
<td>1.03</td>
</tr>
<tr>
<td>parent</td>
<td>71.9</td>
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<td>.34</td>
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<td>AGEM young</td>
<td>68.3</td>
<td>149</td>
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<td>69</td>
<td>35.3</td>
<td>994</td>
<td>.34</td>
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</tbody>
</table>

* Family income is in thousands of dollars.

Note
FAED = Father's Education
MOED = Mother's Education
FAOC = Father's Occupation
MOOC = Mother's Occupation
INC = Family Income
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SCHO = Attitude toward School Experiences
ROLE = Attitude toward Sex Roles
SIGO = Most Significant Other
FAMI = Family Intactness
AGEM = Timing of Marriage
S.D. = Standard Deviation
There are more select groups of downward females when using mother's education instead of father's education as the standard of comparison for mobility aspirations. Since mother's education seems to be lower than that of the father, perhaps females who are downward relative to their mothers' education are really downward, i.e., have very low educational aspirations. The extent of difference found when mother's education is used to determine downward mobility aspirations suggests the need for further research to examine the effect of using mother's versus father's education as a point of comparison.

**SUMMARY**

Variables at three levels of influence -- social structure, interpersonal relations, and personality -- are found to be relevant to adolescents' downward educational aspirations in the multivariate analysis. In the male sample, downward adolescents differ from the non-downward ones in terms of father's occupation, family intactness, perceived support from most significant other, best friend's educational aspirations, and occupational aspirations. In the female sample, downward adolescents differ from the non-downward ones in terms of father's occupation, best friend's educational aspirations, most significant other identification, and occupational aspirations.
Eighteen and twenty percent of the variance in the extent of downward educational aspirations (the degree of discrepancy from father's educational attainment), males and females, respectively, can be best explained by three variables. Among downward male adolescents, the lower prestige of the mother's occupation, the smaller number of siblings, and the lower educational aspirations of the best friend increase the extent of downward educational aspirations. Among female downwards, not living in an intact family, having a lower level of internal locus of control, and having lower occupational aspirations result in a higher extent of downward educational aspirations.

Finally, it was determined that the use of mother's education rather than father's education as the standard of comparison for female adolescents' mobility aspirations does make a difference.
CHAPTER V
CONCLUSIONS AND DISCUSSION

Some young people desire to achieve an educational level lower than that of their fathers. The major purpose of this study is to identify some of the factors that contribute to the development of downward educational aspirations among adolescents. While the general concern is mobility aspirations, the specific focus is downward educational aspirations since they are perceived as an early sign of a voluntary downward mobility tendency. Some may assert that downward educational aspirations do not reflect downward mobility because there are adolescents who intend to have more prestigious jobs and to earn more than their fathers with Ph.D. degrees. While this may be the case in some instances, the fact is that at the aggregate level there is a strong relationship between educational attainment and occupational prestige and income. Even with the exceptions, it still is possible to talk about downward mobility because it is downward as far as one important indicator of socioeconomic status is concerned, i.e., education.
Preferences or voluntary choices are always influenced by factors external to the individual, so it is important to note that an adolescent's mobility aspirations do not reflect the exercise of a totally free will. The social psychological perspective that is employed in this study takes into account three levels of influence: social structure, interpersonal relations, and personality. Social structure refers to the impact of the larger context; interpersonal relations refer to the influence of social interactions with significant others; and personality refers to the effect of socially developed and evaluated self-other attitudes that the adolescent holds. Since the ultimate goal of this research is to begin developing a comprehensive explanation of adolescents' downward educational aspirations, consideration of these three different levels of influence in a single study is essential. This is especially the case given that the existing literature has identified them as relevant to aspiration formation, status attainment, and social mobility.

The findings of this study reveal that all three levels, social structure, interpersonal relations, and personality, have relevance for adolescents' downward educational aspirations. Social structure (father's occupation) has the strongest influence, followed by interpersonal relations (significant others' influence) and personality
(occupational aspirations). Variable predictors of mobility aspirations (downward versus non-downward) are essentially the same for males and females. There are only two exceptions: the importance of family intactness (a social structural variable) for the mobility aspirations of males, and perceived support from most significant other and most significant other identification, both interpersonal relation variables important to the mobility aspirations of male and female adolescents, respectively. A third interpersonal relation variable, best friend's educational aspirations, is significant for both genders.

In contrast to the great gender similarity among predictors of downward versus non-downward educational aspirations, predictors of the extent of downward are entirely different for males as compared to females. The social structural level seems to have a strong influence on the extent of downward educational aspirations of males. Two of the three significant variables are structural: mother's occupation and family size. The third significant predictor, best friend's educational aspirations, is at the interpersonal relation level. In the case of female adolescents, two of the three significant variables are at the personality level: internal locus of control and occupational aspirations. Family intactness, a social structural factor, is the third predictor of female adolescents' extent of downward educational aspirations.
It should be noted that there is little overlap between predictors of downward and non-downward and predictors of extent of downward. They tend to be different in each case.

A question which must be dealt with is why there is a striking similarity in predictors of downward versus non-downward mobility aspirations and a striking dissimilarity in predictors of extent of downward when male and female adolescents are compared. It may be that the difference in predictors of downward extent is more reflective of male and female stereotypes because this dependent variable is identifying the extremes. A stereotype is an exaggeration of some pattern and would suggest that important determinants of downward aspirations would be personality for females and social structure for males. Through socialization, males internalize a strong sense of achievement motivation and so, if they do not strive to achieve, it is thought to be external factors that interfere. The socialization of females, on the other hand, places much less emphasis on achievement and so downward aspirations for them tend to be blamed on earlier personality development.

In contrast to the gender differences in predictors of the extent of downward, the determinants of having downward or non-downward mobility aspirations are essentially the
same for males and females. Perhaps, this is because the categorization of downward and non-downward is dominated by scores closer to the mean.

DOWNWARD MOBILITY TENDENCY PROCESS

Specifying the dynamics by which downward educational aspirations (downward mobility aspirations or downward mobility tendency) develop is an important goal of this research. The social psychological process includes factors at the social structural, interpersonal relation, and personality levels. The mechanism through which adolescents establish downward educational aspirations is primarily related to father's higher occupational prestige, a social structural variable. Of course, fathers' occupational prestige is strongly associated with fathers' education (the standard of comparison for adolescents' mobility aspirations). When adolescents have fathers with higher social achievements (occupational and educational), the likelihood that adolescents will have downward educational aspirations increases. Those with more prestigious fathers must desire to achieve a relatively high level of education if they are to avoid becoming downwardly aspiring.

Three other conditions that influence adolescents to aspire to a lower level of educational attainment relative
to that of their fathers are relationship with parents, occupational aspirations, and reinforcement from significant others. When the relationship between adolescents and parents is atypical, the likelihood that adolescents will have downward educational and occupational aspirations increases. The atypical relationship is reflected in non-intact family situations (a structural variable) among male adolescents and in the identification of a non-parent as the most significant other in important life decisions (an interpersonal relation variable) among female adolescents. Living in a non-intact family leads to a weak transmission of the fathers' values regarding educational and occupational achievements. Feeling that a parent, especially the father, is not the most influential person in important life decisions may also mean that father's social achievements are not perceived to be so important. In this case, there would not be a strong urge to duplicate the father's educational and occupational accomplishments. When adolescents opt for occupations with lower prestige rankings, a high level of education generally is not so important to them; thus, their educational aspirations may be downward relative to their fathers' educational attainments.

Also important for the development of downward educational aspirations is the support for a low-level educational aim that is provided by significant others.
Interpersonal relations with significant others are a key factor in the process by which adolescents develop downward educational aspirations. Reinforcement from significant others in the forms of having a best friend with low educational aspirations and/or perceiving approval from the most significant other for a downward educational goal makes downward educational aspirations, a non-normative or deviant choice, more acceptable to downwardly aspiring adolescents. The same holds true in the case of occupational aspirations. Social support reduces the pressure produced by societal achievement norms. It is likely that, in some instances, significant others are influential in the development of downward educational and occupational aspirations; in others, they are sought out after downward aspirations are developed because they are people who understand and accept the individual's future goals.

Closely related to the issue of downward educational aspirations is the notion of how far downward, i.e., years of discrepancy between father's educational attainment level and adolescent's educational aspiration level. In the male sample, having a father with higher occupational prestige is associated with downward educational aspirations, but having a mother with lower occupational prestige increases the extent of downward. Perhaps, it is the discrepancy between father's and mother's occupational
prestige that affects the extent of downward educational aspirations. The lower occupational prestige of the mother may imply that she also has a lower level of education than her husband. This discrepancy in parental social achievement may mean that adolescents view as acceptable a greater range of educational attainments. Also revealed in this study is the fact that family size (number of siblings) is negatively associated with extent of downward educational aspirations among male adolescents. This may be due the fact that family size is known to be inversely related to socioeconomic status. A relatively lower level of educational attainment on the part of fathers automatically limits the extent to which their children can aspire downward. These adolescents simply do not have as far to go.

Among male adolescents, best friend's educational aspirations affect not only the state of being downward through legitimation but also the extent of downward. Having a friend with lower educational aspirations encourages attitudes related to the downward mobility tendency. Attempts to express a pro-attainment orientation would be likely to be received negatively.

In the female sample, the extent of downward educational aspirations is determined by a different set of factors which include living in a non-intact family, and having a
low internal locus of control and low occupational aspirations.

It may be that for females living in a non-intact family is a circumstance that fosters a less positive image of self and a lower level of self-confidence. There is evidence that perceived family conflict is associated with a reduced evaluation of self (Raschke and Raschke, 1979). Such an outlook is quite conceivably accompanied by a lower level of internal locus of control. This low self-evaluation may lead to a preference for a less prestigious occupation, one that is not so demanding or competitive. Low prestige occupations generally do not require a high level of education. Knowing that educational and occupational attainments tend to go hand in hand, individuals might be expected to adjust their level of aspirations in the educational realm with those in the occupational sphere.

The Larger Social Context

There is evidence showing a recent increase in downward mobility. At the high school level, the characteristics of students most at risk of dropping out have changed. Traditionally, those from low-income backgrounds and disadvantaged groups predominated. Today, more dropouts come from higher socioeconomic backgrounds and have high
intelligence levels (Associated Press, 1987). High-school dropouts from high socioeconomic backgrounds seem to be seeking immediate gratification rather than pursuing education and career training necessary for maintaining their high social origins. They will add to the number of those who are downwardly mobile. The interplay between the larger social context (macro-level) and the social psychological factors (micro-level) already mentioned is responsible for the increase in voluntary downward mobility.

Some social changes have set the stage for downward educational aspirations and the voluntary downward mobility phenomenon. In particular, the American class system has become less distinguishable than in the last century. More people today belong to the middle class and the standard of living is high. People in general do not experience discontent since consumer products are widely available, even to those with low socioeconomic status. There has been homogenization of dress and social etiquette and a leveling of income and consumption (Knottnerus, 1987). The similarity of dress among people of differing socioeconomic levels, a similarity which resulted from mass textile production, is an example of the lack of class distinction in American society (Harrington, 1974). It is factors such as these that have led to the observation on the part of some that class differences have been reduced (Blau and Duncan, 1967; Knottnerus, 1987; Sjoberg, 1951).
Furthermore, incentives for upward mobility or status maintenance have changed. Incentives for social achievement today mainly have to do with the materialistic lifestyle rather than the social superiority/inferiority or deference to authority that is sometimes associated with social status. The materialistic and egalitarian value system of modern society has reduced patterns of deference (Knottnerus, 1987).

In addition, the general childhood experience has changed. Children raised in a modern, technological society such as the United States are more accustomed to familial warmth and greater care resulting from modern medicine, nutrition and child psychology. According to Berger and Berger (1971), this new childhood is probably happier than any previous one in human society. However, bureaucratization of all areas of social life has also increased. They note that children from the upper middle class who experience a high degree of the "spirit of childhood" encounter the "spirit of bureaucracy" for the first time in the educational system. Since the bureaucratic system, unlike the family, does not have an underlying value orientation that reflects subjective criteria and concern for the overall well-being of the individual, in the course of this clash, some young people from the upper middle class become rebellious and turn against achievement. The end result is downward social mobility.
In short, social change toward classlessness, homogenization of dress and consumption, and technological progress may blind some young people from higher socioeconomic backgrounds to qualitative differences in materialistic life styles. American society, with its advanced technology and stable democratic government, makes it easier for people to survive and to find satisfaction. Some youths do not strive to maintain their high status origins. This type of society is supportive of those who want to move up and tolerant of those who feel indifferent about social achievement. As a consequence, more adolescents from higher socioeconomic backgrounds do not find incentives for status maintenance, hardly get along with the bureaucratic system, turn against social achievement, and ultimately, become downwardly aspiring.

DIRECTIONS FOR FUTURE RESEARCH

This study has considered downward educational aspirations as an early sign of downward mobility and has explored factors at different levels of influence that might be relevant to this phenomenon. Although informative, the social psychological approach taken here is only part of the picture. A comprehensive explanation of downward educational aspirations will require the interpretation of micro- and macro-sociological analysis. Many
questions still remain. For example, can the social psychological perspective used in this study be applied to the same phenomenon in other societies characterized by different levels of technological development or modernization?

Furthermore, since people in the United States value individualism, the issue of adolescents' downward educational aspirations (downward mobility tendency) may not be taken seriously or it may be regarded as a concern that interferes with the individual's freedom of choice. Although adolescents' downward aspirations can be detected and, perhaps, prevented, the negative consequences and social problems relating to the increase in downwardly aspiring people has not yet been determined. In the next decade, when the downwardly aspiring adolescents of today become downwardly mobile, will they contribute to society's problem? A related question is whether adolescents with downward educational aspirations show the other signs of deviance.

Finally, a fundamental issue that remains to be settled is what percentage of adolescents with downward educational aspirations actually become downwardly mobile in later life. Longitudinal design would be especially appropriate for addressing this kind of research question.
REFERENCES

Alexander, C. Norman Jr. and Ernest Q. Campbell

Alexander, Karl L., Bruce K. Eckland and Larry J. Griffin

Alexander, Karl L. and Martha A. Cook

Alwin, Duane, F. and Arland Thornton

Andrisani, P. J. and T. N. Daymont

Associated Press
1987 "A new breed of school dropout: Young, smart." Columbus Dispatch, February 16, p.7A.

Bell, Gerald D.

Bayer, Alan E.

Berger, Peter L. and Brigitte Berger

Blake, Judith

Blau, Peter M. and Otis D. Duncan

Bordua, David J.

Brookover, Wilbur B., Edsel L. Erickson and Lee M. Joiner

Center for Human Resource Research

Cleary, Paul D and Ronald Angel

Coleman, James S.

Collins, Randall

Crockett, Harry J.

Davies, Mark and Denise B. Kandel

Douvan, Elizabeth and Joseph Adelson
1958 "The psychodynamics of social mobility in adoles-
Duncan, Otis Dudley

Duncan, Otis Dudley, Archibald O. Haller and Alejandro Portes

Duncan, Otis Dudley, David L. Featherman and Beverly Duncan

Ferrone, Fred R.

Frantz, Roger S.

Freeman, Joyce S.

Garrison, Howard H.

Goldthorpe, John H.

Gombos, Angela G. K.
1985 "Relationship of career aspiration and educational
expectation to reading ability, race (White, Hispanic, Oriental), and sex of high school students."

Haller, Archibald O.

Haller, Archibald O. and C. E. Butterfield
1960 "Peer influences on levels of occupational and educational aspirations." Social Forces 38:289-95.

Haller, Archibald O. and Alejandro Portes

Harrington, Michael

Hauser, Robert M., Shu-Ling Tsai and William H. Sewell

Heider, Fritz

Heiss, Jerold

House, James S.

Hyman, Herbert H.
1966 "The value systems of different class: a social psychological contribution to analysis of stratification." Pp. 488-499 in Reinhard Bendix and Seymour Martin Lipset (eds.), Class, Status and Power:


Lewin, Kurt, Tamara Dembo, Leon Festinger and Pauline Snedder Sears

Lipset, Seymour M. and Reinhard Bendix

Loewenstein, Gaither

Looker, Dianne E. and Peter C. Pineo

Lopreato, Joseph and Lawrence E. Hazelrigg

Marini, Margaret Mooney

Marini, Margaret Mooney and Ellen Greenberger

Mead, George Herbert

Merton, Robert K and Alice K. Rossi

O'Neill, Dave M. and Peter Sepielli

Page, William F.
1977 "Interpretation of Goodman's log-linear model
effects: An odds ratio approach." Sociological Methods and Research 5:419-35.

Peplau, Letitia Anne

Petersen, Trond

Picou, J. S. and T. M. Carter

Raschke, Helen J. and Vernon J. Raschke

Rehberg, R. A.

Rosenberg, Morris

Saltiel, John

Sewell, William H.

Sewell, William H. and J. Michael Armer

Sewell, William H. and Vimal P Shah
Sewell, William H., Archibald O. Haller and Alejandro Portes  
1969  "The educational and early occupational attainment  

Sewell, William H., Archibald O. Haller and George W.  
Ohlendorf  
1970  "The educational and early occupational status  
attainment process: replication and revision."  

Sewell, William H. and Robert M. Hauser  
1976  "Causes and consequences of higher education: mod-  
els of the status attainment process."  Pp. 13-22  
in William H. Sewell, Robert M. Hauser and David L.  
Featherman (eds.), Schooling and Achievement in  

1975  Education, Occupation, and Earning: Achievement in  

Sewell, William H., Robert M. Hauser and David L. Featherman  
1976  Schooling and Achievement in American Society. New  

Sewell, William H. and Robert M. Hauser  
1980  "The Wisconsin longitudinal study of social and  
psychological factors in aspirations and achieve-  
Research in Sociology of Education and Socializa-  

Sewell, William H., Robert M. Hauser and Wendy C. Wolf  
1980;  "Sex, schooling, and occupational status."  Ameri-  
can Journal of Sociology 86:551-83.

Shaw, Marvin E. and Philip R. Costanzo  
1982  Theories of Social Psychology. New York:  
Mc.Graw-Hill.

Sherif, Muzafer and Carolyn W. Sherif  

Sjoberg, Gideon  
1951  "Are social classes in America becoming more rig-  
id?"  American Sociological Review 16:775-83.

Simpson, Miles E.  
1970  "Social mobility, normlessness and powerlessness in  
two cultural contexts."  American Sociological  
Review 35:1002-1013.
Smelser, William T. and Neil J. Smelser

Sorokin, Pitirim A.

Spenner, Kenneth I. and David L. Featherman

Sullivan, Harry Stack

Theodorson, George A. and Achilles G. Theodorson

Turner, Ralph H.

Wanner, Richard A. and Lionel S. Lewis

Wilensky, Harold L. and Hugh Edwards

Wilson, Kenneth L. and Alejandro Portes

Zimbardo, Phillip and Ebbe B. Ebbesen