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How Lower- and Working-Class Youth Become Middle-Class Adults: The Association between Ego Defense Mechanisms and Upward Social Mobility

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SNAREY, JOHN R., and VAILLANT, GEORGE E. *How Lower- and Working-Class Youth Become Middle-Class Adults: The Association between Ego Defense Mechanisms and Upward Social Mobility*. CHILD DEVELOPMENT, 1985, 56, 899–910. This is a report of social mobility in 278 inner-city men studied for 4 decades and over 3 generations. 63.3% of the men and 59.8% of their children were upwardly mobile. 8 variables captured 28% of the explained variance in upward social mobility: IQ, mother's education, mother's occupation, boyhood ego strength, and four ego defense mechanisms—intellectualization, dissociation, sublimation, and anticipation. Of the 8 variables, intellectualization—the capacity to isolate ideation from the associated affect—explained the most unique variance, especially over 3 generations. Childhood relations of subjects with parents and father's IQ exerted no discernible effect on children's upward social mobility.

Children's social class is a stubborn predictor of their social class as adults. Only 1.8% of the children of manual laborers, for instance, enter the professions (Sennett & Cobb, 1972). Research to date has impressively documented factors that derail lower- and working-class individuals from upward social mobility. Among these are restricted access to educational and employment opportunities; high school tracking; class-biased career counseling; residential segregation by social class; class-biased achievement and IQ tests; lower teacher expectations for lower-class youth; and, perhaps most serious of all, racial prejudice (see Bowles & Gintis, 1973, 1976; Clark, 1960; Howell, 1973; Pfeffer, 1979; Pincus, 1980; Rosenbaum, 1976; Rubin, 1976; Sennett & Cobb, 1972; Shor, 1980; Snarey, Epstein, Sienkiewicz, & Zodhiates, 1980; Zwerling, 1976).

This article, however, will address the opposite question. How do those who still manage to hurdle the barriers—go to college and enter the professions—manage to do it? Understanding how upwardly mobile indi-

viduals from the lower and working classes cope is the purpose of this study.

The model of coping that informs this study is a developmental hierarchy of ego mechanisms of defense (Vaillant, 1971, 1976, 1983b), which builds on the prior work of S. Freud (1893/1964, 1894/1964, 1895/1964, 1896/1964, 1906/1964), A. Freud (1937), Haan (1964b), and Semrad (1967). Ego mechanisms of defense are inferred unconscious psychological processes that function to allow the individual to cope with stressful environmental situations or stimuli. Defenses can also be understood as a strand of development within the more inclusive domain of ego development (Loevinger, 1976; Snarey, Kohlberg, & Noam, 1983).

This theoretical hierarchy includes three levels of defenses (immature, intermediate, and mature), each of which in turn encompasses four to six different types of defenses. The *immature defenses* include projection, fantasy, hypochondriasis, passive-aggressive behavior, dissociation, and acting out. These

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defenses are common in “normal” adolescents, in persons with character and affective disorders, and in adults in psychotherapy. The *intermediate defenses* include repression, displacement, reaction formation, and intellectualization. They are common in “normal” adults and in those with neurotic disorders. Finally, the *mature defenses* include altruism, humor, suppression, anticipation, and sublimation. These defenses are generally understood as characterizing healthy, mature adults. Elsewhere, these 15 defense mechanisms are described in more detail, and empirical evidence for the hierarchy is provided (Vaillant, 1976, 1977).

Hypothesis

What factors might explain why some lower- and working-class individuals are able to hurdle successfully the barriers to social mobility and join the middle class? The answers to this question are complex and multifaceted. Haan’s research (1964a) has suggested that impulse control in the coping sense is related to upward social mobility for both sexes. Growing evidence also indicates that differences in unconscious coping styles or defenses make a major contribution to explaining why individuals differ in their response to similar stressful environmental stimuli (Vaillant, 1977; Vaillant & Milofsky, 1980). This study tests the hypothesis that a significant degree of variation in upward social mobility is accounted for by the use of more mature defenses. On the one hand, the use of mature coping mechanisms could be a necessary, although certainly not sufficient, condition for upward mobility, since mature defenses more effectively integrate ideas and affect with reality. When confronting the inevitable barriers to social mobility, such coping styles might convey advantage. On the other hand, immature defenses could be a sufficient, although not necessary, condition for a lack of upward mobility in that they are perceived by others as socially undesirable (see Havighurst & Neugarten, 1975). Demonstration of such a relationship between mature defenses and social mobility would not rule out environment or even random good fortune but rather would rule in intrapsychic variables as completing explanations. We do not wish to diminish the importance of “situation” explanations, but only reemphasize the importance of “person” explanations.

Method

Subjects

This study includes three generations of subjects. The *second-generation* subjects,

commonly called the Glueck or Core City sample, are part of an ongoing 40-year longitudinal study begun in the early 1940s by Sheldon and Eleanor Glueck (1950, 1966, 1968). But since the Gluecks were interested in understanding the origins of juvenile delinquency, they also studied the parents carefully—the *first generation*. And since the second generation was followed for 40 years, data on their children could be systematically gathered—the *third generation*. The second generation originally included 500 nondelinquent junior high school boys (ages 14 ± 2) from the Boston area as a control group for a group of 500 delinquent boys who had been remanded to reform school. The control group (our second generation) and the delinquents had been carefully matched for IQ, ethnicity, age, and residence in high-crime neighborhoods. Although there were no blacks in the Glueck study, the sample included a broad ethnic mix, and 61% of the boys had at least one parent who was born in a foreign country. Nearly all of the subjects were from lower- or working-class families. Although at age 14 ± 2 years the control group had been chosen for absence of obvious delinquency, eventually 19% of the controls spent time in jail, a datum suggesting that the sample is only modestly biased toward good behavior.

The Gluecks reinterviewed over 90% of the subjects ($N = 456$) at age 25 (ca. 1955) and again at age 31 (ca. 1962). We later followed the 456 nondelinquent control subjects into middle age (ca. 1978); this has included a 2-hour interview at age 47 ± 2 and subsequent biennial questionnaires (Vaillant, 1983a; Vaillant & Milofsky, 1980; Vaillant & Vaillant, 1981). Most recently, in 1983, the educational, occupational, and social class outcomes of the Glueck subjects’ adult children (ages 25+) were obtained; thus, Sheldon and Eleanor Glueck’s original work was extended to the third generation.

This three-generation study has been affected by attrition. First, in order for raters to determine maturity of defenses, only the files that included complete clinical interviews could be used. This restriction reduced the sample from 456 to 307. Second, of these 307 cases, complete social class information was available for both the first generation (parents of the Glueck subjects) and the second generation (the Glueck subjects) in 278 of the cases. When we compare these 278 men to the excluded 178, besides the expected differences in mortality, there was significant bias in only one area. Attrition was more common among men from multiproblem families, who in

youth and adult life were the most antisocial, and who in adult life were the most severely mentally ill. These 278 men, however, did not differ from the others in terms of IQ, ethnicity, childhood emotional problems, or environmental strengths. Since the comparisons and conclusions of this article are based on comparisons among the individuals remaining in the study, these limitations should not seriously prejudice the findings.

By 1983, 196 of the 278 Glueck subjects had children older than 24 years. These firstborn adult children included 102 males and 94 females, ranging in age from 25 to 38 years, with a mean age of 29. Complete social class information on the children and both of their parents, and their fathers' defense ratings, were available in 137 cases. Comparing these 137 firstborn adult children with the 59 excluded cases, there were no significant differences in their family background, age, or sex. To prevent further sample reduction, this study limits itself only to these firstborn children.

Rating Scales

The subjects were rated on the variables below. Each variable was rated by judges blinded to other aspects of the subjects' lives.

Social class and mobility.—The following three indices of social class position were calculated.

1. **Hollingshead's Two-Factor Index:** This index yields a 5-point scale: I = upper middle class, II = middle class, III = lower middle class, IV = working class, and V = lower class (Hollingshead, 1959). The index is based on a combination of occupational and educational measures; the occupational and educational subscales were also adapted for use as individual measures ranging from 1 (low) to 7 (high). The advantages of the Hollingshead two-factor index, compared to other scales and the previous Hollingshead and Redlich three-factor index (1958), are discussed by Haug (1972). (Note that in previous publications from this sample, the three-factor index was used.)

The two-factor index of social class was estimated for the first generation (fathers and mothers of the Glueck subjects), the second generation (the Glueck subjects and their wives), and the third generation (adult children of the Glueck subjects). The interrater reliability for the Glueck subjects was .92 for occupation, .98 for education, and .93 for social class. The mean interrater reliability for father, mother, and wife of the Glueck subjects was .79 for occupation, .87 for education,

and .71 for social class. The mean interrater reliability for the adult children of the Glueck subjects was .94 for occupation, .96 for education, and .91 for social class.

2. **Hollingshead's Four-Factor Index:** This index is identical to the above measure except that it also takes into consideration marital status and sex in order to yield a social class position for a family unit (Hollingshead, 1975). It is essentially an average of the husband's and wife's social positions.

3. **Social Mobility Index:** The degree of social mobility between any two generations was estimated by subtracting the child's individual social class rating from the parents' four-factor index of social class and then adding 5. This yielded a scale ranging from 1 (high downward mobility) to 5 (perfect stability) to 9 (high upward mobility). This social mobility index was calculated for both the Glueck subjects and the children of the Glueck subjects.

Childhood background, second generation.—The following four scales were used to estimate the quality of the Glueck subjects' childhood.

1. **Father-Child Relationship Index:** This 22-point scale is based on the combined Gluecks' original ratings regarding the qualities of warmth, attachment, affection, supervision, and discipline that characterized the father-child relationship and seemed conducive to autonomy and self-esteem (see Glueck & Glueck, 1950).

2. **Mother-Child Relationship Index:** This scale is identical to the above, except that it combines the original Glueck ratings regarding the mother's relationship with the child.

3. **Boyhood Environmental Strengths Index:** This is a 20-point scale that rated the Glueck subjects by a clinical judgment of childhood environmental strengths in general. Points were assigned for the absence of problems with physical, social, and mental health and for the presence of stable and secure parental relationships and home atmospheres conducive to development. Interrater reliability among the three raters ranged from .70 to .89. The scale is described in detail elsewhere (Vaillant, 1974).

4. **Boyhood Competence:** This is an 8-point scale intended to serve as a crude measure of childhood coping skills and ego strength, paralleling Erikson's fourth stage of industry (Vaillant & Vaillant, 1981). The boys received points for doing regular chores, ad-

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justing well to school socially and academically (controlling for IQ), participating in after-school jobs, and coping with difficulties in their inner-city homes. Interrater reliability ranged from .70 to .91.

Childhood background, third generation.—In addition to the above variables, the following ratings on the quality of the family and social environment in which the *children* of the Glueck subjects grew up were constructed.

1. Family Stability Index: This scale of the relationship between the child's father and mother is based on the combination of ratings for marital stability, compatibility, and enjoyment. The combination of these variables, which have been described elsewhere (Vaillant, 1978, 1983b), yielded a 7-point scale.

2. Family Social Relations Index: This index of the family's relationships with other social groups outside the family is based on a combination of ratings for contact with relatives, friends, taking vacations, and church attendance. It is a subscale of the object relations index, which has been described elsewhere (Vaillant & Milofsky, 1980). The combination of these items yielded a 9-point scale.

3. Father's Relationship with Children: The Glueck subjects were rated on a scale from 1 (consistently poor relationship with their children) to 4 (very positive relationship with their children). This rating is also based on the object relations index noted above. Information was not available for rating the mother-child relationship in the third generation.

Competency background variables.—In order to assess variations in social mobility that might be attributable to other background variables, the following variables were controlled.

1. IQ: Each of the Glueck subjects was given the Wechsler-Bellevue Intelligence Test when he entered the study. We are aware that the test may be class-biased, but it was the only cognitive measure available to us (see Bowles & Gintis, 1973).

2. Problem Drinking Scale: This scale is an equally weighted 16-item symptom scale that has been described elsewhere (Vaillant, 1980). Glueck subjects with 0–1 symptom on the scale would be defined as nondrinkers or social drinkers, and subjects with 4+ symptoms would be defined as alcohol abusers.

3 and 4. Age and sex: Age and sex were controlled for as background variables for the adult children of the Glueck subjects.

Ego coping mechanisms.—Based on a 2-hour interview at approximately age 47, each Glueck subject was rated for the use and importance of each of the 15 ego mechanisms of defense defined in Vaillant's developmental model, that is, the five mature defenses (sublimation, anticipation, suppression, humor, altruism), four intermediate or "neurotic" defenses (intellectualization, reaction formation, displacement, repression), and the six immature defenses (acting out, passive-aggressive behavior, dissociation, hypochondriasis, fantasy, and projection). Each individual defense was rated on a scale from 1 (absent) to 5 (both raters saw it as major). In addition, an overall 9-point index of maturity of defenses was calculated in which 1 indicated that the person used mostly immature defenses and 9 indicated that the person used mostly mature defenses. The interrater reliability for the defense maturity score was .83; the ratings for only 23 men differed by more than 2 on the 9-point scale. The scoring procedure, reliability, and validity are described in greater detail elsewhere (Vaillant, 1983b).

Statistical Procedures

Stepwise and hierarchical multiple regressions were used to explain the variation in a dependent variable (i.e., social mobility) in terms of the variation in each of a set of independent or explanatory variables (e.g., childhood social class, father's ego defenses). We are aware of an apparent inconsistency between the assumptions often considered to underlie the use of parametric techniques, such as multiple regression analysis, and a measure of social mobility that may not be strictly an interval scale. The justifications for this choice are as follows: (1) our measure of social mobility is at least ordinal, thus falling in the gray area where there is considerable debate over the appropriate pairing between type of scale and type of statistic (Gardner, 1975); (2) the *F* test has been shown to be a robust statistic, capable of valid inference even with moderate violation of assumptions (Kerlinger & Pedhazur, 1974); (3) if we had a more precise equal interval scale of mobility, multiple regression would be an even more powerful method, but the present measure biases against, not in favor of, the hypothesis; (4) a considerable number of precedents have been set for parametric analysis of similar data (e.g., Jencks et al., 1972).

Results

Social Class and Social Mobility in General

To what degree did the sample manifest social class stability or mobility? Table 1 sum-

TABLE 1
PERCENT OF SUBJECTS IN FIVE SOCIAL CLASSES ACROSS THREE GENERATIONS

SOCIAL CLASS	FIRST GENERATION		SECOND GENERATION		THIRD GENERATION	
	Father of Glueck S	Mother of Glueck S	Glueck S	Wife of Glueck S	Male Child	Female Child
I. Upper middle . . . . .	. . . (0)	. . . (0)	1.8 (5)	. . . (0)	5.5 (4)	. . . (0)
II. Middle class . . . . .	.4 (1)	.4 (1)	5.4 (15)	5.9 (11)	9.6 (7)	14.1 (9)
III. Lower middle	2.2 (6)	3.2 (9)	18.0 (50)	8.5 (16)	37.0 (27)	35.9 (23)
IV. Working class	37.8 (105)	37.4 (104)	49.3 (137)	68.1 (128)	43.8 (32)	45.3 (29)
V. Lower class	59.7 (166)	59.0 (164)	25.5 (71)	17.6 (33)	4.1 (3)	4.7 (3)
Mean	4.6	4.6	3.9	4.0	3.3	3.4
N	(278)	(278)	(278)	(188)	(73)	(64)

NOTE.—S = subject. Numbers in parentheses are numbers of subjects.

marizes social class membership across the three generations. In the first generation, the majority of the Glueck men's fathers (59.7%) and mothers (59.0%) were in the lower class (V), according to Hollingshead's Two-Factor Index. By the second generation, however, the majority of the Glueck men (49.3%) and their wives (68.1%) were members of the working class (IV); fairly equal numbers of Glueck men and their wives were members of the lower (V) class (25.5%, 17.6%) and the lower middle (III) or middle (II) classes (23.4%, 14.4%). Only a few subjects (1.8%) had become upper-middle-class professionals (I).

The working class was still the modal position of the third-generation adult children of the Glueck subjects, including 43.8% of the males and 45.3% of the females. The number in the lower (V) class had dropped dramatically, however, to 4.1% of the males and 4.7% of the females. The number who had joined the lower-middle (III) or middle (II) classes also rose, to 46.6% of the males and 50.0% of the females. Thus, when the two middle-class positions were combined, there were actually more middle-class than working-class children. Again, however, only males were rated as upper-middle-class professionals (5.5%).

The general trends in mobility for three generations are summarized in Table 2. A majority of the Glueck men (63.3%) were upwardly mobile, and a sizable minority (32.4%) were socially stable. Only 12 (4.4%) of the 278

Glueck subjects were downwardly mobile, but since most subjects started out in life in the lower two classes, downward mobility was less of an option. Furthermore, attrition had selectively excluded some delinquent and mentally ill subjects. It is worth noting, however, that every downwardly mobile Glueck subject in this study suffered from some form of severe disability, for example, alcoholism, mental illness, mental retardation, a physical disability, or some combination of these problems (see Goodman, Siegel, Craig, & Lin, 1983; Robins, Gyman, & O'Neal, 1962; Srole et al., 1962). Like their fathers, the majority of the children of the Glueck subjects were again upwardly mobile (59.8%), followed by a large number who were socially stable (33.6%); still only a few were downwardly mobile (6.5%). Despite the high degree of upward mobility, however, it must be kept in mind that the majority of the subjects rose only *one* class. Thus, only 1.8% of the Glueck subjects and, on average, 2.9% of the Glueck subjects' children entered the upper-middle-class professions.

Accounting for Upward Social Mobility

From the first to the second generation.—Because the number of downwardly mobile subjects was very small (12), the following analyses were applied only to those subjects whose social mobility index rating ranged from 9 (high upward mobility) to 5 (perfect stability). The correlation coefficients between upward social mobility and the other variables were examined. Out of the 25 vari-

TABLE 2
SOCIAL MOBILITY ACROSS THREE GENERATIONS (%)

Type of Social Mobility	From First to Second Generation (Glueck Subjects)	From Second to Third Generation (Glueck Subjects' Children)
Upwardly mobile 4 classes	1.1 (3)	.7 (1)
Upwardly mobile 3 classes	4.0 (11)	4.4 (6)
Upwardly mobile 2 classes	16.5 (46)	13.1 (18)
Upwardly mobile 1 class	41.7 (116)	41.6 (57)
Stable, same class	32.4 (90)	33.6 (46)
Downwardly mobile 1 class	4.0 (11)	5.8 (8)
Downwardly mobile 2 classes . . . . .	.4 (1)	.7 (1)
<i>N</i>	(278)	(137)

NOTE.—Numbers in parentheses are numbers of subjects.

ables under consideration, 20 were significantly correlated with upward mobility. Three of the four parental social class ratings were significantly correlated with mobility, and three of the four childhood background variables were also significantly correlated with upward mobility (father's education, $r = -.10$, $p < .05$; mother's education, $r = -.10$, $p < .05$; mother's occupation, $r = -.10$, $p < .05$; father-child relation, $r = .10$, $p < .05$; boyhood ego strength, $r = .20$, $p < .0001$; boyhood environment, $r = .14$, $p < .01$). IQ also had a significant positive correlation with mobility ($r = .24$, $p < .0001$), while alcohol abuse was negatively correlated ($r = -.28$, $p < .0001$). Four of the five mature defenses had significant positive correlations with upward mobility (suppression, $r = .17$, $p < .01$; altruism, $r = .21$, $p < .0001$; sublimation, $r = .25$, $p < .0001$; anticipation, $r = .21$, $p < .0001$). Two of the four intermediate defenses were significantly and positively correlated with mobility (intellectualization, $r = .28$, $p < .0001$; displacement, $r = .11$, $p < .05$), and all immature defenses had a significant negative correlation with upward mobility (fantasy, $r = -.19$, $p < .001$; acting out, $r = -.15$, $p < .01$; hypochondriasis, $r = -.18$, $p < .001$; passive-aggressive, $r = -.22$, $p < .0001$; projection, $r = -.13$, $p < .05$; dissociation, $r = -.28$, $p < .0001$).

The results of the stepwise and hierarchical regression analyses are presented in Table 3. Using the stepwise procedure, with all

background variables and defenses available for entry into the equation, 27.9% of the variance in mobility is accounted for by eight variables. Four defenses were significant and accounted for 18.4% of the variance in upward social mobility: intellectualization, 7.8%; dissociation, an additional 6.2%; sublimation, an additional 2.8%; and anticipation, an additional 1.6%. IQ accounted for an additional 4.1% of the variance, and two parental social class variables (mother's education and occupation) accounted for 3.5% of the variance. Boyhood competence or ego strength accounted for an additional 1.9% of the variance; it was the only childhood background variable to account for variance in upward social mobility: $R = .528$, $F(8,234) = 11.34$, $p < .0001$. The most critical test of the hypothesis—a hierarchical regression analysis with all background variables entered into the equation prior to a stepwise entry of defenses—is presented at the bottom of Table 3. The total model accounted for 30.1% of the variance in upward mobility: $R = .549$, $F(13,229) = 7.60$, $p < .0001$. Most important, three defenses still entered the equation and explained 10% of the variance beyond what was explained by all the background variables. Intellectualization and anticipation remained significant, and altruism also entered, while dissociation and sublimation dropped out.

From the second to the third generation.—The correlation coefficients between

TABLE 3

SUMMARY OF REGRESSION ANALYSES: GLUECK SUBJECTS' SOCIAL MOBILITY AS DEPENDENT VARIABLE

Method, Step, and Independent Variable	<i>b</i>	Mult. <i>R</i> ²	<i>R</i> ² Change	<i>F</i> Change	<i>p</i> Value
Stepwise—all variables available for entry: ^a					
1. Intellectualization .....	.177	.078	.078	20.49	<.0001
2. Dissociation	-.113	.140	.062	17.38	<.0001
3. IQ .....	.016	.181	.041	11.88	<.001
4. Sublimation .....	.131	.209	.028	8.61	<.005
5. Boyhood competence .....	.076	.228	.019	5.77	<.05
6. Mother's education	-.121	.250	.022	7.01	<.05
7. Anticipation .....	.127	.266	.016	4.95	<.05
8. Mother's occupation	-.088	.279	.013	4.21	<.05
Hierarchical—all variables forced to enter:					
Parent's social class:					
1. Father's education	-.059	.009	.009	2.17	N.S.
2. Mother's education	-.104	.014	.005	1.23	N.S.
3. Father's occupation	-.026	.015	.001	.39	N.S.
4. Mother's occupation	-.102	.025	.010	2.28	N.S.
Childhood background:					
5. Father-child relations .....	.011	.036	.011	2.77	N.S.
6. Mother-child relations	-.029	.036	.000	.07	N.S.
7. Boyhood environment .....	.011	.053	.017	4.26	<.05
8. Boyhood competence .....	.062	.087	.033	8.52	<.005
State variables:					
9. IQ .....	.018	.147	.060	16.52	<.0001
10. Alcohol abuse	-.041	.201	.053	15.54	<.0001
Ego defense mechanisms: ^b					
11. Intellectualization .....	.171	.252	.051	15.84	<.0001
12. Altruism .....	.109	.286	.034	11.10	<.001
13. Anticipation .....	.125	.301	.015	4.85	<.05

^a Other variables not significant.^b Other defenses not significant.

the social mobility of the children of the Glueck subjects and the other variables under consideration were examined. Out of the 26 variables, only four were significantly correlated with upward mobility. Three of the parental social class variables had a significant negative correlation with their child's upward mobility, and one of the child's father's defenses, intellectualization, was positively correlated with the child's mobility (father's education, $r = -.27$, $p < .001$; father's occupation, $r = -.29$, $p < .0001$; mother's occupation, $r = -.25$, $p < .001$; intellectualization, $r = .32$, $p < .0001$).

The results of stepwise and hierarchical regression analyses are presented in Table 4. When the stepwise procedure was conducted with all background variables and defenses available for entry into the equation, 15.1% of the variance was accounted for by two variables that entered the equation: intellectualization entered first and accounted for 10.2% of the variance; mother's occupation entered second and accounted for an additional 4.9% of the variance: $R = .389$, $F(2,125) = 9.87$,

$p < .001$. Intellectualization remained the only significant defense when male and female children were considered separately in the stepwise analysis of defenses: $R = .348$, $F(1,66) = 8.03$, $p < .01$; $R = .282$, $F(1,58) = 4.48$, $p < .05$. Finally, when all background variables were forced to enter the equation regardless of their statistical significance, intellectualization still accounted for an additional 6.0% of the variance beyond what was explained by all the background variables, and the contribution was significant: $R = .477$, $F(12,101) = 2.48$, $p < .01$.

Discussion

We wish to acknowledge three caveats before interpreting the previously described results and presenting our conclusions. First, the sample is limited in terms of race, sex, and historical epoch. The inclusion of the Glueck subjects' parents, spouses, and children ameliorates this problem slightly, however, since the additional subjects included females as well as individuals who came of age in different historical settings and economic

TABLE 4

SUMMARY OF REGRESSION ANALYSES: CHILDREN'S SOCIAL MOBILITY AS DEPENDENT VARIABLE

Method, Step, and Independent Variable	<i>b</i>	Mult. <i>R</i> ²	<i>R</i> ² Change	<i>F</i> Change	<i>p</i> Value
Stepwise—all variables available for entry: ^a					
1. Intellectualization .....	.246	.102	.102	12.65	<.001
2. Mother's occupation	-.186	.151	.049	9.87	<.05
Hierarchical—all variables forced to enter:					
Parent's social class:					
1. Father's education	-.089	.074	.074	8.97	<.005
2. Mother's education .....	.190	.074	.000	.00	N.S.
3. Father's occupation	-.074	.101	.027	3.31	N.S.
4. Mother's occupation	-.257	.151	.050	6.44	<.05
Childhood background:					
5. Family social relations .....	.031	.152	.001	.07	N.S.
6. Father-child relations .....	.155	.165	.013	1.63	N.S.
7. Family stability .....	.006	.165	.000	.02	N.S.
State variables:					
8. Father's IQ .....	.000	.165	.000	.00	N.S.
9. Father's alcohol abuse	-.019	.167	.002	.28	N.S.
10. Child's age .....	.002	.167	.000	.05	N.S.
11. Child's sex .....	.043	.168	.001	.08	N.S.
Father's ego defense mechanisms: ^b					
12. Intellectualization .....	.217	.228	.060	7.77	<.01

^a Other variables not significant.^b Other defenses not significant.

climates. Nevertheless, the original data source places severe restrictions on methodological rigor, and one must interpret and evaluate within these constraints. Second, although this research is part of an ongoing longitudinal study, the ego defense ratings are based on adulthood, not childhood, interviews. The richness of the data does allow us, however, to control for critical background variables and thus rule out many competing hypotheses as the sole explanation. Nevertheless, since intellectualization was measured concurrently with the Glueck subjects' adulthood social class and only 5 years before the children's adulthood social class, a causal association cannot be claimed. Third, ego defenses are elusive constructions, and the scoring system used cannot have the statistical and methodological elegance of pencil-and-paper tests, controlled laboratory paradigms, and standardized rating scales. Rigorous methods for the study of ego psychology have not yet been perfected. On the other hand, the noise that this vagueness introduces into the data should make it less, not more, likely that highly significant differences between groups would be found at all, let alone along the lines hypothesized.

The most important conclusion to be drawn from this study is that the use of unconscious ego defense styles does in fact account

for a significant degree of variation in upward social mobility. When all background variables were forced to enter the equation *prior* to defenses, intellectualization, anticipation, and altruism still accounted for 10% of the variance ($r = .32$). Rosenthal and Rubin's BESD procedure (1979, 1982), a new method of displaying the practical importance of a correlation of any particular magnitude, estimates that an r of .32 is equivalent to an increase of 32% in the correct prediction of a particular success rate. In this particular study, the BESD estimates are that the prediction of successful upward social mobility would be reduced from the actual 63.3% to approximately 34% if no subject made use of intellectualization, anticipation, or altruism (see Rosenthal & Rosnow, 1984, pp. 208–211). The BESD procedure suggests, that is, that the practical importance of these defenses is fairly substantial.

It was interesting that three of the variables that best accounted for social mobility had a cognitive component—intellectualization, IQ, and anticipation. Furthermore, the only defense used by the Glueck subjects that accounted for a significant degree of variation in the further upward social mobility of *their children* was paternal intellectualization. This finding is consistent with a number of previous studies of adjustment in childhood and

adulthood; whenever intelligence is included among the variables, it emerges as a more significant factor than social and personality measures (Kohlberg, Ricks, & Snarey, 1984). But in this study the ego defense of intellectualization correlates only .12 with IQ, and in our data intellectualization accounts for more variance in upward mobility than even IQ. Thus it is important to discuss intellectualization in greater detail.

Intellectualization, or isolation of affect, involves thinking about instinctual wishes in formal but affectively bland terms. Freud first described isolation as a defense mechanism in 1894. The wish is conscious, logical, and rational, but its emotional coloring is separated off and repressed. Intellectualization, as used here, not only encompasses the defense mechanism of isolation, but also undoing and philosophical rationalization. The defense includes paying seemingly undue intellectual attention to external detail to avoid awareness of inner feelings.

Intellectualization was frequently used to solve work-related problems by upwardly mobile individuals. The fact that they did not get angry made them easier to work with and more socially acceptable. Yet they were not conformist; the fact that they could and would present a logical argument for their position and require others to do the same meant that they were able to keep others accountable and to prevent themselves from being abused. Like most people from working-class backgrounds, upwardly mobile Glueck subjects do not believe that whatever authorities do is right, but, unlike many workers, they do believe that they have the right to assert their own rights, if they do so in an intellectual, unemotional manner (see Sennett & Cobb, 1972, p. 159). Intellectualization is the only midrange, or so-called "neurotic," defense to make a significant positive contribution to explaining variation in upward social mobility. In a functional sense, however, it is hardly neurotic, for it has high survival value in any hierarchical system. Indeed, the image of an upper-class WASP is that of a person who takes a cold, Calvinistic, intellectual approach to life and work while remaining isolated from or afraid of his or her emotions (see Weinstock, 1967).

That the tendency to use intellectualization precedes mobility is suggested, although not established, by a number of factors. First, after controlling for all background variables, fathers who use intellectualization are still significantly more likely to have children who are also upwardly mobile when they become

adults. Second, Strodbeck's (1958) pioneer research among boys ages 14–17 indicated that the possibility of upward social mobility (defined as achieving higher in school than would be expected based on test scores and as aspiring for careers higher in status than their parents) was significantly enhanced among children who perceived their fathers as emotionally reserved but sharing family authority through democratic discussions. These characteristics, of course, are also elements of intellectualization (see McKinley, 1964). Finally, this perspective is similar to the thesis of Max Weber (1904/1958, 1947), who conceived of three ideal types of authority—rational, traditional, charismatic—in the dialectical relationship between ideology and social structure. The United States approximates the rational type. Just as Weber argued that the rational Protestant ethic, with its avoidance of emotional enjoyment of life, gave rise to the capitalistic system, one could argue that rational intellectualization, with its avoidance of emotional expression, gives rise to individual social mobility within that system.

Anticipation was the second of the three most important defenses. It involves the realistic anticipation of or planning for future inner discomfort, including goal-directed planning, premature but realistic action to mitigate stress, and the utilization of "insight." Anticipation can be understood as a mature form of intellectualization in that both emotions and ideas are conscious. It remained a significant defense, however, even after intellectualization and all other background variables were controlled for. Several other studies have similarly documented that moderate amounts of anxiety before future events promoted adaptation (Hamburg & Adams, 1967; Janis, 1958). For instance, the future success of Peace Corps volunteers was predicted more on their capacity to map out future anxieties than on their apparent emotional stability on psychological tests (Ezekiel, 1968). More than anything, anticipation reflects the capacity to perceive future danger clearly and by this means draw its teeth.

Altruism is the last of the three positive defenses that explains a significant amount of variance in upward mobility after controlling for all background variables. Altruism involves the vicarious but constructive and instinctually gratifying service to others. It includes conscious and constructive reaction formation, philanthropy, and well-repaid service to others. Altruism is the process of actualizing one's potentialities by helping

others actualize their potentials (see Maslow, 1971). Essentially, there was a tendency for upwardly mobile Glueck subjects to give to others what they wish someone had given to them or what others did in fact give to them. By helping others who are now in positions similar to those they themselves were in in the past, a sense of continuity is maintained with one's past, and the sense of a divided self is warded off. Furthermore, by helping one's co-workers who are from a higher social class background, a sense of worker solidarity is also maintained. In sum, in the process of helping others, they themselves find gratification—the hallmark of a mature defense.

In addition to the role of ego defense mechanisms, three other findings deserve mention. First, upward social mobility is more common than is sometimes assumed, although our findings are roughly similar to those reported for other urban populations (Blau & Duncan, 1967; Coleman & Neugarten, 1971; Featherman, 1979; Lipset & Bendix, 1967; cf. Long & Vaillant, 1984). The degree of upward mobility across the three generations, despite differences in historical and economic conditions, remained strong. Two out of five subjects from both generations were upwardly mobile by one social class; one in seven was upwardly mobile by two classes. On the other hand, the barriers to upward mobility were suggested by the fact that only 1.8% of the Glueck men and 2.9% of the children of the Glueck men entered the upper middle class, that is, became university-educated major professionals.

A second interesting trend relates to sex differences in mobility. The male and female children of the Glueck subjects were virtually equally represented in every class except the highest. Of the 2.9% of the children of the Glueck men who entered the upper middle class, all are males. Similarly, comparing the Glueck men and their wives, only the men (1.8%) are rated as being upper middle class in terms of education and profession. Possible social discrimination in terms of sex, that is, was only apparent in our data at the highest reaches of mobility. There may be, in effect, a ceiling barrier that few women are permitted to pass (see Rubin, 1976; Van Fossen, 1977).

Finally, there is an interesting difference between the number of men in the Glueck sample and the number of their male children who entered the upper middle class (1.8% vs. 5.5%). The figure for the Glueck subjects was identical to the 1.8% figure cited by Sennett and Cobb (1972). The figure for their children was somewhat higher and may reflect differ-

ences in historical epoch, but it may also reflect the fact that all of the Glueck children in our sample were firstborn, that is, in any given family, firstborn children tend to be the highest achievers (Altus, 1965a, 1965b; Sutton-Smith & Rosenberg, 1970; Zajonc & Markus, 1975). A preliminary test of this interpretation was undertaken by examining, by random selection, the files of 25 of the Glueck men who had been upwardly mobile two or more classes and the files of 25 of the Glueck men who were stable members of the working or lower classes. No significant differences were found between upwardly mobile versus socially stable subjects in terms of being firstborn versus later-born, $\chi^2(1) = 2.38, p = N.S.$ The Glueck sample is not an adequate population for investigating the effects of ordinal position on mobility, however, since many of the men came from very large families, broken families, or other situations that blur the functional importance of their literal ordinal position (see Tierney, 1983).

Far more research is needed, of course, if we are to understand more fully how lower- and working-class youth evolve into middle-class adults. In particular, global measures of cognitive-social development are promising since most of the important predictors fall within this more general domain. But the results support the value of measuring ego mechanisms of defense as independent "person" variables that may affect social outcomes as much as social variables affect intrapersonal outcomes.

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