

Separation-Individuation, Family Cohesion, and Adjustment to College: Measurement Validation and Test of a Theoretical Model

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We examined the relation between adolescent separation-individuation, family cohesion, and college adjustment. A large sample of college students was split into two groups. One group was used to determine whether several measures of separation-individuation were measuring different dimensions of individuation. Two related factors, labeled *Positive Separation Feelings* and *Independence From Parents*, emerged from an exploratory factor analysis of the measures. A theoretical model, derived from psychodynamic and family systems perspectives of separation-individuation, was tested on the second group of subjects. The model specified that college adjustment would be predicted by family cohesion, positive separation feelings, and independence from parents. The results indicated that the Positive Separation Feelings factor was a better predictor of college adjustment than Independence From Parents or Family Cohesion.

There is growing recognition that the adolescent process of separation-individuation, when viewed from psychodynamic perspectives, may account for college student adjustment (Bragan, 1980; Hansburg, 1972, 1980; Hoffman, 1984; Hoffman & Weiss, 1987; Lapsley, Rice, & Shadid, 1989; Lopez, Campbell, & Watkins, 1986, 1988). According to the psychodynamic view, separation-individuation is the principal developmental task of adolescence. Successfully completing this task contributes to ego mastery of a variety of adaptational challenges (Blos, 1962). The separation-individuation process is particularly relevant for understanding college student adjustment. For many adolescents the transition to college is the first time they will be away from parents for an extended period of time. Theoretically, successful negotiation of this transition depends on how well separation issues have been mastered (Moore, 1987; Sullivan & Sullivan, 1980). The purpose of this article is to explore the intrapsychic and interpersonal dynamics of separation-individuation and to examine their influence on college adjustment.

Adolescent separation-individuation has been conceptualized in a number of ways. Blos (1979) considered the process of adolescent separation-individuation to be intrinsically linked to ego development and to consist primarily of intrapsychic regression and subsequent reorganization. According to Blos (1979), the process of separation-individuation is the adolescent's attempt to transcend infantile parental introjects (object representations) and to reformulate a sense of self. Blos (1962, 1979) has suggested that the primary task of adolescence is to repudiate parental relationships, to disengage psychologically from internalized influences of parents, and to chart an individual course of development. Individuation emerges from the deidealization of parents (whose introjects formed the basis of the adolescent superego) and subsequent reorganization of the ego-superego balance. The shift results in an ego that takes over adaptive functions that were previ-

ously served by the idealized parental content of the superego. Hence, Blos (1979) described separation-individuation as primarily an intrapsychic process that results in the consolidation of one's sense of self as a distinct and unique person.

Alternatively, separation-individuation has been understood in the context of interpersonal, parent-adolescent relational processes. Grotevant and Cooper (1985) argued that the adolescent's adaptive functioning (e.g., identity development and role-taking ability) is enhanced through parent-adolescent relationships that balance individuation with family connectedness. Indeed, Josselson (1988) noted that individuation and connectedness are not in opposition. Rather, individuation occurs in the context of relationships. Josselson argued that an adolescent who is securely attached to the parents is better psychologically equipped to individuate from parents and to adapt to new situations. Indeed, Kenny (1987) described the transition to college as a naturally occurring "strange situation" (p. 18) conceptually similar to the paradigm used in studies of childhood attachment relationships. As in early childhood, one can expect that the securely attached adolescent is able to manage the separation reactions and the adjustment challenges brought about by the college environment.

These perspectives on the process of separation-individuation vary in the emphasis accorded to family relational variables, although family interactions clearly play an important role in individual development and adjustment. As Adelson and Doehrman (1980) wrote,

The psychodynamic theory is also distinctive in both the degree and nature of its emphasis on the family. . . . It holds that the family by no means moves from the center. To the contrary, all of the regressive forces of the era draw the child closer to the family, dangerously close, so much so that much of the adolescent's psychological life is given over to oscillation between closeness and flight. (p. 105)

Similar descriptions of the separation-individuation process can be found in the family systems literature. Systems theorists argue that persons must differentiate themselves from the family on the one hand and retain a sense of family

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connectedness on the other (Bowen, 1976; Minuchin, 1974). Systems that are intolerant of differentiation or that overemphasize differentiation at the expense of connectedness are dysfunctional. The shared theme among these views of separation-individuation is that both separateness and connectedness are important for adaptive functioning.

Fortunately, adolescent separation-individuation measurement development has kept pace with theory development. Promising measurement strategies have recently been introduced. These include scales or subscales from the Separation Anxiety Test (SAT; Hansburg, 1972, 1980), the Psychological Separation Inventory (PSI; Hoffman, 1984), and the Separation-Individuation Test of Adolescence (SITA; Levine, Green, & Millon, 1986). Grounded in psychoanalytic and neopsychoanalytic theory, the SAT is a semistructured, projective instrument that is commonly used to explore the link between adolescents' separation experiences and later emotional problems. The PSI is a self-report questionnaire that is also derived from psychoanalytic theory (e.g., Blos, 1979). The PSI assesses four domains of the separation-individuation process: functional independence, emotional independence, conflictual independence, and attitudinal independence from parents. The SITA is a self-report questionnaire that is designed to identify various dimensions of the individuation process, such as separation anxiety and healthy individuation. These instruments are being increasingly deployed to investigate the linkage among separation-individuation, family systems variables, and adjustment to college.

Recent research supports the view that separation-individuation is associated with college adjustment. For example, psychological individuation, as measured by the SAT, has been positively related to identity exploration in the college environment (Kroger, 1985; Kroger & Haslett, 1988) and negatively related to separation defensiveness and depression among college students (Levitz-Jones & Orlofsky, 1985). Sherry (1980) found that college freshmen who had experienced traumatic separation experiences (e.g., loss of a parent through divorce or death) had greater difficulty managing the transition to college than did freshmen who had not experienced such separations. Hoffman (1984) reported that both conflictual independence (absence of excessive angry or resentful feelings toward parents) and emotional independence from parents, as measured on the PSI, were related to personal and academic adjustment in college. Furthermore, a positive relation was found between problematic separation from parents (conflictual dependence) and reported emotional problems (Hoffman & Weiss, 1987). Indeed, extensive interrelations have been described between various dimensions of psychological separation, family dysfunction (marital conflict or parent-child role reversal), and different aspects of college adjustment (Lapsley et al., 1989; Lopez et al., 1988).

Research with the PSI indicates that conflictual independence is negatively correlated with depression and emotional problems reported by college students (Hoffman & Weiss, 1987; Lopez et al., 1986) and positively correlated with academic, emotional, and social adjustment (Hoffman, 1984; Lapsley et al., 1989; Lopez et al., 1988). Other subscales from the PSI do not consistently correlate with indexes of adjustment. These results suggest that negative, angry, or conflicted

emotional reactions to psychological separation may hinder the student's adequate adjustment to college. Functional, emotional, and attitudinal independence from parents seem less important to college adjustment. These findings may be attributed to the "particular element of psychological health one is investigating and on how psychological health is defined" (Hoffman & Weiss, 1987, p. 162), or they may be the result of the multifaceted nature of psychological individuation such that some aspects of individuation are more relevant to college adjustment than are others (Hoffman, 1984; Lopez et al., 1988). Inspection of item content and scale definitions of the separation-individuation measures suggests that different dimensions of adolescent individuation are indeed being assessed. If this is the case, then researchers who investigate the same questions are likely to find different results depending on the particular measure of individuation selected. Moreover, family cohesion has not been included in studies of separation-individuation. This omission constitutes an oversight of a highly relevant construct in the study of college student adjustment.

In this study multiple measures of separation-individuation, family cohesion, and adjustment to college are used to determine (a) if the extant measures of individuation actually tap the same underlying construct and (b) which dimensions are most relevant for predicting college adjustment. A factor-analytic procedure was expected to shed light on the different underlying dimensions of individuation that are measured with the separation-individuation instruments (Anderson & Gerbing, 1988; Briggs & Cheek, 1986). Once these factors are determined, they can be used to evaluate some of the theoretical points in regard to adolescent separation-individuation and adjustment (e.g., Does separation, closeness to parents, or both help the college student adjust to the university?).

The separation-individuation measures used in this study are self-reports. In general, self-report measures may be subject to various kinds of response bias (Edwards, 1970). That is, some subjects tend to respond to the social desirability of an item rather than the contents of the item. Hogan and Nicholson (1988) pointed out that validity studies that have controlled for social desirability bias generally report lower validity coefficients. For example, Olson, Portner, and Lavee (1985) reported a positive relation between measures of social desirability and family cohesion. Moreover, Lopez et al. (1986) suggested that the nature of general college adjustment may consist not so much of adjustment per se but rather of a process of learning to conform to the expectations of the college environment. Consequently, a measure of social desirability is also included in our study.

Method

Subjects

A total of 240 subjects (138 men and 102 women) were solicited from introductory psychology courses, freshman English courses, and an upperclass child development course. The mean age for the sample was 19.32 (SD = 1.42). The subjects represented a diverse range of majors: 82 liberal arts, 69 business, 38 physical science, 17 engineering, 22 preprofessional, and 12 undecided. Eighty-nine percent of the

sample identified themselves as Caucasian. All subjects received extra credit in their courses for participating in the research.

Procedure and Instrumentation

Three adolescent separation-individuation measures, two measures of family cohesion, two measures of college adjustment, and one measure of social desirability were used. The subjects completed the questionnaires in random order over the course of 2 consecutive evenings. The testing occurred about 2 months after the fall semester had begun and just prior to a week-long fall break for the students. The timing of the administration allowed for a settling-in period for freshmen students and also gave all the students an opportunity to have received some feedback as to how they were doing in their coursework for the semester. The total time of testing was approximately 2 hr.

Psychological separation-individuation. The SAT (Hansburg, 1972, 1980) is a structured, projective instrument in which subjects respond to 12 pictures of a child in different separation scenes. The scenes vary in intensity: for example, a boy and his father stand at the mother's coffin; a girl and her family are moving to a new neighborhood. Subjects then complete sentence stems (e.g., "The child feels ____") by selecting responses from a list of possible statements. The assumption is that subjects will project their own reactions onto the child. The Individuation subscale of the SAT consists of items that reflect positive, hopeful outlooks when confronted with a separation experience. The reliability of the SAT is adequate for research purposes. Hansburg (1972) reported the split-half reliability for the total SAT to be .89. Black (1981) reported a matched-half reliability for the individuation subscale of .67. The 6-month test-retest reliability for this subscale was .61. Evidence of validity is limited to a few significant correlations between the SAT and therapists' evaluations (Hansburg, 1980).

On the PSI (Hoffman, 1984), subjects rate items designed to measure four dimensions of independence from parents. Half of the items address separation from the mother; the other half describe separation from the father. Functional Independence measures the extent to which the adolescent can manage personal affairs without the help of parents. Attitudinal Independence assesses the differentiation of one's beliefs, values, and attitudes from the parents'. Emotional Independence is the freedom from an excessive need for approval, closeness, and emotional support from parents. Conflictual Independence measures the respondent's freedom from guilt, anxiety, responsibility, resentment, and anger in relation to parents. Higher scores on these subscales indicate greater psychological separation. Four composite scores can be derived from the PSI by combining mother and father separation scores within each independence dimension (see Lopez et al. 1988). The PSI subscales appear to have adequate reliability. Internal consistency of the subscales has ranged from .84 to .92 (Cronbach coefficient alphas). Test-retest correlations, after 2-3 weeks, has ranged from .49 to .96. Hoffman (1984) examined the criterion validity of the PSI by correlating subscale scores with the Personal Adjustment scale of the Adjective Check List (Gough & Heilbrun, 1980) and with responses to two adjustment statements: "I have problems with my academic courses" and "I have problems with my love relationships." These measures of personal and academic adjustment were significantly related to PSI subscales.

Two subscales from the SITA (Levine et al., 1986) were used as indexes of individuation: the Healthy Separation subscale and the Separation Anxiety subscale. Healthy separation and separation anxiety most closely resemble the concept of adolescent individuation as defined by Josselson (1988). The Healthy Separation subscale measures the successful resolution of simultaneous dependency and independence needs. The Separation Anxiety subscale is designed to

measure problematic individuation. The SITA was developed through theoretical, substantive item selection and validated through both internal, structural and external, criterion methods (Loevinger, 1957). Items were initially selected by experts and sorted into logical subscales. The subscale structure was then confirmed by principal-components analysis (Levine et al., 1986). With regard to external validity, Levine et al. (1986) found that subjects categorized as *anxious-moody* according to the Millon Adolescent Personality Inventory (MAPI; Millon, Green, & Meagher, 1982) achieved higher scores on the SITA Separation Anxiety subscale than other groups formed through MAPI classifications. Likewise, subjects in the *confident-outgoing* group (MAPI classification) scored higher than subjects in the other personality categories on the Healthy Separation subscale of the SITA (Levine et al., 1986). Reliability estimates for the SITA subscales have not yet been reported in the literature.

Family cohesion. Family cohesion was measured by the Cohesion subscale of the Family Adaptability and Cohesion Scales (FACES-III; Olson et al., 1985) and the Family Environment Scale (FES; Moos, 1974). The FACES-III Cohesion scale consists of 10 items that require Likert responses (1 = *almost never* to 5 = *almost always*). Cronbach's coefficient alphas for the Cohesion subscale were .76 and .75 in two independent administrations (Olson et al., 1985).

On the FES, cohesion is assessed by 9 items that require forced-choice (true-false) responses. Moos and Moos (1981) reported the internal consistency of the Cohesion subscale as K-R 20 = .78. They also reported a test-retest reliability of .86 for this subscale after 2-months. Validity of the FES comes from its use as a clinical assessment device for family therapists—the FES accurately predicts less cohesion and more conflict in distressed families—and its use in predicting normal family functioning (Moos & Moos, 1981). Both measures of family cohesion (the FACES-III and the FES) can be administered in group situations.

Adjustment to college. The Student Adaptation to College Questionnaire (SACQ; Baker & Siryk, 1984) is a self-report measure with 67 Likert-scale items that address four facets of college adjustment: academic, social, personal-emotional, and goal commitment-institutional attachment. Academic Adjustment measures how well the adolescent manages the educational demands of the college experience. Social Adjustment assesses how well the adolescent deals with interpersonal experiences at the university (e.g., meeting people or joining groups). Personal-Emotional Adjustment is whether the student experiences general psychological distress or the somatic consequences of distress. Goal Commitment-Institutional Attachment measures the degree of institutional affiliation the adolescent feels toward the university. The instrument also yields a total score for adjustment to college by summing the scores of the 67 items. In this study the full scale score was used as an indicator of overall adjustment to college.

On the basis of two independent samples, Baker and Siryk (1986) reported coefficient alphas for the full scale (.91 and .92), Academic Adjustment (.82 and .87), Social Adjustment (.88 and .88), Personal-Emotional Adjustment (.82 and .79), and Attachment-Goal Commitment (.89 and .86) that reflected a high degree of internal consistency for each scale. Criterion validity consists of negative correlations with attrition from school and the use of psychological services. Positive correlations were found between the SACQ and both freshman grade-point average and social participation in social events (Baker & Siryk, 1986).

A second indicator of college adjustment was the College Inventory of Academic Adjustment (CIAA; Borow, 1949). The CIAA consists of six subscales and a global composite that address various aspects of adjustment. The measure assesses motives, attitudes, and practices of students related to their adjustment to college. In this study the global scale score is used as an indicator of adjustment to college. Only limited psychometric information about the CIAA exists. Borow

(1947) found modest criterion-related validity in correlating CIAA subscales with grade-point averages and aptitude questionnaires. Scores from the CIAA also predicted academic achievement (Borrow, 1947).

Social desirability. The Marlowe-Crowne Social Desirability Scale (MCSD; Crowne & Marlowe, 1960) is a forced-choice (true-false), 33-item, self-report inventory that measures the degree to which subjects attempt to present themselves in a socially desirable manner. Sample items from the MCSD include "I have never intensely disliked anyone" and "No matter who I'm talking to, I'm always a good listener." The MCSD has been shown to have adequate reliability. Internal consistency has been reported at .88 (K-R 20), and test-retest correlations of .89 have also been reported (Crowne & Marlowe, 1960).

Results

The sample was randomly split into two equal groups ($n_s = 120$). Group 1 served as the sample for an exploratory factor analysis of the individuation measures. Group 2 served as the sample for the test of a linear structural equations model of the relations among individuation, family cohesion, and adjustment to college. A multivariate analysis of variance indicated that the two groups were not significantly different on any of the measures, exact $F(12, 227) = 1.40, p > .05$.

Table 1 presents reliability information obtained from all of the measures used in the present study for both groups of subjects. Cronbach alphas were computed for measures that required Likert responses; Kuder-Richardson formulas were computed for forced-choice instruments. In general, the internal consistency of the instruments was adequate, and estimates ranged from .66 to .94.

The zero-order correlations between the measures are presented in Table 2. All correlations for which $|r| > .15$ were significant at the .05 level (one-tailed). For the most part the measures of the same constructs seemed to correlate with one another. Several measures did not correlate in expected directions with other measures. The Healthy Separation subscale from the SITA did not correlate substantially with any of the other measures. The Conflictual Independence subscale from the PSI did not correlate with the other subscales from that instrument. Furthermore, the pattern of intercorrelations sug-

gested some ambiguity as to what the individuation measures were assessing. For example, the median correlation among the individuation measures was only .10 (by reversing the sign of the SITA Separation Anxiety correlations to reflect healthy individuation). Some of the correlations between the MCSD scale and the other measures were significant. However, the largest of these correlations (between the MCSD and the CIAA) only accounted for about 16% of the variance between the two measures. Although social desirability may be related to some of the constructs of interest, the measures of individuation, cohesion, and college adjustment were by no means saturated with social desirability.

Exploratory Factor Analysis

An exploratory principal-factors analysis of the individuation measures was computed in order to determine if the measures of separation-individuation were tapping the same dimension. An oblique rotation of the factor structure was used because it was plausible that the different factors that might emerge would be correlated with one another (Briggs & Cheek, 1986). The Healthy Separation subscale from the SITA was excluded from this and all subsequent analyses because of its poor correlation with all of the other measures (median $r = .01$) and because a preliminary exploratory factor analysis indicated that the subscale did not load unambiguously onto any particular factor. A two-factor solution best accounted for the shared variance among the individuation measures on the basis of scree-test criteria and eigenvalues greater than 1. The eigenvalue for the first factor was 1.87 and accounted for 31% of the variance. The eigenvalue for the second factor was 1.02, which accounted for an additional 17% of the variance. Hence, approximately 48% of the variance was accounted for by these two factors. Table 3 presents the results of this analysis.

Three subscales from the PSI, Functional, Emotional, and Attitudinal Independence, loaded positively onto the first factor. Taken together, the items on these three subscales appear to measure a general identification with parents or affinity for parents. Because the scales are scored to reflect

Table 1
Internal Consistency Results

Measure	Group 1		Group 2	
	α	K-R 20	α	K-R 20
Family Adaptability and Cohesion Scales, Cohesion	.85	—	.82	—
Family Environment Scale, Cohesion	—	.78	—	.66
Separation Anxiety Test, Individuation	—	.72	—	.77
Psychological Separation Inventory				
Functional Independence	.91	—	.91	—
Emotional Independence	.91	—	.93	—
Attitudinal Independence	.94	—	.94	—
Conflictual Independence	.90	—	.93	—
Separation-Individuation Test of Adolescence				
Separation Anxiety	.68	—	.71	—
Healthy Separation	.80	—	.82	—
Student Adaptation to College Questionnaire, General Adjustment	.92	—	.92	—
College Inventory of Academic Adjustment, Total Adjustment	.89	—	.91	—
Marlowe-Crowne Social Desirability Scale	—	.74	—	.78

Table 2
Correlation Matrix of Measures

Measure	1	2	3	4	5	6	7	8	9	10	11	12
1. Family Adaptability and Cohesion Scales, Cohesion Adjustment	—	.58	-.04	-.54	-.51	-.36	.26	-.05	.01	.26	.18	.08
2. Family Environment Scale, Cohesion	.69	—	.12	-.37	-.27	-.38	.32	-.24	-.02	.37	.43	.26
3. Separation Anxiety Test, Individuation	.06	.03	—	.10	.25	-.05	.30	-.31	.10	.22	.27	.28
Psychological Separation Inventory												
4. Functional Independence	-.42	-.34	.12	—	.72	.55	.08	.01	-.23	-.13	-.14	-.15
5. Emotional Independence	-.43	-.30	.10	.76	—	.44	.13	-.18	-.19	.11	.12	.03
6. Attitudinal Independence	-.29	-.20	.02	.55	.58	—	-.18	.24	-.25	-.27	-.36	-.27
7. Conflictual Independence	.18	.25	.18	-.03	.13	-.14	—	-.21	-.13	.32	.35	.20
Separation-Individuation Test of Adolescence												
8. Separation Anxiety	.12	.03	-.20	-.23	-.30	-.02	-.28	—	-.20	-.34	-.41	-.16
9. Healthy Separation	.01	.03	-.02	.02	-.01	-.06	.08	-.48	—	-.07	.01	.02
10. Student Adaptation to College Questionnaire, General Adjustment	.25	.22	.21	-.04	.08	-.07	.22	-.32	.10	—	.69	.23
11. College Inventory of Academic Adjustment, Total Adjustment	.27	.27	.31	-.01	.10	-.19	.38	-.33	.10	.68	—	.30
12. Marlowe-Crowne Social Desirability Scale	.19	.09	.16	-.02	-.05	-.13	.03	-.07	-.12	.29	.41	—

Note. Correlations for Group 1 appear above the diagonal, and those for Group 2 appear below the diagonal. Higher scores on each measure, with the exception of the Separation Anxiety subscale of the Separation-Individuation Test of Adolescence, indicate greater cohesion, individuation, or adjustment. Absolute values of correlations greater than .15 are significant at $p < .05$ (one-tailed).

separation from parents, we labeled this factor *Independence From Parents*. The Conflictual Independence subscale from the PSI and the Individuation subscale from the SAT both loaded positively onto the second factor, whereas the Separation Anxiety subscale from the SITA loaded negatively onto the factor. Given the direction of the factor loadings and on the basis of item content, we labeled the second factor *Positive Separation Feelings*. The correlation between the factors was .04.

The results of the exploratory factor analysis indicated that the individuation measures assessed two very different dimensions of the separation-individuation process. One dimension reflected the degree to which the student is functionally, attitudinally, and emotionally independent from parents. The other dimension reflected feelings associated with particular separation experiences. In the second set of analyses, we treated Independence From Parents and Positive Separation Feelings as separate but related constructs. In conjunction with Family Cohesion, we examined their respective utility in predicting Adjustment to College.

Linear Structural Equation Modeling

Structural equation modeling differs from exploratory factor analysis in several ways. First, the expected factor structure is specified a priori by restricting certain variables from loading onto certain factors. In this manner the nature of each factor is less ambiguous (e.g., only family cohesion measures load onto the Cohesion factor). Another difference is that the relations between the factors (or latent variables) are also specified a priori. Such relations are specified according to theoretical considerations and with regard to specific hypotheses that are generated by theory. A sample of observed data are then gathered to determine if the interrelations of the variables correspond to the hypothesized theoretical model.

Several goodness-of-fit indexes are available to help judge how well a set of a priori constraints fit the data. Under certain conditions (see Fassinger, 1987; Long, 1983), the fitting function is distributed as a chi-square. A significant chi-square indicates that the model does not fit the data well. However, the chi-square is sensitive to sample size; models that fit the

Table 3
Exploratory Factor Analysis (Rotated Oblique Factor Loadings)
of the Individuation Measures

Measure	Final communality estimates	Factor 1: Independence From Parents	Factor 2: Positive Separation Feelings
Psychological Separation Inventory			
Functional Independence	.73	.85	.09
Emotional Independence	.75	.81	.34
Attitudinal Independence	.57	.67	-.31
Conflictual Independence	.22	.01	.47
Separation-Individuation Test of Adolescence, Separation Anxiety	.32	.04	-.56
Separation Anxiety Test, Individuation	.31	.12	.54

data well may yield significant chi-squares if the sample size is large. Other fit indexes, not sensitive to sample size, include the adjusted and unadjusted goodness-of-fit indexes (GFI) and the root mean square (RMS) of the residuals. If the model provides a poor fit, post hoc model modifications can be undertaken cautiously.

A measurement model and a structural model were constructed and tested with the data from the second group of subjects. The measurement model consisted of four factors and 10 manifest or observed measures. The Cohesion subscales were constrained to load onto the Family Cohesion factor. Functional, Emotional, and Attitudinal Independence were constrained to load onto the Independence From Parents factor. Conflictual Independence, the SAT Individuation subscale, and the SITA Separation Anxiety subscale were constrained to load onto the Positive Separation Feelings factor. The total scores from the SACQ and the CIAA were constrained to load onto the Adjustment to College factor. The structural model consisted of one endogenous (i.e., dependent) latent variable, Adjustment to College, and three exogenous (i.e., independent) latent variables, Independence From Parents, Positive Separation Feelings, and Family Cohesion. The three exogenous variables were allowed to correlate with each other. Hypothesized causal relations between all three exogenous variables and the endogenous variable were estimated as path coefficients (analogous to standardized beta weights in multiple regression). Of course, inferences about causal relations must be tentative, in that these data did not derive from a longitudinal study (Kenny, 1979). Figure 1 displays this structural model.

This model produced a statistically significant chi-square, $\chi^2(29, N = 120) = 46.45, p = .021$. However, other fit indexes (not sensitive to sample size) suggested that the model provided an excellent practical fit to the data ($GFI = .93$; *adjusted GFI* = .87; $RMS = .07$). Table 4 presents the parameter estimates for this model. The factor loadings of the measures can be interpreted as validity coefficients. All estimated factor loadings were significantly greater than zero, and each of the measures may be regarded as having an adequate degree of validity. The fact that the model fit well without allowing any manifest variable to load onto more than the designated latent variable constitutes (a) a confirmation of the factor structure that emerged from the previous exploratory factor analysis and (b) evidence of discriminant validity of the manifest variables (Cole, 1987). Figure 1 also presents the correlations between the factors. Family Cohesion was negatively and significantly correlated with Independence From Parents ($-.51, p < .05$) but was unrelated to the Positive Separation Feelings factor (.07). Independence From Parents and Positive Separation Feelings were positively and significantly correlated (.36, $p < .05$). Examination of the path coefficients between the exogenous and endogenous latent variables revealed a very interesting pattern (see Figure 1). The influence of Positive Separation Feelings on College Adjustment was large and statistically significant (standardized path coefficient = .78, $\chi^2(1, N = 120) = 23.93, p < .001$). However, the influences of Family Cohesion and Independence From Parents on College Adjustment were small and not statistically significant, $\chi^2(2, N = 120) = 6.43, p > .05$.

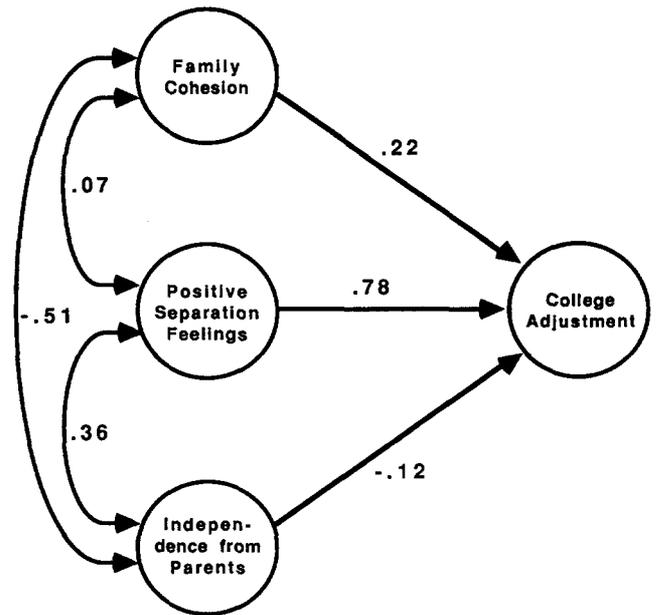


Figure 1. Factor correlations and standardized path coefficients for structural equation model of college adjustment.

Discussion

The current study provides some intriguing insights at two very different levels. The first pertains to the factors that underlie a variety of existent measures of separation-individuation. The second pertains to the relations between the underlying constructs of separation-individuation, family cohesion, and college adjustment.

Commonly used measures of psychological individuation appear to tap two related dimensions: independence from parents and positive feelings associated with separation from parents. These two dimensions are only modestly related to each other ($r = .36$). Independence from parents is measured by the student's report of functional, emotional, and attitudinal individuation from the parental orbit. This factor reflects adolescents' ability to manage their own daily responsibilities, freedom from needing parents' approval and emotional support, and beliefs or values that are distinct from those of their parents. Positive separation feelings, the second separation-individuation dimension, is reflected by hopeful, nonanxious, and unresentful reactions to a variety of separation experiences. Given the very different natures of these dimensions, great care must be taken in future instrument selection when testing theories about separation-individuation (see Briggs & Cheek, 1986).

The two dimensions of separation-individuation relate quite differently to college adjustment. The rather normative process of gaining independence from parents appears to be unrelated to successful adjustment to the college environment. However, the affective response to separation is strongly related to college adjustment. Students who reported positive feelings about separation also reported being well adjusted to university life. The implication of this latter finding is that

Table 4
Linear Structural Equation Factor Loadings

Measure	Family Cohesion	Positive Separation Feelings	Independence From Parents	Adjustment to College
Family Adaptability and Cohesion Scales, Cohesion	.93*	0	0	0
Family Environment Scale, Cohesion	.74*	0	0	0
Separation Anxiety Test, Individuation	0	.40*	0	0
Separation-Individuation Test of Adolescence, Separation Anxiety	0	-.55*	0	0
Psychological Separation Inventory				
Conflictual Independence	0	.46*	0	0
Functional Independence	0	0	.83*	0
Emotional Independence	0	0	.92*	0
Attitudinal Independence	0	0	.62*	0
Student Adaptation to College Questionnaire, General Adjustment	0	0	0	.74*
College Inventory of Academic Adjustment, Total Adjustment	0	0	0	.92*

Note. Values of zero were constrained a priori.

* $p < .05$.

students who have negative, angry, or resentful feelings associated with separation are also those who have more difficulty managing their adjustment to college. Apparently, the successful management of the emotional responses to separation may be more important than independence, when confronted with the adaptational challenges of the college environment. Ego mastery of such challenges may not be the result of independence from parents or the result of the intrapsychic repudiation of the parent-adolescent relationship. Rather the results from the current study suggest that the affective experience associated with separation-individuation is the more important predictor of adjustment. The existence of the two separation-individuation factors and the different ways that they relate to college adjustment suggest that previous research in this area may have conflated conceptually and structurally distinct dimensions of separation-individuation (Hoffman, 1984; Hoffman & Weiss, 1987; Lapsley et al., 1989; Levitz-Jones & Orlofsky, 1985; Lopez et al., 1988; Sherry, 1980).

An important theoretical implication for the relation between family cohesion and independence appears from these results. According to Josselson (1988), individuation requires a reworking of family relationships so that the independence of the adolescent does not come at the expense of close familial ties. Family theorists also argue that a certain degree of distance from the family orbit is necessary in order for the adolescent to develop as an emotionally and functionally independent person (Bowen, 1976). The current findings support these claims. A moderate negative correlation was found between family cohesion and independence. Apparently, some degree of disengagement from family is necessary in order for the adolescent to attain independence. However, this correlation is not so high as to suggest that the adolescent must disengage totally. The individuation process may simultaneously entail some separation as well as some continued support from family members (Allison & Sabatelli, 1988; Josselson, 1988).

Several practical implications for the university counselor can also be drawn from this study. For example, the client presenting with concerns about separation-individuation issues may be more disturbed by negative, anxious, or angry feelings with regard to separation than by functional or emo-

tional independence issues. Resolving feelings associated with separation may facilitate the student's psychological well-being. Indeed, the theme of separation-individuation may be pursued throughout the course of therapy (Mann, 1973). For example, by working through certain ambivalent feelings about separating from the therapist, the client may become better prepared for future separation or adaptational experiences (Bragan, 1980). Preventative interventions also can be considered. Given the strong relation between separation feelings and adjustment to college, emotionally at-risk students may need to be identified on entrance to the university. Workshops that address not only the affective experiences associated with separation from parents but also the affective response to college stressors in general can be developed.

In sum, the results of this study suggest that measures of separation-individuation tap two qualitatively distinct dimensions that relate quite differently to college adjustment. In our study independence from parents had little to do with general adjustment to college, whereas positive feelings about separation strongly predicted college adjustment. The results also addressed some theoretical issues with regard to family cohesion and separation-individuation. Family cohesion and independence from parents were negatively correlated in the present study. This finding suggested that individuation does require some separation from the family orbit and perhaps some reworking of the parent-adolescent relationship. The results also suggest possible preventative interventions to facilitate late adolescent adjustment to college.

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