# Parental expectations and school relationships as contributors to adolescents' positive outcomes

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Abstract Researchers examined associations of parental expectations and parental school relationships with school outcomes among U.S. middle and high school students. Nationally representative data involving families from the National Household Education Surveys were analyzed with structural equation modeling. Measures included interview responses about parent expectations for their children's long term educational attainment (ranging from dropping out of high school to obtaining a JD/PhD/MD) and how much parents feel welcomed at school, trust and have positive interactions with educators. The latter three variables formed a latent variable called parent school relationship. Analyses controlled for SES (parents' educational attainment and household income), family structure, gender, and ethnicity. The school outcomes variable was derived from parental report of students' grades, retention in any grade and behavior problems at school. Parental expectations were positively related (standardized path coefficient = .44, p < .01) to positive school outcomes and had a stronger effect than SES (standardized path coefficient=.24). Parent school relationships were also positively related to school outcomes. These findings suggest that psychologists and educators should be aware of the potential

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for parents to play a significant role (e.g., via expectations and developing supportive relationships with educators) in children's education, even in middle and high school.

**Keywords** Parent expectations · Parent school relationship · Academic achievement · Adolescence · School retention · Classroom behavior · Expectations · Families · Trust

Based on the bioecological model of human development, the family system and the relationship between the family and the school provide important developmental contexts for youth (Bronfenbrenner and Morris 2006). In accordance, numerous studies have indicated that certain types of parent involvement promote children's academic success and positive behavior (e.g., Froiland et al. 2013a,b,c; Powell et al. 2012, 2010). Parent involvement develops over time, such that certain parental behaviors are more crucial at different periods of time. For instance, when children are young, the home literacy environment and cognitive stimulation (e.g., parent-child shared reading, counting objects, playing with puzzles and a rich supply of books at home) predict the development of early academic skills (e.g., Froiland et al. 2013a,b,c; Powell et al. 2012). However, as children approach middle and high school, certain common forms of home-based involvement are likely to have a neutral effect or even backfire (Froiland 2013; Hill and Tyson 2009). For example, parents checking on grades, helping with homework and checking on homework are negatively related to broad achievement in 8th grade (Froiland et al. 2013a), which is likely because adolescents striving for autonomy find this form of involvement controlling (Froiland 2011). Controlling parenting stifles intrinsic motivation to learn, which is important for the development of adolescents' achievement (Froiland and Oros 2013). This counterintuitive phenomenon (i.e., parent involvement often backfires with adolescents), along with the fact that parents generally decrease their collaboration with school staff as their children approach adolescence, even though parent involvement can promote healthy outcomes in adolescence (Eccles and Harold 1993), makes it important for educators and psychologists to develop a keen understanding of aspects of parent involvement that can promote positive outcomes among middle and high school students.

Although certain forms of parent involvement are more effective at different ages (e.g., Powell et al. 2012) and parent school-based involvement generally declines as students get older (Stevenson and Basker 1987), there is evidence that parent expectations and positive parent-school relationships are beneficial throughout the schooling years (Jeynes 2010). For instance, cross-sectional and longitudinal studies have found parent expectations for children's long term educational attainment to be related to achievement in early childhood, elementary school, middle school and high school (Englund et al. 2004; Fan 2001; Froiland et al. 2013a; Jeynes 2012; Xu et al. 2010). Although parent expectations are sometimes studied within a composite parent involvement variable (e.g., Keith et al. 1993) meta-analyses have revealed that parent expectations have a stronger relationship with achievement than various other parent involvement variables, such as parental supervision and involvement at school (Fan and Chen 2001; Jeynes 2007). Jeynes (2007) found that the average effect size of parent expectations on achievement is .88 among urban students in grades six through

twelve; however, he pointed out that all of the studies on expectations lacked sophisticated controls (e.g., SES, gender and race/ethnicity), which usually lower the effect sizes. It is also important to point out that family SES is related to various aspects of parent involvement. In fact, Fan (2001) found that the effects of parent involvement on achievement are overestimated without family SES as a control. A meta-analysis indicated that race/ethnicity influences on parent involvement and achievement are significant, but much smaller than the effect of the type of parent involvement (Fan and Chen 2001). Asian American and European American adolescents generally have higher levels of achievement and more involved parents (including higher expectations) than adolescents from other minority backgrounds (Froiland et al. 2013a; Peng and Wright 1994), but Keith et al. (1993) found that Asian American and European American families had lower levels of parent involvement. Thus, the effects of ethnicity on parent involvement and achievement among adolescents needs further research.

An often overlooked variable that affects both parent involvement and achievement is family structure (Jeynes 2005a, 2010). Children that live in single parent families (whether due to divorce, parent never marrying, or widowing) have lower achievement than children from two parent homes (Chiu and Xihua 2008). Although children who have parents that stay together have the best achievement outcomes (Jeynes 2005a), children from two parent households have better math and science achievement than children from single parent households, even if the two parent family is blended (Chiu 2007; Chiu and Xihua 2008). This is in part due to parent involvement being constrained by less time available among single parents (Chiu 2007). In accordance, Sui-Chu and Willims (1996) found that two parent families were more likely to volunteer at school. However, they also found that two parents units were less likely to communicate with teachers, but it appears that this variable is confounded by including teacher requests to talk about grades and behavior, which could be an indicator of children's difficulties. Related to single parents having less time available, the number of siblings is negatively associated with achievement and parents' time available for each child (Chiu and Xihua 2008).

#### 1 Positive parental expectations and adolescent's positive school outcomes

Parent expectations for children's long-term educational attainment have a significant positive effect on the development of academic achievement among adolescents, even when controlling for other variables related to achievement and parent expectations, such as family SES (Räty and Kasanen 2010), race/ethnicity, early home-based involvement, earlier parent expectations and prior achievement (Froiland et al. 2013a; Zhang et al. 2011). According to both social cognitive theory (Bandura et al. 2001) and the expectancy-value theory (Eccles and Wigfield 2002), positive parent expectations are conveyed from parents to their child, which may lead to greater effort and academic achievement. However, parents that have high positive expectations for their child also directly promote academic achievement by providing higher levels of home-based involvement when their children are younger (Froiland et al. 2013a). In accordance, Bandura et al. (2001) found that parent expectations for their middle school students' long term educational attainment directly predicted grades (path coefficient=.5).

#### 2 Positive parent-school relationships and positive school outcomes

In Hoover-Dempsey's model of the parent involvement process, parent expectations and parent-school communication are both considered key involvement forms (Hoover-Dempsey et al. 2010). Likewise, Jeynes (2010) posits that parent expectations and a welcoming environment characterized by educators conveying respect and appreciation for parents are crucial and subtle aspects of parent involvement programs that schools usually overlook. A family-school partnership promotes children's learning and positive behaviors, and the relationship between parents and teachers is a key aspect of the mesosystem between home and school (Christenson 2003). The quality of the parent-teacher relationship better predicts children's outcomes than the frequency of parent and teacher contact (Kohl et al. 2000). Powell et al. (2010) found that perceived teacher responsiveness (e.g., parents perceive that the teacher is interested in the child, is supportive of the parents, and makes the parents feel welcomed) predicted children's reading skills and fewer problem behaviors. Adams and Christenson (2000) found that trust is integral to the family-school relationship and that middle and high school parents trust teachers less than elementary school parents. Parent trust was significantly related to parent reports of satisfying parent-teacher interactions and to high school GPA (Adams and Christenson 2000). A year-long qualitative study on parent involvement concluded that the most powerful key to promoting parent involvement is to "'Make the parents feel more welcome" Pena (2000, p.52) and Henderson and Mapp (2002) also suggest that making parents feel welcomed at school is crucial. Furthermore, in a nationally representative study in the U.S., Turney and Kao (2009) found that family SES predicted parents feeling welcomed at school. However, more quantitative studies with this variable are needed.

Refraining from problem behaviors and good grades are intertwined (Hinshaw 1992); for instance, Greek adolescent students self-reported grades are negatively related with self-reported violent behavior on school property, such that youth with lower grades are more likely to act violently at school (Whaley and Noel 2013). Likewise, self-reported low grades are moderately related to self-reported adolescent aggression in 6th through 8th grade in the U.S. (Kim et al. 2011). Retention (having to repeat a grade level) is another important school outcome. Students with low grades and classroom behavior problems are more likely to be retained and continue to have more behavior and achievement problems than socially promoted students years later (Jimerson et al. 2006). In addition, parent involvement with the school is a strong predictor of non-retention (Jimerson et al. 1997). Therefore, the current study examined behavior, retention and grades as school outcomes in relation to important aspects of parent involvement during adolescence.

#### 2.1 Hypotheses

The following hypotheses each involve family SES, family structure, gender and ethnicity as control variables in a structural equation model (e.g., the covariance between SES and parent expectations is factored into the model): (1) Parent expectations will be positively associated with school outcomes; (2) Parent school relationships will be positively associated with school outcomes. In both of these hypotheses, school outcomes is a latent variable composed of grades, advancing grade levels without repeating and acceptable behavior. Numerous studies have found a positive association between parent expectations and positive school outcomes (e.g., achievement and high school completion), but this study is one of the first to examine the likelihood of a positive association between parent expectations for long-term educational attainment and acceptable behavior at school among middle and high school students. Parent school relationships (a latent variable comprised of parents trusting teachers, feeling welcomed at school and having satisfying interactions with staff) are expected to also have a positive association with school outcomes, because these variables have shown promise in previous studies.

#### 3 Method

#### 3.1 Data source and participants

The data used in this study were extracted from the dataset collected for the National Household Education Surveys (NHES) Program of 2007: Parent and Family Involvement in Education Survey (PFI: NHES: 2007; Hagedorn et al. 2008). The NHES PFI survey involved 10, 681 families of kindergarten through 12th grade children that completed interviews by phone and had a response rate of 39%. The current study involved 5,828 families with 6th through 12th grade students from across the U.S. As will be described further in the Data Analysis section, analyses treated the data as if there were 2,591 cases due to accounting for the design effect. 51.8% of the children in the sample were male and 48.2% were female. 58.7% of children in the study were European-American, 16.2 % were Black/African-American, non-Hispanic, 17.4% were Latino, 3.6% Asian American, 3.2% Native American/Alaskan Native, and .8 % Native Hawaiian or Pacific Islander. The mean age of youth in the study was 14 years and 6 months, with a standard deviation of 2.07 years. Household incomes ranged from \$5,000 or less per year to over \$100,000, with the average in the range of \$40,000 to \$50,000. The average parent in the study attended some college or vocational/technical school after high school: 6.8 % had less than a high school diploma; 21.4 % were high school graduates; 31.2 % had vocational/technical training or some college; 20.4 % were college graduates; 20.1 % had a graduate or professional degree. The average age of parent respondents was 44 (SD = 7.75; range = 18–83) and 78.5 % of the respondents were female. Family structure was distributed as follows: 69.5 % of families had a mother and father in the home; 22.4 % had solely a mother; 3.6 % had a father only; and 4.5% of children lived with guardians. The analysis employed the nationally representative population weight (FPWTnorm) so that the data represent parents of middle and high school youth in the U.S. because it accounts for the fact that the data was collected via probability sampling of families with school age children across the U.S.

Sat interact satisfying interactions, Good beh good behavior, Welcome feels welcome in school, HH income	Factors	Range	Mean	SD		
	Expectation	1.00-6.00	4.74	1.23		
	Trusts staff	1.00-4.00	3.25	.70		
	Sat interact	1.00-4.00	3.27	.85		
	Grades	1.00-4.00	3.16	.86		
	Welcome	1.00-4.00	3.32	.67		
	HH income	1.00-14.00	9.77	4.15		
	Education	1.00-5.00	3.26	1.20		
household income, advance	Good beh	0.00-1.00	.78	.41		
without repeating	Advance	0.00-1.00	.87	.33		

# 3.2 Measures

# 3.2.1 Parental expectations

NHES interviewers asked parents what level of education they expected their children to obtain, with the following options: 1 = less than a high school diploma; 2 = graduate from high school; 3 = attend vocational/technical school after completing high school; 4 = complete two or more years of college; 5 = finish a college degree; 6 = to complete a graduate (e.g., M.S. or PhD) or professional degree (e.g., J.D.). A comparable single item measure of parent expectations for long-term educational attainment has been used in various studies with youth (e.g., Englund et al. 2004; Froiland et al. 2013a; Xu et al. 2010; Zhang et al. 2011). In fact, a very similar item showed strong stability reliability (i.e., parent expectations in kindergarten predicted parent expectations in 8th grade) and predictive validity (predicting achievement in science, reading and math 8 years later) in a longitudinal study (Froiland et al. 2013a). Furthermore, Zhang et al. (2011) found that a one-item measure of parent expectations in 8th grade predicted student expectations, parent expectations and student achievement in 12th grade. See Table 1 for the means and standard deviations of Parental Expectations and the other variables in this study.

# 3.2.2 Parent school relationship

Parent School Relationship is a latent variable derived from parent responses on three items. One item asked parents the degree to which they trust the staff at the school to act with their child's best interest in mind (1=strongly disagree; 2=disagree; 3=agree; 4=strongly agree) and the second item asked the degree to which they are satisfied with interactions they have with school staff (1=very dissatisfied; 2=dissatisfied; 3=satisfied; 4=very satisfied). Parents' ratings of trust have been positively related to parents' reports of satisfying parent-teacher interactions and high school GPA (Adams and Christenson 2000). A third item asked parents the degree to which their child's school is welcoming to their family (1=strongly disagree; 2=disagree; 3=agree; 4=strongly agree).

## 3.2.3 Family SES

Family SES is a latent variable composed of parents' highest education level at the time of the interview and household income range. SES has been positively associated with children's achievement (Powell et al. 2012), positive behavior (Hinshaw 1992), parents feeling welcomed at school (Turney and Kao 2009), and parent expectations (Froiland et al. 2013a).

# 3.2.4 Family structure

Two-parent families received a 1 and all other families (mother only, father only, and non-parent guardian) received a 0. A similar dummy variable predicted various forms of achievement above and beyond parent involvement variables in Jeynes (2005a), although Jeynes' variable also included marital status (e.g., divorced single vs. divorced remarried).

## 3.2.5 Number of siblings

The number of siblings of children in the study ranged from zero to six (Mean = 1.43, SD = .77). This variable has been used in many studies of achievement and parent involvement (e.g., Chiu and Xihua 2008).

#### 3.2.6 Ethnicity

A dichotomous variable was used in the first model in which European American and Asian American = 1 and other minority = 0 (i.e., Latino, Black or African American and Hawaiian/Pacific Islander). This variable and very similar variables have been found to be significantly related to parent involvement in previous studies (Keith et al. 1993; Froiland et al. 2013a). In a second model, we addressed race/ethnicity more specifically with separate variables for African American (Black or African American=1; Other = 0); Asian American (Asian American=1; Other=0); and Latino American (Latino American=1; Other=0). European American served as the reference group.

#### 3.2.7 Child's gender

Female = 1 and Male = 0. This variable has been found to predict academic and behavioral outcomes in numerous studies, with adolescent girls developing reading achievement at a higher rate across the U.S. (e.g., Froiland and Oros 2013) and reporting less aggressive behavior than boys in countries across the world (e.g., Craig et al. 2009). Although the effects of parent expectations on achievement are nearly identical for boys and girls (Jeynes 2005b), parents talk with their daughters more about college in high school (Muller 1998), which could indicate higher parent expectations for educational attainment.

#### 3.2.8 Children's age

Children's age was utilized to run bivariate correlations with key variables in the study, in order to determine whether or not age would be included in the structural equation model. Previous research indicates that parent involvement at school generally declines with age (Stevenson and Basker 1987).

# 3.2.9 School outcomes

School outcomes is a latent variable composed of parents' estimates of their children's grades, their report of the number of times during the school year that any of their child's teachers or school administrators indicated that their child exhibited problem behaviors at school, and parent's reports of whether their child had to repeat a grade level or not. 77.9% of the sample reported zero contacts from the school about problem behavior; therefore, the variable was transformed into a dichotomous variable, with one representing no behavior problems reported and zero representing one or more behavior problems reported that their child advanced a grade level every year, whereas 13.2% of parents reported that their child repeated a grade level. This variable was labeled Advanced Grade Levels without Repeating (1 = advanced every year; 0=repeated a grade). Parents were also asked whether their child received mostly A's, B's, C's, or D's/lower. This variable was re-coded such that mostly A's=4, mostly B's=3, mostly C's=2, and mostly D's/lower=1.

#### 3.3 Data analysis plan

Structural equation modeling (SEM) in AMOS 19 was implemented to test the final model (see Fig. 1), which enabled a simultaneous examination of the multivariate relations between parent expectations, parent school relationships and school outcomes, while controlling for family SES. Model fit was determined by a comparative fit index (CFI) and Tucker-Lewis Index (TLI) of .95 or higher, as well as a root mean square error of approximation (RMSEA) less than .06 (Hu and Bentler 1999; as cited in Froiland et al. 2013a,c). Because a large n makes it very unlikely to have a non-significant chi-square (Kenny 2011), the Hoelter Index was utilized, which indicates how small the sample size would need to be in order for the chi-square to become insignificant (Kenny 2011; as cited in Froiland et al. 2013a,c). Because of the very large sample size in the current study, the CFI, TLI, and RMSEA were emphasized as indices of model fit. Use of the normalized population weight (FPWTnorm) makes the data representative of middle school and high school families across the U.S. because it accounts for the fact that the data was collected via probability sampling of families with school age children across the U.S. The normalized weight was divided by the design effect (2.25) appropriate for the middle and high school sample. This yields more accurate standard errors, and significance tests for parameters. Analyses were conducted with 2,591 cases (i.e., 5,828 actual cases that were treated by SPSS and AMOS as 2,591 due



**Fig. 1** Structural Equation Model (model 1) examining associations between parent expectations, positive parent school relationships and school outcomes. All path coefficients refer to standardized variables with mean 0 and variance 1.0. All coefficients are significant at p < .01, with the exceptions of gender to family structure, gender to ethnicity, gender to SES, and gender to parent school relationship. These non-significant paths were included in the model for testing purposes, but are not included in this figure, for the sake of visual clarity.  $R^2$  values, for the latent and specific school outcome variables, are provided above those variables

to dividing by the design effect, which is 2.25) including 90 cases that were missing data for one variable (i.e., grades), which was handled through regression imputation.

In order to see if more fine-tuned covariates for race/ethnicity would lead to further insight without damaging the model fit, we tested a second model (see Fig. 2). This model included African American, Asian American and Latino American as separate ethnicity variables, with European American as the reference group.

# 4 Results

Table 2 shows bivariate correlations between each of the continuous variables used in the study. Parent expectations were more highly correlated with grades than any other



Fig. 2 Structural Equation Model (SEM) examining associations between parent expectations, positive parent school relationships and school outcomes. This model is the same as Fig. 1, except with more specific race/ethnicity variables. Although exhaustive covariances between all exogenous variables were included in the test of the SEM model, they are not depicted here for the sake of visual clarity. All coefficients depicted are significant at p < .01, with the exceptions of Asian American to school outcomes, family structure to school outcomes, and Latino to school outcomes

variable in the study, including household income or parents' education. All three parent school relationship variables were positively related to grades. Children's age was negatively correlated with parent's feeling welcomed at school and satisfying interactions with school staff, but these correlations were weak. On the other hand, there was no significant correlation between age and parents trusting teachers. Children's age was also negatively correlated with parent expectations and positively correlated with grades, but these correlations were also weak. Therefore, age was not included in the structural equation model. Number of siblings had non-significant correlations with the parent-school relationship variables, with parent expectations, and with grades (see Table 2); therefore, the number of siblings was not included in further analyses. The three aspects of parent school relationships were moderately positively correlated

Factors	Welcome	Expectations	Trusts staff	Sat interact	Grades	Age	HH income	Education
Welcome	_							
Expectations	.13*	_						
Trusts staff	.62*	.13*	_					
Sat interact	.55*	.09*	.54*	_				
Grades	.20*	.43*	.21*	.18*	-			
Age	04	11*	03	06*	06*	_		
HH income	.13*	.31*	.08*	.06*	.29*	02	_	
Education	.16*	.37*	.11*	.09*	.30*	01	.56*	_
Siblings	- 03	- 03	01	00	00	- 07*	- 08*	- 05*

Table 2 Summary of Pearson correlations for variables relevant to perceived school outcomes

Welcome parent feels welcomed at school, *Expectations* parent expectations, *Sat interact*, satisfying interactions, *HH income* household income, *Education* parent education, *Siblings* number of child's siblings, \*p < .01

with each other. Expectations were moderately positively related to both aspects of SES, whereas both aspects of SES were more mildly positively related to the facets of parent school relationships.

The structural equation model (see Fig. 1) provided a good fit with the data, according to the following fit statistics: CFI=.97; TLI=.95; RMSEA=.04. A significant chi-square ( $\chi^2(37) = 213.08$ , p < .01) suggests that the data are significantly different than the model. However, the Hoelter Index indicated that 728 cases or less would lead to a non-significant chi-square, which is far fewer cases than in the study. Overall, the model demonstrated a good fit with the data.

As predicted in hypothesis 1, parent expectations had a positive relationship with school outcomes (unstandardized path coefficient=.06; p < .01; see Fig. 1 for the SEM diagram with standardized coefficients). Hypothesis 2 was also confirmed in that parent school relationships had a positive association with school outcomes (unstandardized path coefficient=.06; p < .01). Parent expectations had a stronger association with school outcomes than SES, ethnicity and family structure (see Fig. 1). In addition, the association between parent expectations and school outcomes was twice as strong as the association between parent school relationships and school outcomes (see Fig. 1). Family structure had a significant positive association with parent expectations, parent-school relationships and school outcomes. Also, gender had a positive association with parent expectations and school outcomes. Overall, the predictors in this model yielded an R<sup>2</sup> of .61 for school outcomes. Specifically, the R<sup>2</sup> for grades was the highest at .48, followed by good behavior at school (.18) and advancing grades without repeating (.18). This suggests that grades are the best explained by the family variables in the model.

The second model, involving more specific ethnicity variables, did not fit the data as well as model 1 as indicated by the TLI decreasing to .93 and the chi-square increasing (i.e.,  $(\chi^2(47) = 296.66, p < .01)$ ). However, the CFI (.96) and the RMSEA (.05) continued to indicate a good fit. In examining Fig. 2, it is clear that the associations found in model 1 held; for example, the standardized regression coefficient from parent

expectations to positive school outcomes was identical (.44 in each model). Likewise, the association between parent school relationships and school outcomes was identical to model 1. However, the more fine-tuned ethnicity variables in model 2 yielded some important findings. For instance, Asian American families had significantly higher long-term educational expectations than other families (correlation=.09), whereas African American and Latino families did not differ significantly from European American families on expectations. Also, the negative association between African American status and family structure (i.e., correlation=-.32) was the only significant association between ethnicity and family structure, indicating that African American children in the U.S. are the most likely to be from single parent families. Asian American status was not significantly related to parent school relationships, whereas African American and Latino American parents experienced less positive relationships (i.e., -.09 and -.05). In the second model the R<sup>2</sup> for school outcomes was .65.

## **5** Discussion

The results of this study are in accordance with numerous other studies that have found a moderate positive association between parent expectations for their children's long-term educational attainment and positive outcomes in the schools (e.g., Bandura et al. 2001; Englund et al. 2004; Fan and Chen 2001; Froiland et al. 2013a; Zhang et al. 2011). In this study, parent expectations had twice the path coefficient that parent school relationships had with parent reported school outcomes (grades, advancing grade levels each year, and acceptable behavior) for middle school and high school students. In addition, the path coefficient between parent expectations and school outcomes was larger than the coefficients of family SES, children's ethnicity, and family structure. Family structure proved to be an important control variable because two parent families (vs. single parent families) had higher parent expectations, stronger parent-school relationships and better school outcomes. Moreover, Asian American parents reported higher expectations than other parents across the U.S., which confirms previous findings with smaller samples in the U.S. (e.g., Okagaki and Frensch 1998). We also found that parents have higher expectations for girls across the U.S., which is in accordance with Muller's (1998) finding that parents of girls discuss college more with them when they are in 10th grade than parents of boys.

The relationship between parents expectations for educational attainment and behavior at school should be examined further in future studies, because the vast majority of studies on this variable have examined achievement as the outcome. Other positive outcomes that have been found to be related to parents' expectation for their children's educational attainment include children's expectations for long-term educational attainment (Bandura et al. 2001; Froiland et al. 2013a; Zhang et al. 2011), timely accrual of high school credits in core subjects (Catsambis 2001) and their high school graduation rates (Carbonaro 1998). However, this is the first study we could find that linked positive parent expectations for educational attainment to student's behavior at school. Based on the expectancy-value theory and social-cognitive theory, the parent's expectations are conveyed to the children, who then may more diligently focus their behavior upon meeting their academic expectations (Bandura et al. 2001;

Eccles and Harold 1993; Froiland et al. 2013a), which is likely to enhance academic performance, increase positive classroom behavior and decrease the chances that a student will fail a grade level.

This study found that parent school relationships (a latent variable composed of parents trusting staff, having satisfying interactions with staff and feeling welcomed at school) were positively associated with parent's perceptions of their children's grades, promotion and good behavior at school, above and beyond the effect of family SES and race/ethnicity. Adams and Christenson (2000) found that parents of high school students trust teachers significantly less than parents of elementary school students, but that trust was important at both periods of development. In the present nationally representative study, parental trust of teachers did not significantly decrease with the child's age (see Table 2), suggesting that the bulk of the decrease may happen prior to 6th grade. This is good news, especially because trust contributed to positive school relationships, which are related to school outcomes. Like Adams and Christenson (2000), we found that parental trust of teachers, satisfaction with teacher interactions, and student's grades are all positively related. Parents self-reports of positive cooperation with their children's schools may be impacted by their positive or negative memories of their own schooling; thus, empathically addressing parents' memories of school and elevating hope for fruitful interactions may be an important avenue for developing positive parent school relationships for those parents that have negative memories of school (Räty 2011).

A qualitative study with low SES families indicated that feeling welcomed at school is crucial for Latino American parents (Pena 2000) and a quantitative study indicated that family SES is a robust predictor of parents feeling welcomed at school (Turney and Kao 2009). In the current study, family SES was positively related to feeling welcomed at school and to the latent variable positive school relationships, though the relationship between parent expectations and SES was twice as strong. In the current study, feeling welcomed at school contributed, along with parental trust of staff and satisfying interactions with staff, to the positive association between parent school relationships and school outcomes. Parents feeling welcomed at school (as a part of a parent teacher relationship composite) has been linked to positive academic and behavioral outcomes among younger children (Powell et al. 2010), but this is the first study we know of that examines such a link among middle and high school students. If further research indicates a causal relationship, interventions should be developed that help educators to elevate parental expectations and build positive parent school relationships. Because Latino and African American families were likely to report less developed parent school relationships in the current nationally representative study, they may especially benefit from school environments that become more welcoming and supportive of trusting relationships between school and home.

This study suggests that parent expectations and parent-school relationships are both promising aspects of parent involvement, even when controlling for family structure, family SES, race/ethnicity and child gender. These findings are in accordance with Jeynes' (2010) suggestion that school involvement programs and school involvement intervention researchers may be wise to emphasize parent expectations, even though they are less visible than many parent involvement behaviors such as assisting with homework. Likewise, schools with parent involvement programs that focus exclusively on effectively teaching parents to engage in specific behaviors may be missing the important subtleties of creating a welcoming environment and developing trusting educator-parent relationships that involve positive interactions (Jeynes 2010).

# **6** Limitations

The measures in the study relied on parental report; this shared variance could lead to inflated correlations. In the future, GPA and promotion data from administrative records, as well as counts of problem behaviors from classroom observations would add credence to related studies. Likewise, future studies could examine whether parents convey expectations to their children in autonomy supportive vs. controlling ways, because autonomy support promotes students' intrinsic motivation to learn and emotional health (Froiland 2011, 2013). In addition, this study only involved one wave of data, which makes it impossible to examine causal relations. Future studies should examine the extent to which parent expectations and parent school relationships predict the long-term development of all three positive school outcomes. Future studies should also control for prior achievement, which is predictive of later achievement (Davison et al. 2004) and prior parent expectations, even though parent expectations during adolescence exert an effect above and beyond prior achievement and prior expectations (Froiland et al. 2013a; Zhang et al. 2011). Because parent-child conflict is a predictor of adolescents aggressive behavior at school (Georgiou and Stavrinides 2013), future studies should also examine parent-child conflict to see if parent expectations and parent school relationships affect behavior at school above and beyond this better established predictor. Nevertheless, this study utilized sophisticated controls, such as SES, gender, ethnicity (Jeynes 2007), and family structure (Jeynes 2005a) and pointed to two potentially important forms of positive parent involvement in middle and high school for youth across the U.S.

# 7 Conclusion

This study provided further confirmation that parent expectations are related to adolescents' performance and behavior at school. Other studies have linked parent expectations to academic achievement (e.g., Bandura et al. 2001; Froiland et al. 2013a) and high school completion (Carbonaro 1998). If future research confirms a causal link from parent expectations to school outcomes, then social psychology and education researchers will have more impetus to develop and study interventions that promote positive parental expectations along with other aspects of healthy parent involvement, such as a parent school relationship characterized by trust, satisfying interactions and feeling welcomed in middle and high schools. As of yet, parent involvement programs designed to improve achievement, although moderately successful, have largely ignored potentially puissant social psychological aspects of parent involvement, such as parent expectations (Jeynes 2012).

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