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THE RELATIONSHIP BETWEEN ACADEMIC ACHIEVEMENT MOTIVATION AND  
STUDENTS' PERCEIVED PARENTAL EXPECTATIONS AND PERCEIVED

PARENTAL INVOLVEMENT:

A COLLEGE SAMPLE

---

A Thesis

Presented to the

Faculty of

California State University,

San Bernardino

---

In Partial Fulfillment

of the Requirements for the Degree

Master of Arts

in

Psychology: Life-Span Development

---

by

Julie Ann Ostdick-Trembath

June 1999

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June 1999

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Date

## ABSTRACT

Academic achievement motivation, in relation to students' perceived parental expectations and parental involvement were assessed. Participants were 77 male and female college students ranging in age from 18 to 22, who were recruited on a voluntary basis from California State University, San Bernardino. Pearson product-moment correlation coefficients were used to assess the relationships among students' perceived parental expectations, parental involvement, and academic achievement motivation. A significant correlation ( $r(77) = .572, p < .01$ ) was found between perceived parental expectations and perceived parental involvement. Although perceived parental expectations and perceived parental involvement were expected to be significant predictors of academic achievement motivation, no support was found for these hypotheses.

To Dan, who helped me find my mind  
when I thought I'd lost it.

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## INTRODUCTION

The purpose of this study was to examine the relation between students' perceived parental expectations and academic achievement motivation, as well as the relation between parental involvement and academic achievement motivation.

Simply put, achievement motivation can best be defined as the impetus to master one's environment. Dweck and Elliott (1983) interpret it as the powerful, contemporary factors that determine the starting point, decision, intensity, direction, perseverance, and quality of goal-directed activities. Thus, from an academic perspective, it can be defined as the impetus to master one's scholastic environment.

Overall, research indicates that academic achievement motivation and academic performance are highly correlated (Skinner, Wellborn, & Connell, 1990; Wentzel, 1989). So much so, that results indicate that academic achievement motivation positively influences school performance (Fortier, Vallerand, & Guay, 1995). Entwistle and Hayduk (1988) found that parental expectations can have long-term effects on childrens' achievement motivation, as well as on their school outcomes. Wentzel's (1989) research implies



that it is possible to explain academic performance by considering the motivation a student possesses outside of the classroom to achieve socially and cognitively prescribed outcomes.

Likewise, several studies have shown consistent results, which indicate that when parents and teachers have high expectations for children, those children tend to have higher levels of motivation and perform better academically than children whose parents' and teachers' have low expectations of them (Brophy & Good, 1974; Eccles, 1983). Thus, it could be hypothesized that children's academic achievement motivation mediates their academic achievement.

Similarly, motivation theory suggests indirect links between perceived parental involvement and academic outcomes through childrens' motivational attributes (Grolnick & Slowiaczek, 1994). Because parental involvement in school has been associated with a lessened degree of school drop out, it suggests that parental involvement increases childrens' motivation to perform well academically (Bogenshneider, 1997; Rumberger, Ghatak, Poulos, Ritter & Dornbusch, 1990).

### Perceived Parental Expectations

Parental expectations have been cited as both a cause and effect of students' academic achievement (Seginer, 1983). This is because the first viewpoint was embraced primarily in studies which regarded the family as a learning environment, whereas the second viewpoint was examined in path analysis of status attainment (Bloom, 1964; Woelfel & Haller, 1971). In general, parental expectations have been defined as the desired number of years of schooling and occupational position expected for a child, by most studies (Seginer, 1983).

As a causal factor, parental expectations have been found to be influential with respect to children's achievement outcomes (Phillips, 1987). For example, Thomas (1985) found parental expectations to be a strong predictor of children's abilities, and Boocock (1972) suggested that parental expectations clearly affect children's academic performance. Parents who have high expectations for their children and who tend to demand more of their children at younger ages by setting standards, generally have high achieving children (Boocock, 1972; Seginer, 1983).

Similarly, Bilby, Brookover, and Erickson (1972) concluded that children's academic self-concepts are linked with parental evaluations. Therefore, it is plausible to suggest that children's academic self-image is reflective of parental expectations (Baker & Entwisle, 1987). In a related study, parental expectations were found to moderately impact children's self-expectations and to strongly impact school grades (Entwisle & Hayduk, 1983). Although a number of studies have linked parental expectations and academic performance, few projects have examined the link between perceived parental expectations and academic achievement motivation within a college sample.

Parental Involvement

Because home and school are two salient factors in the socialization and education of children, it has become increasingly important to understand the effects of parental involvement on academic achievement motivation (Grolnick & Slowiaczek, 1994). Results indicate that the extent to which the family interacted in intellectual activities at home accounted for a significant amount of variance in childrens' academic motivation (Grolnick & Slowiaczek, 1994). In the child development literature, parental involvement is

broadly defined as 'the degree to which a parent is committed to his or her role as a parent and to the fostering of optimal child development.' (Maccoby & Martin, 1983, p. 48) (See also Grolnick & Slowiaczek, 1994). With that said, parental involvement basically revolves around the amount of effort put forth by the parent(s) associated with child-oriented activities (Pulkkinen, 1982).

From an academic perspective, parental involvement has generally concentrated on one particular activity, such as helping with homework (Becker & Epstein, 1982; Stevenson & Baker, 1987). However, Grolnick and Slowiaczek (1994) have suggested a more comprehensive conceptualization of parental involvement which blends educational and developmental constructs. Specifically, Grolnick and Slowiaczek (1994) define parental involvement as the allocation of resources to the child by the parent within a specific domain. This definition acknowledges the difference between parents' general involvement with their child and their involvement in the child's academic experiences (Grolnick & Slowiaczek, 1994).

Thus, from Grolnick and Slowiaczek's (1994) viewpoint, parental involvement can be manifested in one of three ways.

First, parental involvement can be demonstrated through obvious behaviors such as helping out in the child's classroom. Second, parental involvement can be displayed through personal involvement such as showing interest in the child's schoolwork and/or school-related activities. And third, parental involvement can be exhibited through cognitive/intellectual stimulation such as discussing current events and/or providing the child with educational materials such as books, games, or videotapes.

Recent studies have expressed a need for home and school collaboration, indicating parental involvement as a major goal and target for educational reform (Epstein, 1990; Grolnick & Slowiaczek, 1994; National Commission on Excellence in Education, 1983). To this end, several studies have shown that parental involvement tends to result in positive outcomes with respect to children's schooling (Epstein, 1983; Fehrman, Keith, & Reimer, 1987; Reynolds, 1989). More specifically, Reynolds (1989) stated that parental involvement can have direct or indirect effects on childrens' academic achievement. Additionally, Fehrman, Keith, and Reimers (1987) found that parental involvement leads to increased time spent on homework, resulting in a

positive effect on students' grades.

Additional studies have shown that students who are performing well academically have parents who are involved in their educational progress, school events, and homework (Baker & Stevenson, 1986; Bogenschneider, 1997; Steinberg, Lamborn, Dornbusch, & Darling, 1992; Stevenson & Baker, 1987). Additionally, a longitudinal project by Steinberg, et al., (1992), established that parental involvement in school was linked to academic success.

Having discussed the implications of parental involvement relative to students' educational outcomes, we now turn our attention to the project at hand.

### The Current Project

Despite the fact that there is body of literature dedicated to examining the relationships among perceived parental expectations, perceived parental involvement, and academic outcomes (i.e., motivation and performance) for young students, there has been little research that has focused on the same relationships for college students.

Because the majority of research has been conducted on adolescents, the current project hopes to extend the literature with respect to relations among perceived

parental expectations, perceived parental involvement, and academic achievement motivation (as reflected by the dimensions of work, mastery, and competitiveness) among older students. Specifically, this project was designed to examine these relations with a sample of college students.

Previous research has shown a strong relationship between motivation and performance, as well as, a strong correlation between expectations and performance. This project intends to examine the link between motivation and expectations, as well as, motivation and involvement.

Three sets of hypotheses were tested in this study. The first set of hypotheses (Hypotheses 1-3) focuses on the link between expectations and academic achievement motivation, as measured by the students' level of work, mastery, and competitiveness. The first hypothesis expects to find a positive relationship between college students' perceived parental expectations and their level of mastery.

The second hypothesis expects to find a positive relationship between perceived parental expectations and level of competitiveness. The third hypothesis expects to find a positive relationship between perceived parental expectations and level of work.

The second set of hypotheses (Hypotheses 4-6) focuses on the link between involvement and academic achievement motivation, as measured by the students' level of work, mastery, and competitiveness. The fourth hypothesis expects to find a positive correlation between college students' perceived parental involvement and level of mastery. The fifth hypothesis expects to find a positive correlation between perceived parental involvement and level of competitiveness. The sixth hypothesis expects to find a positive correlation between perceived parental involvement and level of work.

The third set of hypotheses (Hypotheses 7-10) concerns the relationship between perceived parental expectations and perceived parental involvement, and whether these two variables predict the three dimensions of academic achievement motivation. The seventh hypothesis predicted a positive correlation between perceived parental expectations and perceived parental involvement. The eighth hypothesis expects to find that perceived parental expectations and perceived parental involvement will be significant predictors of level of mastery when entered into a regression model using a stepwise procedure. The ninth



hypothesis expects to find that perceived parental expectations and perceived parental involvement will be significant predictors of level of competitiveness when entered into a regression model using a stepwise procedure.

The tenth hypothesis expects to find that perceived parental expectations and perceived parental involvement will be significant predictors of level of work when entered into a regression model using a stepwise procedure.

## METHOD

### Design

For this study, a correlational-regressional approach was employed to investigate the interrelationships among the following variables: college students' perceived parental expectations (PPF), perceived parental involvement (PPI), and academic achievement motivation (AAM), which is reflected by the dimensions of work, mastery, and competitiveness. The predictor variables were: 1) college students' perceived parental expectations (PPE), and 2) perceived parental involvement (PPI). The first predictor variable (PPE) was a continuous variable and was measured by Marjoribanks' (1987) Perceived Family Environment Scale. The second predictor variable (PPI) was also a continuous

variable and was measured by Wills, Vaccaro, and McNamaras' (1992) Mother/Father-Adolescent Interaction Inventory. The criterion variable, academic achievement motivation (as reflected by the work, mastery, and competitiveness subscales), was also a continuous variable, and was measured by Helmreich and Spences' (1978) Work and Family Orientation Questionnaire. Because the WOFO is a general achievement motivation measure, numerous items on the subscales (i.e., work, mastery, and competitiveness) were reworded such that they would be more directly applicable to students' academic experiences. These modifications are discussed below in the 'Materials and Scoring' section. As a result of the modifications to the WOFO, one of the purposes of this study is to determine the internal consistency of the items adopted in the modified scales using a college sample.

### Participants

The participants were 77 college students (66 female and 11 male) of mixed ethnicity and socioeconomic status. The ethnic breakdown of participants was as follows: American Indian 1.3%, Asian/Asian American 9.1%, Black/African American 6.5%, Caucasian 49.4%, Hispanic/Latino 28.6%, and Other 5.2%. Of the sample, 6.5%

were freshmen, 41.6% were sophomores, 35.1% were juniors; and 16.9% were seniors. The mean age of the participants was 20.48 years with a standard deviation of 1.12 years.

Criteria for participation included being between the ages of 18 and 22 years inclusive, and being enrolled in at least one college class. The sample of college students was recruited from Psychology classes at California State University San Bernardino on a volunteer basis.

#### Materials and Scoring

In this study the following materials were used: One consent form (See Appendix A), one demographic sheet (See Appendix B), Marjoribanks' Perceived Family Environment Scale (See Appendix C), a modified version of Helmreich & Spences' Work and Family Orientation Questionnaire (See Appendix D), Wills, Vaccaro, & McNamaras' Mother/Father Adolescent Interaction Inventory (See Appendix E), and a debriefing statement (See Appendix F).

Informed Consent The consent form for each participant (See Appendix A) provided the name of the researcher, the nature, purpose and methodology of the study, and duration of research participation. Additionally, information was provided as to the maintenance of confidentiality and

anonymity, as well as the participants' right to withdraw from the project without penalty. Lastly, the consent form contained information regarding whom to contact about participants' rights and/or injuries.

Demographics Sheet A one-page demographic sheet was used. (See Appendix B). Included in the demographics were age, gender, grade level (i.e., freshman, sophomore, junior, or senior), marital status, annual household income, and ethnicity.

Perceived Family Environment Scale (PFES)  
(Marjoribanks, 1987). The PFES is an 8-item questionnaire, designed to measure three dimensions of family environment: (1) college students' perceptions of their parents' educational and occupational expectations of them; (2) the level of encouragement college students perceived they receive from their parents in relation to schooling; (3) perceptions of parents' general interest in education. The first 6 items are in statement format and are measured on a 5-point Likert scale. A value of 1 was assigned to the term 'strongly disagree' and a value of 5 to 'strongly agree'. The last 2 items are opened-ended questions, designed to gather qualitative data pertaining to students' perceptions

of their parents' educational and occupational expectations of them. These last two items were not used in the analysis. Responses for the first 6 items were summed for each participant to obtain an overall score of college students' perceived parental expectations. The scores range from 6 to 30, with low scores indicative of perceptions of low parental expectations and high scores indicative of perceptions of high parental expectations. The author indicates that the theta reliability estimate for each item was greater than .75.

The Work and Family Orientation Questionnaire (WOFO) (Helmreich & Spence, 1978). The WOFO is a 32-item measure of achievement motivation and attitudes towards family and career. Twenty-three items deal with achievement motives and nine additional questions assess concerns with educational aspirations, salary, prestige, and advancement, attitudes towards employment of spouse, relative importance of marriage versus career, and number of children desired. Factor analyses of the 23 motivational items yielded four similar factors for both males and females. Scales derived from these analyses were designated as work, mastery, competitiveness, and personal unconcern. The first three

subscales deal respectively with desire to work hard, desire for intellectual challenge, and desire to succeed in competitive, interpersonal situations. Because personal unconcern measures attitudes about the possible negative interpersonal consequences of achievement and is conceptually related to the notion of fear of success, it was not used in this project. Hence, for this project, only 19 of the 23 motivational items were used, as they pertained to work, mastery, and competitiveness. However, of the 19 items used in this project, 7 were considered inappropriate for measuring academic achievement motivation and were reworded accordingly. These items (2, 5, 10, 11, 12, 16, & 18) were reworded to increase the applicability to students' educational experiences.

With respect to the work subscale, three items (questions 2, 11, & 16) were reworded in the current project. Because the original items appear to assess a respondent's perception of general work situations, the items were reworded to focus on academic work experiences. Question 2 originally stated, 'It is important for me to do my work as well as I can even if it isn't popular with my co-workers.' It was reworded to read as, 'It is important

for me to do as well as I can in school even if it isn't popular with my peers.' Question 11 originally stated, 'There is satisfaction in a job well done.' It was reworded to read as, 'There is satisfaction in doing well in school.' Question 16 originally stated, 'Part of my enjoyment in doing things is improving my past performance.' This item was reworded to read as, 'Part of my enjoyment in going to school is improving my past performance.'

With respect to the mastery subscale, three items (questions 5, 10, & 18) were reworded in the current project. The original items seem to gauge the construct of challenge more so than mastery, which in the motivation literature are distinct but related constructs. The reworded items attempt to focus more specifically on mastery. Question 5 originally stated, 'I would rather learn easy fun games than difficult thought games.' This item was reworded to read as, 'I would rather have easy coursework than difficult coursework.' Question 10 originally stated, 'I prefer to work in situations that require a high level of skill. It was reworded to read as, 'I prefer to be in challenging situations that require a high level of skill.' Question 18 originally stated, 'I like to be busy all the

time.' This item was reworded to read as, 'I like to be involved in school activities all the time.'

With respect to the competitiveness subscale, item 12 was reworded for the current project, as it appeared to focus on competitiveness within a work and athletic situation, rather than an academic arena. Question 12 originally stated, 'I feel that winning is important in both work and games.' This item was reworded to read as, 'I feel that getting better grades than my peers is important.'

Questions were answered on a five-point Likert scale ranging from 'Strongly Agree' to 'Strongly Disagree'. The letters A to E were used to designate the responses. A = Strongly Agree, B = Slightly Agree, C = Neither Agree Nor Disagree, D = Slightly Disagree, and E = Strongly Disagree. The anchors (Strongly Agree and Strongly Disagree) were assigned values of 5 and 1 respectively, with the remaining responses coded in order. Item responses pertaining to each scale (i.e., work, mastery, and competitiveness) were summed for each participant to obtain three subscale scores. There are 6 questions pertaining to work (items 2, 7, 11, 14, 15, & 16), which results in a score ranging from 6 - 30 for work. There are 8 questions pertaining to mastery (items 1,



4, 5, 8, 9, 10, 13, & 18), with reverse coding used for items 1 & 5, which results in a score ranging from 8 - 40 for mastery. There are 5 questions pertaining to competitiveness (items 3, 6, 12, 17, & 19), which results in a score ranging from 5 - 25 for competitiveness.

For this project, the individual subscale scores (work, mastery, and competitiveness) were used to assess the three dimensions of academic achievement motivation. High scores are indicative of high levels of the motivational attributes and low scores are indicative of low levels of the motivational attributes. Reliability for the original motivational scales ranged from .65 for work, .62 for mastery, and .76 for competitiveness. In this study, the results regarding work, mastery and competitiveness will be reported separately.

Mother/Father Adolescent Interaction Inventory (MFAII) (Wills, Vaccaro, & McNamara, 1992). The MFAII is a 15-item scale designed to tap dimensions of both emotional and instrumental support. Emotional support items referred to the sharing of thoughts and communicating with the parent, whereas instrumental support items referred to the assistance with problems such as schoolwork and health.

Each item was rated on a four-point Likert scale ranging from (1) Not At All to (4) Very Much. Reverse coding is used for question 3. Questions 1 - 7 are emotional support items and questions 8 - 15 are instrumental support items. Items were summed to yield two subscale scores for each participant. Scores range from 7 - 28 for the emotional subscale and from 8 - 32 for the instrumental subscale. Both scores were then summed to yield an overall score, ranging from 15 - 60, with high scores indicating high levels of parental involvement and low scores indicating low levels of parental involvement. The full scale score was used in the analysis. Internal consistency based on Chronbach alphas for the seven-item emotional support scale was .81, and .74 for the eight-item instrumental support scale. The correlation between the two scales was  $r = .57$  (Wills, 1991). Although this inventory was designed for use with younger adolescents, it has recently been used to assess perceived support for a college sample (Valery, O'Connor, & Jennings, 1997).

Debriefing Statement - Contained in the debriefing statement (See Appendix F) are the reasons for conducting the study, where, when, and how to obtain results after

completion of the project, and the person(s) and/or professional resources to contact if any participant should have concerns or questions pertaining to their participation in the project.

### Procedure

Permission was obtained from instructors of Psychology classes at California State University San Bernardino to recruit participants on a volunteer basis. The researcher addressed each Psychology class to explain the nature of the project, as well as, participant criteria. Questionnaire packets were distributed to all individuals who were interested and qualified to participate in the study.

Each questionnaire packet contained a consent form, a demographic sheet, and three counterbalanced questionnaires, (i.e., the PFES, the WOFO and the MFAII). To counterbalance the questionnaires properly, the PFES, the WOFO, and the MFAII were arranged in six different orders, with approximately 13 participants tested under each order. All of the questionnaires were filled out by the college students outside of class. The researcher clearly indicated that under no circumstances should any of the participants put their names on any of the research materials, including

the consent form. Each participant was instructed to complete their questionnaires as truthfully and as accurately as they could without any assistance from another person. When all appropriate forms were completed, participants were instructed to return them to the Peer Advising Center, where they would be given the debriefing statement, as well as, their extra credit slip.

### Analysis

For this project data was analyzed using the Pearson product-moment correlation coefficient, as well as stepwise multiple regressions. Pearson product-moment correlations were used to determine the relationships between college students' perceived parental expectations and each of the three dimensions of academic achievement motivation, perceived parental involvement and each of the three dimensions of academic achievement motivation, and college students' perceived parental expectations and perceived parental involvement. To determine which variables were significant predictors (perceived parental expectations and/or perceived parental involvement) of academic achievement motivation, three stepwise multiple regressions analyses were performed. The three subscales from the

motivation measure served as the criterion variables. For determining the internal consistency of items on the mastery, work, and competitiveness subscales, Chronbach's alphas were calculated. A significance level of  $p = .01$  was adopted to conclude statistical significance.

## RESULTS

### Preliminary Analysis

Perceived Family Environment Scale (Marjoribanks, 1987). This measure assesses both parent support and discussions of students' academic endeavors. Because a large number of students on the California State University San Bernardino campus are first generation college students, there was a concern that this particular measure may not accurately assess perceived parental expectations, since many of the parents may support their child's educational goals, but not necessarily discuss these goals with their son/daughter (R. Ricco, personal communication, May 5, 1999). As a result, scores on individual items (1-3 assess support; 4-6 assess discussions of educational goals) may cancel each other out, and lead to an invalid measure of perceived parental expectations.

To address this concern, correlations were calculated

among the six items of the measure. Results of this analysis are shown in Table 1. The correlations among the six items were all positive and significant; as a result, it does not appear that two constructs are being measured. Therefore, a summary score based on the sum of the six items was used in subsequent analyses.

TABLE 1

CORRELATIONS AMONG QUESTIONNAIRE ITEMS OF EXPECTATION SCALE

	<u>EX1</u>	<u>EX2</u>	<u>EX3</u>	<u>EX4</u>	<u>EX5</u>	<u>EX6</u>
EX1	1.000					
EX2	.556*	1.000				
EX3	.800*	.662*	1.000			
EX4	.612*	.504*	.615*	1.000		
EX5	.529*	.393*	.545*	.588*	1.000	
EX6	.474*	.319*	.448*	.341*	.692	1.000

\*Correlation is significant at the .01 level (2-tailed)

Additionally, because this measure was originally developed for adolescents, its internal consistency was assessed in the current project. The measure demonstrated good internal consistency with a Chronbach's alpha of .87.

Mother/Father Adolescent Interaction Inventory (Wills, Vaccaro, & McNamara, 1992). Because this particular measure was developed for use with an adolescent population, its

internal consistency was also assessed in the current project. The analysis indicated a Chronbach's alpha of .93.

Work and Family Orientation Questionnaire (Helmreich & Spence, 1978). As mentioned before, in the 'Materials and Scoring' Section, several items of the WOFO questionnaire were reworded to increase the applicability to students educational experiences. As a result, reliability analyses were performed on each of the three subscales (i.e., work, mastery and competitiveness) originally included in this project.

An initial analysis of the work subscale yielded an unacceptable Chronbach's alpha of .46. After removing item 15, which was thought to be too general, as it did not strongly correlate with the subscale score, the internal consistency of the measure was reassessed. This analysis yielded a Chronbach's alpha of .49. Because the alpha remained low, the subscale was eliminated from further analyses. An initial analysis of the mastery subscale yielded a Chronbach's alpha of .52. Again, items that did not correlate well with the subscale score were removed. Specifically, items 1 & 5 appeared to be measuring the construct of challenge more so than that of mastery, whereas

item 4 was considered to be rather vague with respect to mastery. After removing these items, which resulted in a possible score of 5 to 25, a second internal consistency analysis was performed. This analysis indicated a Chronbach's alpha of .55. Although this subscale was only marginally reliable, it was retained for further analysis. Last, an analysis of the competitiveness scale yielded an alpha of .76.

#### Descriptive Statistics

Table 2 contains descriptive statistics for two of the three subscales contained in the academic achievement motivation measure (competitiveness & mastery), as well as the descriptive statistics for the perceived parental involvement and perceived parental expectation measures. As was discussed in the 'Preliminary Analysis' section, the work subscale from the motivation measure was not included in further analyses because of poor internal consistency.



TABLE 2

MEANS AND STANDARD DEVIATIONS OF IV'S AND DV'S

	<u>Mean</u>	<u>SD</u>	<u>Min.</u>	<u>Max.</u>
Achievement Motivation				
Competitiveness	17.17	3.59	8.00	25.00
Mastery	17.53	2.83	11.00	22.00
Involvement	45.16	9.78	25.00	60.00
Expectations	<u>23.49</u>	<u>5.35</u>	<u>6.00</u>	<u>30.00</u>

Results indicate that students in this sample reported a high level of both competitiveness and mastery on the achievement motivation scale. Likewise, this sample of college students reported a high level of perceived parental involvement. Lastly, this sample of college students reported high levels of perceived parental expectations.

Correlational Analyses

As noted earlier, the work subscale was eliminated from further analysis and was not used in the correlational analyses. Pearson product-moment correlation coefficients were calculated to assess the relationships stated in the first seven hypotheses (See Table 3). However, the third and sixth hypotheses were not tested, due to the elimination of the work subscale from further analysis. The first

hypothesis, which suggested a link between perceived parental expectations and mastery, was not supported. Likewise, the second hypothesis, which predicted a relationship between perceived parental expectations and competitiveness, was not supported. The fourth hypothesis, which surmised a correlation between perceived parental involvement and mastery, was not supported. Similarly, the fifth hypothesis, which indicated a link between perceived parental involvement and competitiveness, was not supported.

The seventh hypothesis, which predicted a link between perceived parental expectations and perceived parental involvement, was supported ( $r(77) = .572, p < .01$ ).

TABLE 3

CORRELATIONS AMONG COMPETITIVENESS, MASTERY, INVOLVEMENT AND

EXPECTATIONS

<u>Competitiveness</u>	<u>Mastery</u>	<u>Involvement</u>	<u>Expectations</u>
Competitiveness	1.00		
Mastery	.366*	1.00	
Involvement	-.148	.047	1.00
<u>Expectations</u>	<u>-.020</u>	<u>.085</u>	<u>.572*</u> <u>1.00</u>

\*Correlation is significant at the .01 level (2-tailed).

Regression Analysis

The stepwise regressions to assess the efficacy of perceived parental expectations and perceived parental involvement as significant predictors of mastery and competitiveness were not conducted due to the lack of significant correlations between the predictor variables and the criterion variables.

#### DISCUSSION

Despite the fact that this study found support for only one hypothesis, there is still a wealth of information that can be gleaned from the results. To begin with, the results of this study indicate that both the Perceived Family Environment Scale (Marjoribanks, 1987) and the Mother/Father Adolescent Interaction Inventory (Wills, Vaccaro, & McNamara, 1992) demonstrated good internal consistency when used with a college age sample. However, although good internal consistency was found for both measures in this sample, caution should be exercised if and when these measures are used again with another college sample, as they were originally developed for adolescents. It is advisable that further analyses be conducted to test the validity and reliability of these measures for college students.

On the other hand, the Work and Family Orientation Questionnaire (Helmreich & Spence, 1978) was found to be fairly unreliable for measuring academic achievement motivation in a college age sample. The unreliability of this measure is most likely due to the rewording of seven of the questionnaire items in an attempt to make the measure more directly applicable to students' academic experiences.

Hence, the Work and Family Orientation Questionnaire (Helmreich & Spence, 1978) is perhaps better implemented as a measure of general achievement motivation, as it was originally intended to be, rather than used specifically as a measure of academic achievement motivation, as it has no face validity as a measure of academic achievement motivation.

Another possible reason for the WOFO's unreliability, could be that the subscales in the WOFO are not tapping the dimensions of achievement motivation, as found in other measures. For example, Harter's (1981) motivation scale measures childrens' achievement motivation by assessing dimensions such as preference for challenge, curiosity/interest, and independent mastery attempts. Because mastery was the only dimension of achievement

motivation touched on in the original WOFO, it seems possible that this measure may not accurately be measuring achievement motivation. Hence, the revised WOFO, although reworded to reflect students' academic experiences, may not be an accurate measure of achievement motivation or academic achievement motivation. This, however, points to a need for the development of a more reliable instrument to assess academic achievement motivation in a college sample.

### Correlational Analyses

Because the first two hypotheses are based on research conducted with elementary school and adolescent age children, it is possible that the lack of significant correlation between perceived parental expectations, perceived parental involvement, and academic achievement motivation stems from a lack of relevancy with respect to adults. More specifically, it is likely that perceived parental expectations and involvement might not be salient factors in predicting academic achievement motivation in adults, as they are for younger children. There could be several reasons for this shift in saliency. First, the overall increase in psychosocial maturity from adolescence to young adulthood may have had an impact. Psychosocial

maturity refers to an increase in an adolescents' assertiveness, an increased feeling of being in control of their life, and a lessened degree of dependence on others (Greenberger & Sorenson, 1974). In short, the adolescent is becoming more self-reliant. As a result of this increase in psychosocial maturity, young adults are more able to think for themselves and make decisions for themselves, based on their own preferences, not their parents. Therefore, even if students' are aware of their parents' expectations of them, they may choose to disregard the expectations.

Second, along with this increase in psychosocial maturity, there is also a marked increase in emotional maturity from adolescence to young adulthood. Part of emotional maturity is becoming autonomous from ones' parents (Steinberg & Silverberg, 1986). Making decisions on their own, as well as handling some of their own financial responsibilities, is representative of this newfound autonomy. Likewise, another facet of the students' autonomy could be manifested by moving out of the house, or perhaps getting married, or starting a relationship with a significant other. In doing so, it would seem plausible that perceived parental expectations would be diminished in

terms of the individuals' academic achievement motivation, as their focus would most likely be on the expectations of their significant other, or perhaps their own financial concerns. On the other hand, it is also possible that a student living away from their parents, yet not involved with a significant other, might possibly demonstrate a decreased level of perceived parental expectations as a result of having their own priorities, which could in essence be very different from those of their parents'.

Third, young children are far more impressionable than young adults. As children, authority figures, whether they are parents, teachers, policemen, or clergy, are powerful role models with respect to guiding, shaping, and influencing the lives and decisions of children. However, as children mature, they may be less inclined to care what parents think or expect of them. Therefore, it may not be uncommon for young adults to be less influenced by their parents, than young children and adolescents are.

By the same token, parental involvement generally decreases as children age and mature. Here again, as children grow up, autonomy increases, which generally results in less involvement with parents. As young adults,

children more often prefer to spend time with friends and peers, as opposed to spending time with their parents (Steinberg, 1991). Additionally, for those young adults who no longer live with their parents or are no longer geographically close to their parents, it is likely that parental involvement will decrease. Similarly, other children may be married or involved with a significant other by the time they reach young adulthood, and their time and energy is more focused on their own relationships and/or family life, as opposed to the family life that they once shared with their parents.

Other possible limitations of this study include the fact that 85% of the sample is female, and that almost 50% of the sample is white, which could lead to biased data on students' perceptions of expectations and involvement. Clearly, males and students of color are not well represented in this study, and further studies should take both the gender and ethnicity issues into account and strive for a more representative sample.

Interestingly, the only hypothesis that was supported in this project indicated a link between perceived parental expectations and perceived parental involvement. The basis



for this hypothesis was the assumption that if a parent were involved in a students' academic endeavors, a student would have a fairly clear idea of their parents' expectations of them. It seems to follow that if a parent is actively engaged in a students' academic undertakings, they (the parents) may also be able to better communicate their expectations, than a parent who is less actively engaged in a students' academic pursuits, as there would be an on-going dialogue between both parties regarding the students' academic endeavors. Hence, both the parent and the student might be communicating more effectively with one another, thereby giving the student a clearer picture of what is expected of him/her academically. However, this may not be the case for all parent-child relationships, as there are some situations in which parents may discuss academic pursuits with their child, yet not express their expectations.

In summary, although the majority of the hypotheses were not supported in this project, some findings were yielded. First, the two adolescent scales measuring perceived parental expectations and involvement demonstrated internal consistency when used with a college age sample.

Second, there is also a clear need for the development of a reliable and valid measure of academic achievement motivation for a college population. Hopefully, this study will provide some of the impetus for future research along those lines.

## Appendix A

### Study of Academic Achievement Motivation Factors Informed Consent

The study in which you are about to participate is designed to investigate the factors that may influence students' academic achievement motivation. This study is being conducted by Julie Trembath under the supervision of Dr. Eugene Wong, Associate Professor of Psychology. This study has been approved by the Department of Psychology Human Subject Review Board, California State University, San Bernardino. The university requires that you give your consent before participating in this study.

In this study you will be asked to respond to several questionnaires pertaining to academic achievement motivation, as well as perceived parental involvement and perceived parental expectations. The survey should take about 20 to 25 minutes to complete. All of your responses will be held in the strictest of confidence by the researchers. Your name will not be reported with your responses. All data will be reported in group form only. You may receive the group results of this study upon completion in the Spring Quarter of 1999.

Your participation in this study is totally voluntary. You are free to withdraw at any time during this study without penalty. When you complete the survey, you will receive a debriefing statement describing the study in more detail and, at your instructor's discretion, you may receive one unit of extra credit. In order to ensure the validity of the study, we ask you not to discuss this study with any other students.

If you have any questions about the study, please feel free to contact Julie Trembath or Professor Wong at (909) 880-5573.

By placing a check mark on the line below, I acknowledge that I have been informed of, and that I understand the nature and purpose of this study, and I freely consent to participate. I also acknowledge that I am at least 18 years of age.

Place a check mark here \_\_\_\_\_

Today's date: \_\_\_\_\_

## Appendix B

### Background Information

Please answer each question as accurately as possible. Thank you for your participation.

1. Age: \_\_\_\_\_
2. Gender: \_\_\_\_\_
3. Ethnic background (check which ONE best describes you):  

<input type="checkbox"/> American Indian	<input type="checkbox"/> Caucasian
<input type="checkbox"/> Asian/ Asian-American	<input type="checkbox"/> Hispanic/Latino
<input type="checkbox"/> Black/African-American	<input type="checkbox"/> Other (Please specify)
4. Marital Status (Check only one):  

<input type="checkbox"/> Married	<input type="checkbox"/> Single
<input type="checkbox"/> Divorced	<input type="checkbox"/> Widow/Widower
<input type="checkbox"/> Separated	<input type="checkbox"/> Remarried
5. I am a (Check only one)  

<input type="checkbox"/> freshman	<input type="checkbox"/> junior
<input type="checkbox"/> sophomore	<input type="checkbox"/> senior
6. Annual household income (Check One that best describes you):  

<input type="checkbox"/> \$20,000 to \$40,000	<input type="checkbox"/> \$80,000 to \$100,000
<input type="checkbox"/> \$40,000 to \$60,000	<input type="checkbox"/> \$100,000 to \$150,000
<input type="checkbox"/> \$60,000 to \$80,000	<input type="checkbox"/> \$150,000 or more

## Appendix C

### Expectation Questionnaire

In the following questionnaire there are six (6) statements that relate to how students feel about their families. After each statement you will find the letters: SA , A, NC, D, and SD.

These letters mean:

- SA:           you STRONGLY AGREE with the statement.
- A:            you AGREE with the statement.
- NC:           you are NOT CERTAIN about the statement.
- D:            you DISAGREE with the statement.
- SD:           you STRONGLY DISAGREE with the statement.

After reading each statement, place a circle around the letter(s) which comes closest to indicating how you feel about the statement.

	Strongly Agree	Agree	Not Certain	Disagree	Strongly Disagree
1. My father/mother are very interested in my college coursework.	SA	A	NC	D	SD
2. My father/mother often give me advice on my homework assignments.	SA	A	NC	D	SD
3. My father/mother often talk to me about my school work.	SA	A	NC	D	SD
4. My father/mother often praise me for things I do in college.	SA	A	NC	D	SD
5. My father/mother greatly support my college endeavors.	SA	A	NC	D	SD
6. My father/mother encourage me a lot to stay in school.	SA	A	NC	D	SD

FOR QUESTIONS 7 AND 8, PLEASE WRITE A SHORT ANSWER.

7. What level of education do you think your father/mother would want you to attain?
8. What job position do you think your father/mother would want you to have after completing school?

## Appendix D

### Academic Achievement Motivation Questionnaire

The following statements describe reactions to school experiences.

For each item, indicate how much you agree or disagree with the statements, as it refers to yourself, by choosing and circling the appropriate letter on the scale.

1. I would rather do something at which I feel confident and relaxed than something which is challenging and difficult.  

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree
2. It is important for me to do as well as I can in school even if it isn't popular with my peers.  

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree
3. I enjoy working in situations involving competition with others.  

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree
4. When a group I belong to plans an activity, I would rather direct it myself than just help out and have someone else organize it.  

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree
5. I would rather have easy coursework than difficult coursework.  

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree
6. It is important to me to perform better than others on a task.  

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree
7. I find satisfaction in working as well as I can.  

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree
8. If I am not good at something I would rather keep struggling to master it than move on to something I may be good at.  

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree



9. Once I undertake a task, I persist.

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree

10. I prefer to be in challenging situations that require a high level of skill.

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree

11. There is satisfaction in doing well in school.

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree

12. I feel that getting better grades than my peers is important.

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree

13. I more often attempt tasks that I am not sure I can do than tasks that I believe I can do.

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree

14. I find satisfaction in exceeding my previous performance even if I don't outperform others.

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree

15. I like to work hard.

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree

16. Part of my enjoyment in going to school is improving my past performance.

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree

17. It annoys me when other people perform better than I do.

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree

18. I like to be involved in school activities all the time.

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree

19. I try harder when I'm in competition with other people.

A	B	C	D	E
Strongly	Slightly	Neither agree	Slightly	Strongly
Agree	agree	nor disagree	disagree	disagree

## Appendix E

### Involvement Questionnaire

In the following questionnaire there are fifteen (15) statements that relate to how students feel about their parents' involvement in their lives.

Following each statement is a short response. Please circle the response which comes closest to indicating how you feel about the statement.

- |   |            |          |               |           |
|---|------------|----------|---------------|-----------|
| 1. I can share my feelings with my parent(s).   | Not At All | A Little | Almost Always | Very Much |
| 2. I feel that I can trust my parent(s) as someone to talk to.  | Not At All | A Little | Almost Always | Very Much |
| 3. If I tell my parent(s) about a problem, they will probably blame me for it.                          | Not At All | A Little | Almost Always | Very Much |
| 4. If something good happens to me, I tell my parent(s) about it.                                       | Not At All | A Little | Almost Always | Very Much |
| 5. When I feel bad about something, my parent(s) will listen.   | Not At All | A Little | Almost Always | Very Much |
| 6. If I talk to my parent(s), I think they try to understand how I feel.                                | Not At All | A Little | Almost Always | Very Much |
| 7. When I talk to my parent(s), they make me feel better.   | Not At All | A Little | Almost Always | Very Much |
| 8. If I talk to my parent(s), they have suggestions about how to handle problems.                       | Not At All | A Little | Almost Always | Very Much |
| 9. If I need to know something about the world (like how things work), I can ask my parent(s) about it. | Not At All | A Little | Almost Always | Very Much |
| 10. When I have a problem with money, I can talk to my parent(s) about it.                              | Not At All | A Little | Almost Always | Very Much |
| 11. If I need help with my school work, I can ask my parent(s) about it.                                | Not At All | A Little | Almost Always | Very Much |
| 12. If I need help in getting somewhere, I can ask my parent(s) for a way to get there.                 | Not At All | A Little | Almost Always | Very Much |

13.If I have a problem with my health, I think I can  
talk to my parent(s) about it

Not At All	A Little	Almost Always	Very Much
------------	----------	---------------	-----------

14.If I'm feeling bored, my parent(s) have suggestions  
about things to do.

Not At All	A Little	Almost Always	Very Much
------------	----------	---------------	-----------

15.If I'm having a problem with a friend, my parent(s)  
would have advice about what to do .

Not At All	A Little	Almost Always	Very Much
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## Appendix F

### Study of Academic Achievement Motivation Factors Debriefing Statement

The study you have just completed was designed to investigate the factors that may influence student's academic achievement motivation. In this study two factors were assessed: student's perceived parental expectations and student's perceived parental involvement. These two factors have been found to influence our academic achievement motivation. Perceived parental expectations have been found to play a major role in the academic achievement motivation of younger children, but it is uncertain as to whether the impact is the same for college age students. Similarly, perceived parental involvement has been linked to academic achievement motivation in younger children, but little research has been conducted with a college sample. We are particularly interested in whether or not college students are influenced by their parents' expectations and involvement, and to what degree.

Thank you for your participation and for not discussing the contents of the academic achievement motivation questions with other students. If you have any questions about the study, please feel free to contact Julie Trembath or Professor Wong at (909) 880-5573. If you would like to obtain a copy of the group results of this study, please contact Professor Wong at JB-220 at the end of the Spring Quarter of 1999.

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