

**Parental Involvement and Students' Academic  
Performance: A Meta-Analysis**

**父母干预与学生成绩关系的元分析  
(英文版)**

◎ 童 一 著



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## Abstract

This monograph investigated the relationship between parental involvement and academic performance of students on the basis of the 70 papers (1981—2014) either published or unpublished in the United States. The author meta-analyzed the collected papers and concluded that parental involvement had but a small effect on academic performance of students. The conclusion was in consistency with the perspectives of Social Cognitive Theory and Social Capital Theory, which hold that environment affects persons in a way how persons interpret environment.

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# ABSTRACT

Parental involvement is a hot topic in education. However, inconsistent results of its effect on academic performance confuse the literature.

This study explored the overall relationship between parental involvement and academic performance of students from preschool to high school by means of meta-analysis. It further investigated the relationship when parental involvement was moderated by types of parental involvement, sources of data, student grade level, characteristics of children, and publication years. The 77 studies collected for the meta-analysis were the primary and the secondary studies conducted from 1981 to 2014. The study aims to enrich the literature in this area and offer suggestions to administrators, educators, and policy makers on how to guide parents to effectively involve themselves in their children's learning both at home and at school.

A big and significant  $Q$  of 9955.91 suggested that the variability of the effect sizes was unrelated to the sampling error and a random-effects model was selected accordingly. The result showed a weighted average effect size of  $+0.16$  ( $CI_{95\%}$ ,  $[.09, .24]$ ). The extent of heterogeneity,  $I^2$  index, was 99.24%, indicating the variability of effect sizes was substantial. The moderator analysis indicated that only the moderator of children with disabilities had a moderating effect on the relationship between parental involvement and academic performance. However, the only five studies did

not have much power. Sensitivity analysis indicated that an outlier study did not greatly affect the overall result. Publication bias was also checked and there was no indication of publication bias. Interpretations of the results were discussed. Limitations and recommendations were also discussed.

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# CHAPTER 1

## INTRODUCTION

### Background

Since the beginning of formalized schooling, schools and families have collaborated very closely with each other for the benefit of students. However, technological advancements after World War II weakened this close link between families and schools. Automobiles made it possible for the teachers to live far away from schools and new electronic devices such as television and telephone brought a wide view of the world to families and schools and thus changed people's values and attitudes toward schooling (Crimm, 1992). Epstein and Sanders (2002) have pointed out that the collaboration between schools and families changed over the years.

At the very beginning of schooling, parents selected and hired teachers to teach their children. Therefore, families had much more dominance over schools. By the middle of the 20th century, schools and families had separate responsibilities in education. Schools were responsible for students' academic work while families were responsible for their children's cultural, religious, and moral development. These changes led to mutual distrust between schools and families. People began to question the authority of the school (Comer, 1986). Schools began to realize the necessity and importance of closely linking to families. The policy makers also realized

this. The U.S. Department of Education (1986) stated in "What Works: Research About Teaching and Learning" that "parents are their children's first and most influential teachers" (p.7) and "parental involvement helps children learn more effectively" (p.19). Nowadays, schools and families unite and both hold responsible for children's education. Parents are not only involved in their children's school activities, such as attending school events and attending parent-teacher conferences, but also are involved in home activities related to education such as arranging time for study and play, helping homework, and hiring others to tutor their children.

With more parents involving in their children's learning and the emergence of the programs of assisting parents in involving in their children's learning, it is necessary to investigate how parental involvement affects children's academic performance. Coleman and his colleagues (1966) took the initiative on the study of the relationship between parental involvement and academic achievement. Their findings indicated that students' academic performance is greatly influenced by the level of parental involvement. It is Coleman and his colleagues that the door to a deep examination on the issue is opened widely. Much of the following research supported the view of Coleman and his colleagues (e.g., Henderson, 1987; Jencks, et al., 1972).

## Statement of the Problem

The importance of parental involvement for children's academic performance is not well recognized among educators, administrators, policy makers and parents until 1981 (Rosenzweig, 2001). After that year, a great volume of research has come into the literature and much of it has

confirmed the positive effect of parental involvement on children's academic performance (Becher, 1984; Henderson, 1994; Miller, 1986; Peterson, 1989; Swap, 1990; Keith and his colleagues, 1993; Keith and his colleagues, 1998; Sheldon & Epstein, 2005). Keith and his colleagues (1993, 1998) have obtained the consistent result that parental involvement has a positive effect on children's academic performance from their research across five years. In a study of 122 elementary school children, Griffith (2001) found a very high positive relationship between parental involvement and children's academic performance. Sheldon & Epstein's (2005) and Sirvani's (2007b) studies indicated that those students whose parents are actively involved in their learning have much higher mathematics achievements. The students with parental involvement are also found to be excellent in reading (Powell-Smith, Stoner, Shinn, & Good, 2000; Rasinski & Stevenson, 2005).

With the increase of the number of research on the relationship between parental involvement and children's academic performance, no effect (e.g., Okpala, et al., 2001; Anderson & Keity, 1997) or negative effect (e.g., Balli, Wedman, & Demo, 1997; Bronstein, Ginsberg, & Herrera, 2005) of parental involvement is also identified. Cooper et al. (2000) showed that the more parents directly involve themselves in their children's academic work, the lower the students score in standardized test scores and grades. Dwyer and Hecht (1992) illustrated that parental involvement has negligible effect on students' academic performance through a review of 350 studies. When parental involvement is moderated by other variables, its effect varies across different studies. For example, Catsambis (2001) concluded that parental involvement has a positive effect on children during their middle and high school years while Crosnoe (2001) found that parental involvement is not as effective for children's

academic performance through middle and high school as it is effective for academic performance of children in elementary schools. These contradictory results of research on the relationship between parental involvement and academic performance confuse the researchers, educators, policy-makers, administrators, and parents. It is important to know why there is a variation in the effect of parental involvement on children's academic performance. Many researchers have contributed a lot to this area. They have done correlational, experimental or quasi-experimental studies, or structural equation modeling in order to examine the relationship, but inconsistent results still emerge.

Even if we ignore the disagreement in the literature and let us suppose that the policy makers, educators, and administrators agree on the positive effect of parental involvement on children's academic performance, the remaining problems are that they are not clear in what way parental involvement can improve children's academic performance and to what degree this positive effect is. It is necessary to investigate how parental involvement can be effective and how effective it can be.

## Purpose of the Study

As stated previously, much research has indicated a positive effect of parental involvement on children's academic performance from preschoolers to 12th graders (Epstein, 1991; Wentzel, 1994; Anderson, 2000). But some research has shown no effect (Okpala et al., 2001) or negative effect of parental involvement on children's academic performance (Bronstein, Ginsberg, & Herrera, 2005).

In the literature concerning the relationship between parental involvement and children's academic performance, no consistent definition

of parental involvement can be identified. Researchers have the operational definition for their own purposes of research (Lau, et al., 2012). That might lead to the inconsistency of the results of the effect of parental involvement. Besides, a great variety of mediators such as motivation (e.g., Gronlnick, Ryan, & Deci, 1991), students' academic self-concept (e.g., d' Ailly, 2003), or change of behavior of both parents and children (e.g., Hubbard, 1999), students' different perceptions of parental involvement (e.g., Alfaro, Umanna-Taylor, & Bamaca, 2006), and much less number of research on the effect of parental involvement on children in middle and high school students than in elementary schools (e.g., Ceballo, Maurize, Suarez, & Aretakis, 2013) are potential possibilities for the inconsistent results.

One purpose of this study is to investigate the relationship between parental involvement and children's academic performance, to what extent the variability of the past results is, and why there is great variability in the past results through meta-analysis of the relevant research papers from 1981 to 2014. Another purpose of the present study is to add to the literature on this issue and to provide some guidance for the future research on the relationship between parental involvement and academic performance. Finally, this current study aims to offer some suggestions to the administrators, educators, and policy makers about how to guide parents to effectively involve themselves in their children's learning both at home and at school.

## Research Questions

Based on the problems and the purpose of the study stated previously, the following questions were answered in this study.

1. What is the relationship between parental involvement and students' academic performance?

- a) Does parental involvement predict students' mathematics performance?
- b) Does parental involvement predict students' reading performance?
2. What is the extent of any variability associated with the grand mean effect size of the aggregated study effect sizes?
3. Is the effect of parental involvement moderated by types of parental involvement, types of source of data, children's grade level, characteristics of children, and publication years?

## Significance of the Study

This review collected research papers conducted from 1981 to 2014 and made an analysis of the relationship between parental involvement and children's academic performance. Therefore, it can offer the results of the most recent research. It can add to the existing literature about the relationship between parental involvement and children's academic performance from preschool to the 12th grade. It can provide a general trend of the effect of parental involvement on children's academic performance over the recent 34 years. It can provide to the literature how the effect of parental involvement differs when it is moderated with substantive features such as types of parental involvement, types of source of data, children's grade level, characteristics of children, and publication years.

It is important to point out that this study made a comparison between the effect of parental involvement on children with disabilities and the effect of parental involvement on children without disabilities, filling a void in the current meta-analysis on this issue. The results of the study can provide knowledge on how parental involvement can help children with disabilities. Because more and more children with disabilities are included in regular classrooms with children without disabilities, a higher goal is set for

children with disabilities, namely, postsecondary education goal (OECD, 2012).

The results of the study can help educators, administrators, and policy-makers to understand how parental involvement affects children's academic performance. They can make better policies and design more appropriate programs to involve parents in schools to benefit both schools and families.

## Limitations and Delimitations

### Study limitations

The current study focused on the studies conducted from 1981 to 2014 on the relationship between parental involvement and children's academic performance from preschool to the 12th grade. It is assumed that the results of the study can be generalized to the population as it was conducted under a random-effects model (Card, 2012; Rosenthal, 1991; Lipsey & Wilson, 2001). The use of studies reporting  $r$  coefficient or other coefficients capable of being converting to  $r$  limited the search of relevant studies. The use of only electronic databases excluded many studies unavailable in these sources. Some of the studies selected had small sample sizes, which might not contribute reliable results.

### Study delimitations

The current study covered the studies using either home-based parental involvement, or school-based parental involvement, or both home-based and school-based parental involvement as a measure of parental involvement. The current study included the studies on the relationship