

Compliance in Homeschooled Children

Hannah Meeks Sharick and Richard G. Medlin

Stetson University

Author Note

Hannah Meeks Sharick, Psychology Department, Stetson University; Richard G. Medlin, Psychology Department, Stetson University.

Correspondence concerning this article should be addressed to Richard G. Medlin, Psychology Department, Stetson University, DeLand, FL 32723. E-mail: rmedlin@stetson.edu

Abstract

The purpose of this study was to measure homeschooled children's compliance while they worked on an academic task with their mothers. Participants were 24 homeschooled children (mean age 12.2 years) and their mothers. Maternal directives and children's reactions to them were recorded as mothers and children worked together on an academic task for 30 minutes. Randomly selected mothers were instructed to give their children both positive ("do this") and negative ("don't do that") directives during the task. Mothers also completed a measure of their perception of their children's everyday compliance. Both boys' and girls' compliance during the task was very high and was not affected by instructing their mothers to give directives. However, the more directives mothers gave their children, the more likely it was that negative behavior such as questioning or complaining accompanied children's compliance. Mothers who believed their children to be noncompliant in general gave them more negative directives. The results suggest that homeschooling parents are successfully teaching their children this important social skill.

Keywords: home schooling, compliance, socialization

Compliance in Homeschooled Children

A child is usually expected to comply with an adult's directive if the directive is reasonable, the child is capable of obeying it, and the adult has legitimate authority to make it. This expectation is so prevalent that a child who "often actively defies or refuses to comply with adults' requests or rules" (American Psychiatric Association, 1994, p. 94) may be diagnosed with a behavior disorder such as Oppositional Defiant Disorder. But as parents will readily attest, children must be taught to comply, and judging by the abundance of books and "expert" advice on the subject, it is not a quick and easy task.

Young children, in fact, do *not* comply much of the time (Owen, Slep, & Heyman, 2009; Clark, 1997). For example, an observational study found that toddlers and preschoolers willingly complied with only 30% of the requests their mothers made (Lollis, Kuczynski, Navara, & Koguchi, 2003, as cited in Kuczynski & Parkin, 2007). Mothers were sometimes able to force their children to obey, but more than half the time, children either did not comply at all or did so only when the request was changed to something they found a little more endurable. Children show a wide array of uncooperative behaviors, including (but unfortunately not limited to) "unwilling compliance, passive noncompliance, simple refusal, and defiance" (Kuczynski & Parkin, 2007, p. 277). Parents, for their part, use a similarly wide array of tactics to persuade reluctant children to comply, ranging from reasoning and compromise to bribery and coercion (Crockenberg & Litman, 1990; Kuczynski & Parkin, 2007; Maccoby, 2007). Getting young children to obey, therefore, is often a "quite extended" affair (Crockenberg & Litman, 1990, p. 970).

As children grow older, however, willing compliance to parental directives improves (Blandon & Volling, 2008; Vigilant & Wahler, 2005; Volling, Blandon, & Gorvine, 2006).

Although children's need for self-determination increases with age, so does self-regulation and internalization of their parents' standards (Grusec & Davidov, 2007; Kochanska & Aksan, 2006; Kuczynski & Parkin, 2007; Siegel & Cowan, 1984; Smetana, 1988). Children's maturing cognitive, linguistic, and physical skills also enable them to comply more readily and to inhibit competing behaviors (Owen et al., 2009). And though they may not always choose to do so, older children are better able to respond to unwanted parental directives without open conflict, an ability that parents are eager to cultivate (Kuczynski & Parkin, 2007).

Compliance and Socialization

The importance of the parents' role in the socialization of children is (almost) universally acknowledged (Collins, Maccoby, Steinberg, Hetherington, & Bornstein, 2000; Grusec & Davidov, 2007; but see also Harris, 1995, 2009). As Grusec and Davidov (2010) point out, "although socialization also occurs in other contexts, there is a compelling argument that its primary context is the family" (p. 688). This argument is based on five premises:

First, parents and children are part of a biosocial system that functions to protect offspring and to ensure that they are able to deal with the demands of social life....Second, the strong human need for interrelatedness plays a substantial role in the socialization process, and opportunities for such interrelatedness abound in the parent-child relationship....Next, in most societies, parents are formally assigned the role of primary agents of socialization. Fourth, practical reasons facilitate parents' motivation to socialize their children, given that they must live in close proximity to these children and that the lives of all are more comfortable when there is some agreement about the nature of appropriate behavior. Finally, parents are in a position in which they can control resources available to their

children as well as manage their environments to ensure that they are either protected from or forewarned about undesirable influences. (Grusec & Davidov, 2007, p. 285)

Parents who homeschool and those who don't both agree that teaching children to comply is an important goal of socialization (Hastings & Grusec, 1998; Johnson, 1991; Miller, 2000). But children's compliance is not only important to their parents—it is a central social skill. In an effort to develop a taxonomy of positive social behaviors in children and adolescents, Caldarella and Merrell (1997) analyzed 21 studies that altogether included more than 22,000 participants. All of the studies used “factor analysis, cluster analysis, or related multivariate techniques to derive common dimensions or constructs of social skills” (Caldarella & Merrell, 1997, Method section, para. 2). They found that the four most frequently identified dimensions of positive social behavior were peer relations, self-management, academic skills, and compliance. The specific behaviors most often associated with compliance included following instructions and directions, obeying rules, and responding appropriately when corrected. Similar behaviors, such as “follows rules and accepts imposed limits” and “listens to and carries out teacher directions” (Caldarella & Merrell, 1997, Table 3), were associated with the self-management and academic skills dimensions. Conversely, noncompliance is “associated with greater maladaptive behavior” (Owen et al., 2009, p. 640), and has been called “the most frequent reason children are referred for psychological services” (Clark, 1997, Abstract).

Research on Compliance

Not surprisingly, research confirms that children are more obedient when parents reinforce compliance and punish noncompliance (Chapman & Zahn-Waxler, 1982; Owen et al., 2009; Strand, Wahler, & Herring, 2001). Also not surprisingly, the methods parents use to

manage their children's behavior change as their children grow older, and certain methods work better than others (Bandon & Volling, 2008; Clarke, 1997; Hakman & Sullivan, 2009). Mothers and fathers typically try to control their children's behavior in different ways, and although children respond differently to mothers and fathers, there is little evidence that one way is more effective overall than the other (Bandon & Volling, 2008; Emmons, 2002). Girls tend to be more obedient than boys (Rothbaum & Weisz, 1994; Smith, Calkins, Keane, Anastopoulos, & Shelton, 2004). Children comply more willingly to positive directives ("do this") than to negative directives ("don't do that"), but parents often make a bad situation worse by giving more negative directives to children who are habitually noncompliant, even when they *are* being compliant at the moment (Bandon & Volling, 2008; Gauvain & Perez, 2008).

Much of the research on compliance has focused on the nature of the parent-child relationship in general, rather than on specific methods of control or types of directives. For example, children who are securely attached to their parents and who have received sensitive, protective caregiving are more compliant than other children (Dix, Stewart, Gershoff, & Day, 2007; Kochanska et al., 2010; Londerville & Main, 1981). Children are more willing to comply if their parents are characteristically responsive and attentive and treat them with courtesy and respect (Kochanska & Thompson, 1997; Maccoby, 2007; Maccoby & Martin, 1983; Martinez & Forgatch, 2001; Strand, 2002; Wahler, Herring, & Edwards, 2001). Parents who themselves comply with reasonable requests model cooperation and reciprocity, which their children tend to imitate (Kochanska & Murray, 2000; Parpal & Maccoby, 1985). And children are more compliant if their parents are able to understand their perspective when conflicts do occur (Davidov & Grusec, 2006). This research suggests that "children whose parents are typically

available and supportive in times of need” are better able to receive their parents’ directives as “manifestations of caring and goodwill” (Grusec & Davidov, 2007, p. 290).

Research has examined many aspects of homeschooled children’s social behavior (Medlin, 2000), but has not yet measured compliance directly. It is safe to say that *problems* in compliance have not been reported in the literature, and that there are hints that homeschooled students may be appropriately compliant in their families, in college, and in the wider community as adults (Kingston & Medlin, 2006; McEntire, 2005; Ray, 2004; Sutton & Galloway, 2000; White et al., 2007). For example, parents do not describe handling discipline problems as a difficult aspect of homeschooling (Medlin, 1995). They tend to rate their children’s maturity, cooperation, and self-control at or above the average of children attending conventional schools (Francis & Keith, 2006; Lee, 1994; Kingston & Medlin, 2006; McKinley, Asaro, Bergin, D’Auria, & Gagnon, 2007; Meighan, 1995; Smedley, 1992). Self-report and observational studies, though rare, also suggest that homeschooled children’s social skills are advanced (Kingston & Medlin, 2006; Medlin, 2007; Shyers, 1992a, 1992b; but see also McKinley et al., 2007). And some research suggests that homeschooling families may be likely to have the kind of responsive, supportive parent-child relationships that are associated with the development of compliance (Allie-Carson, 1990; McDowell, 1999, 2000; Miller, 2000; Resetar, 1990). But there are hints only, because the studies that offer them did not focus on compliance directly or involve actual observations of homeschooled children with their parents.

The Present Research

The purpose of this study was to measure homeschooled children’s compliance while they worked on an academic task with their mothers. To ensure that opportunities for compliance occurred, some of the mothers were instructed to give their children directives as

they worked together. It was hypothesized that children would comply most of the time, but that children whose mothers were told to give them directives would be less compliant than children whose mothers were allowed to act naturally. It was also hypothesized that boys would be less compliant than girls. It was expected that mothers' perceptions of their children's compliance in everyday situations would be related to their children's behavior during the academic task, and that mothers who believed their children to be noncompliant in general would give their children more negative directives.

Method

Participants

Twenty-four homeschooled children—10 boys and 14 girls—and their mothers participated in this study. The children's ages ranged from 11 to 13 years, with an average age of 12.2 years. Most (20) of the children were identified by their mothers as White, three as Hispanic, and one as Asian. Mother-child pairs were randomly assigned to either the control group or the experimental group such that there were 12 pairs in each. Participants were contacted through the researchers' personal connections with a local homeschool support group. Whether this sample was representative of the homeschooling population in the area was uncertain.

Materials

An observational coding system was created by the researchers to record maternal directives and children's reactions to them. Directives were classified as either positive ("do this") or negative ("don't do that"). Reactions to directives were categorized as either compliant or noncompliant. Compliance was defined as appropriately obeying the directive within 30 seconds, and noncompliance as not doing so. If children complied but also argued, complained,

questioned the directive, or made nonverbal expressions of displeasure such as sighing loudly or rolling their eyes, this accompanying behavior was noted as well.

A parent questionnaire measured how compliant each mother believed her child to be in everyday situations (see Appendix). This questionnaire included eight items indicating compliance, such as, “When I tell my child to do something, he or she does it immediately,” and ten indicating noncompliance, such as, “My child argues with me when I tell him or her to do something.” Mothers rated each item on a 6-point scale ranging from *very seldom* to *very often*. Questionnaires were scored by assigning a point value ranging from 1 for *very seldom* to 6 for *very often* for items representing compliance and the reverse for items representing noncompliance. Thus total scores could range from 18 to 108 with higher scores meaning mothers perceived their children to be more compliant.

Mothers in the experimental group received written instructions asking them to give their children both positive and negative directives during the observation period. Included with these instructions was a list of 11 suggested directives, such as, “Read this out loud” (positive) and “Stop fidgeting” (negative).

Procedure

Participants were observed in their own homes. Mothers were asked to work with their children on a school subject just as they normally would when homeschooling. Immediately before the observation began, mothers in the experimental group only were given the written instructions with suggested directives. All participants were then observed for 30 minutes, and mothers’ directives and children’s reactions were recorded using the observational coding system described above. Afterwards, mothers completed the questionnaire and the purpose of the study

was disclosed to them. Eight (one-third) of the observations were videotaped and coded later by a second observer in order to determine the reliability of the coding system.

Results

Inter-observer agreement was .76 across all of the categories included in the observational coding system. Agreement for the individual categories was: .79 for positive directives, .73 for negative directives, .76 for compliance, .57 for noncompliance, and .72 for negative behavior accompanying compliance. Agreement for noncompliance may have been lower simply because there were so few instances of it—each disagreement between the observers had a larger effect mathematically for noncompliance than for the other categories.

Table 1 presents the mean number of positive and negative directives given during the academic task for boys and girls in each group. Mothers in the experimental group gave their children more directives, just as they were instructed to do. Negative directives, however, were rare in both groups. An analysis of variance (ANOVA) was computed with the number of positive directives as the dependent variable and group and the child's gender as the factors. The only statistically significant effect was the group effect, $F(1,20) = 8.30, p = .009$, with $\eta^2 = .292$, indicating a "large" effect size. A similar ANOVA was calculated for negative directives; there were no statistically significant effects.

Mean compliance and noncompliance scores for boys and girls in each group are presented in Table 2. These scores were computed as percentages—the number of times children complied (or did not comply) divided by the number of directives given to them. Although compliance was very high in both groups, children in the experimental group and boys in both groups complied slightly less, as expected. However, an ANOVA with compliance

scores as the dependent variable and group and the child's gender as the factors produced no statistically significant effects.

Negative behavior such as arguing, complaining, questioning the directive, or making nonverbal expressions of displeasure did not often accompany children's compliance. In the control group such behavior occurred 5.8% of the time that children complied, and in the experimental group it occurred 7.9% of the time. An ANOVA was computed with percent of the time negative behavior accompanied compliance as the dependent variable and group and the child's gender as the factors; there were no statistically significant effects.

Pearson correlations were calculated among all the variables measured by the observational coding system across the entire sample. The percent of the time negative behavior accompanied compliance was significantly related to both the number of positive directives, $r(24) = .540, p = .006$, and the number of negative directives, $r(24) = .549, p = .005$.

The reliability of the parent questionnaire was found to be .86 using Cronbach's alpha. Mean questionnaire scores for the parents of boys and girls in each group are presented in Table 3. Note that all the means are well above the middle of the range of possible scores (63). An ANOVA was computed with questionnaire scores as the dependent variable and group and the child's gender as the factors; there were no significant effects.

Pearson correlations were computed between parent questionnaire scores and each of the observation scores across the entire sample. The correlation between questionnaire scores and the number of positive directives mothers gave their children during the academic task was not statistically significant. A negative correlation between questionnaire scores and the number of mothers' negative directives approached statistical significance, $r(24) = -.400, p = .053$. Correlations between questionnaire scores and compliance and noncompliance scores were not

statistically significant. However, there was a statistically significant negative correlation between questionnaire scores and the percent of the time negative behavior accompanied children's compliance, $r(24) = -.413, p = .045$.

Discussion

Homeschooled children's compliance to their mothers' directives was quite high, as expected. The hypotheses that boys would comply less than girls, and that children would comply less when the number of directives they were given was artificially increased, were not supported. The more directives mothers gave their children, however, the more likely it was that negative behavior such as questioning or complaining accompanied children's compliance. As expected, mothers who thought their children were less compliant in everyday situations tended to give them more negative directives. These children were more likely to exhibit negative behavior, but the hypothesis that they would comply less during the academic task was not supported.

Comparison to Previous Research

The result that children obeyed their mothers most of the time is consistent with previous research on homeschooled children, which suggests that their social behavior is "certainly no worse than" that of other children, and is "probably better" (Medlin, 2000, p. 116). That boys were no less compliant than girls, however, does not agree with earlier research on children attending conventional schools (Rothbaum & Weisz, 1994; Smith et al., 2004). Negative results are often due to methodological limitations—in this case, perhaps too few participants—but it is also possible that the homeschool environment is less likely than the conventional school environment to bring about or support gender differences in compliance, and perhaps other social

behaviors as well (cf. Montgomery, 1989; Sheffer, 1997). This issue would seem to be well worth further investigation.

Mothers who perceived their children to be less compliant in everyday situations gave their children more negative directives during the academic task, and although their children complied, they did so with more negative accompanying behavior. These results are consistent with previous research and reflect the complex, reciprocal nature of parent-child relations—parents' expectations influence how they treat their children, which in turn can elicit from their children the very behavior they expect, thus reinforcing their expectations for the next round (Gauvain & Perez, 2008; Larsson, Viding, Rijdsdijk, & Plomin, 2008).

The Issues

A reasonable question to consider is whether the children's compliance was high simply because they knew they were being observed. Although previous research has suggested that participant reactivity to in-home observations is minimal (Jacob, Tennenbaum, Seilhamer, Bargiel, & Sharon, 1994), it is possible that being watched put the children—and their mothers—on their best behavior. It should be noted, however, that none of the children knew the purpose of the study until after the observation was completed. None of the mothers did, either, unless some guessed it from the instructions to give their children directives during the academic task. Even so, these instructions were given immediately before the observation began, so that mothers could not coach their children to obey. And since children of mothers who received the instructions were no more compliant than children of mothers who did not, such influence seems unlikely.

Another question to consider is whether a high level of compliance is such a good thing after all. For example, some (e.g., Apple, 2005; Reich, 2002, 2005; West, 2009) have argued

that homeschooling permits a kind of “parental despotism” (Reich, 2005, p. 8) so complete that children may “fail to develop the capacity to think for themselves” (Reich, 2005, p. 9). These authors tend to depict homeschooling parents as rigidly authoritarian, compelling children to think and act a certain way, and hindering the development of their children’s individuality (which is, by the way, almost exactly how homeschooling parents describe the social environment of public schools) (Medlin, 2000). This argument is made primarily from a philosophical standpoint, and more thorough discussions of the issues involved can be found elsewhere (e.g., Burkard & O’Keeffe, 2005; Cox, 2003; Hardenbergh, 2005; Ray, 2009, 2010). It is perhaps relevant to note here, however, that this study and many others suggest that the more directives parents give and the more authoritarian their parenting style, the *less* compliant their children are likely to be and the *less* likely they are to internalize their parents’ values (Blandon & Volling, 2008; Braungart-Reiker, Garwood, & Stifter, 1997; Crockenberg & Litman, 1990; Grusec & Goodnow, 1994; Kochanska, Aksan, & Koenig, 1995; Kucsynksi, Kochanska, Radke-Yarrow, & Girnius-Brown, 1987; Smith et al., 2004). An alarmist view of homeschooling, in fact, has received very little support from empirical research.

Limitations and Conclusion

The strength of this study was that parents and children were observed while engaged in an activity that closely resembled what they actually do when they are homeschooling. A principal weakness was that homeschooled children were not compared to children attending conventional schools. Also, children were observed in only one situation, and only with their mothers, which yielded a limited view of their behavior. Although a simple dichotomy was used to classify children’s responses to maternal directives, it would have been more realistic to make a distinction between different *kinds* of compliance and noncompliance—to distinguish willing

cooperation from sullen submission, for example, and stubborn defiance from healthy independence. Despite these limitations, however, the level of compliance was found to be so high that it seems safe to conclude that homeschooling parents are successfully teaching their children this important social skill.

References

- Allie-Carson, Jayn. (1990). Structure and interaction patterns of home school families. *Home School Researcher*, 6(3), 11-18.
- American Psychiatric Association. (1994). *Diagnostic and statistical manual of mental disorders* (4th ed.). Washington, DC: Author.
- Apple, Michael. (2005). Away with all teachers: The cultural politics of homeschooling. In Bruce S. Cooper (Ed.), *Homeschooling in full view: A reader* (pp. 75-96). Greenwich, CT: Information Age Publishing.
- Blandon, Alysia, Y., & Volling, Brenda L. (2008). Parental gentle guidance and children's compliance within the family: A replication study. *Journal of Family Psychology*, 22, 355-366. doi:10.1037/0893-3200.22.3.355
- Braungart-Reiker, Julia, Garwood, Molly M., & Stifter, Cynthia A. (1997). Compliance and noncompliance: The roles of maternal control and child temperament. *Journal of Applied Developmental Psychology*, 18(3), 411-428. doi:10.1016/S0193-3973(97)80008-1
- Burkard, Tom, & O'Keeffe, Dennis. (2005). Homeschooling: The case against compulsory school attendance laws. In Bruce S. Cooper (Ed.), *Homeschooling in full view: A reader* (pp. 229-249). Greenwich, CT: Information Age Publishing.
- Caldarella, Paul, & Merrell, Kenneth W. (1997). Common dimensions of social skills of children and adolescents: A taxonomy of positive behaviors. *School Psychology Review*, 26, 264-278.
- Chapman, Michael, & Zahn-Waxler, Carolyn. (1982). Young children's compliance and noncompliance to parental discipline in a natural setting. *International Journal of Behavioral Development*, 5, 81-94.

Clark, Johnette E. (1997). The effects of reasoning and nurturance on child compliance.

Dissertation Abstracts International: Section B: The Sciences and Engineering, 58(4-B), 2151.

Collins, W. Andrew, Maccoby, Eleanor E., Steinberg, Laurence, Hetherington, E. Mavis, & Bornstein, Marc H. (2000). Contemporary research on parenting: The case for nature and nurture. *American Psychologist*, 55, 218-232. doi:10.1037/0003-066X.55.2.218

Cox, Rachel S. (2003, January 17). Home schooling debate: Is the movement undermining public education? *CQ Researcher*, 13(2), 25-48. doi:cqresrre2003011700

Crockenberg, Susan, & Litman, Cindy. (1990). Autonomy as competence in 2-year-olds: Maternal correlates of child defiance, compliance, and self-assertion. *Developmental Psychology*, 26, 961-971. doi:10.1037/0012-1649.26.6.961

Davidov, Maayan, & Grusec, Joan E. (2006). Multiple pathways to compliance: Mothers' willingness to cooperate and knowledge of their children's reactions to discipline. *Journal of Family Psychology*, 20, 705-708. doi:10.1037/0893-3200.20.4.705

Dix, Theodore, Stewart, Amanda D., Gershoff, Elizabeth T., & Day, William H. (2007). Autonomy and children's reactions to being controlled: Evidence that both compliance and defiance may be positive markers in early development. *Child Development*, 78, 1204-1221. doi:10.1111/j.1467-8624.2007.01061.x

Emmons, Yvonne D. (2002). Control strategies and compliance in mother-child and father-child dyads. *Dissertation Abstracts International: Section B: The Sciences and Engineering*, 63(1-B), 565.

- Francis, David J., & Keith, Timothy Z. (2006). Social skills of home schooled and conventionally schooled children: A comparison study. *Home School Researcher, 16*(1), 15-24.
- Gauvain, Mary, & Perez, Susan M. (2008). Mother-child planning and child compliance. *Child Development, 79*, 761-775. doi:10.1111/j.1467-8624.2008.01156.x
- Grusec, Joan E., & Davidov, Maayan. (2007). Socialization in the family: The role of parents. In Joan E. Grusec & Paul D. Hastings (Eds.), *Handbook of socialization* (pp. 284-308). New York: Guilford.
- Grusec, Joan E., & Davidov, Maayan. (2010). Integrating different perspectives on socialization theory and research: A domain-specific approach. *Child Development, 81*, 687-709. doi:10.1111/j.1467-8624.2010.01426.x
- Grusec, Joan E. & Goodnow, Jacqueline J. (1994). Impact of parental discipline on the child's internalization of values: A reconceptualization of current points of view. *Developmental Psychology, 30*, 4-19. doi:10.1037/0012-1649.30.1.4
- Hakman, Melissa, & Sullivan, Maureen. (2009). The effect of task and maternal verbosity on compliance in toddlers. *Infant and Child Development, 18*, 195-205. doi:10.1002/icd.599
- Hardenbergh, Nicky. (2005). Through the lens of homeschooling: A response to Michael Apple and Rob Reich. In Bruce S. Cooper (Ed.), *Homeschooling in full view: A reader* (pp. 97-108). Greenwich, CT: Information Age Publishing.
- Harris, Judith R. (1995). Where is the child's environment? A group socialization theory of development. *Psychological Review, 102*, 458-489. doi:10.1037/0033-295X.102.3.458
- Harris, Judith R. (2009). *The nurture assumption*. New York: Free Press.

- Hastings, Paul D., & Grusec, Joan E. (1998). Parenting goals as organizers of responses to parent-child disagreement. *Developmental Psychology, 34*, 465-479. doi:10.1037/0012-1649.34.3.465
- Jacob, Theodore, Tennenbaum, Daniel, Seilhamer, Ruth Ann, Bargiel, Kay, & Sharon, Tanya. (1994). Reactivity effects during naturalistic observation of distressed and nondistressed families. *Journal of Family Psychology, 8*, 354-363. doi:10.1037/0893-3200.8.3.354
- Johnson, Kathie C. (1991). Socialization practices of Christian home school educators in the state of Virginia. *Home School Researcher, 7*(1), 9-16.
- Kingston, Skylar T., & Medlin, Richard G. (2006). Empathy, altruism, and moral development in homeschooled children. *Home School Researcher, 16*(4), 1-10.
- Kochanska, Grazyna, Woodard, Jarilyn, Sanghag, Kim, Koenig, Jamie L., Yoon, Jeung Eun, & Barry, Robin A. (2010). Positive socialization mechanisms in secure and insecure parent-child dyads: Two longitudinal studies. *Journal of Child Psychology and Psychiatry, 51*, 998-1009. doi:10.1111/j.1469-7610.2010.02238.x
- Kochanska, Grazyna, & Aksan, Nazan. (2006). Children's conscience and self-regulation. *Journal of Personality, 74*, 1587-1617. doi:10.1111/j.1467-6494.2006.00421.x
- Kochanska, Grazyna, Aksan, Nazan, & Koenig, Amy L. (1995). A longitudinal study of the roots of preschoolers' conscience: Committed compliance and emerging internalization. *Child Development, 66*, 1752-1769. doi:10.2307/1131908
- Kochanska, Grazyna, & Murray, Kathleen T. (2000). Mother-child mutually responsive orientation and conscience development: From toddler to early school age. *Child Development, 71*, 417-431. doi:10.1111/1467-8624.00154

- Kochanska, Grazyna, & Thompson, Ross A. (1997). The emergence and development of conscience in toddlerhood and early childhood. In Joan Grusec & Leon Kuczynski (Eds.), *Parenting and children's internalization of values* (pp. 53-77). New York: Wiley.
- Kuczynski, Leon, Kochanska, Grazyna, Radke-Yarrow, Marian, & Girmius-Brown, Ona. (1987). A developmental interpretation of young children's compliance. *Developmental Psychology*, 23, 799-806. doi:10.1037/0012-1649.23.6.799
- Kuczynski, Leon, & Parkin, C. Melanie. (2007). Agency and bidirectionality in socialization: Interactions, transactions, and relational dialectics. In Joan E. Grusec & Paul D. Hastings (Eds.), *Handbook of socialization* (pp. 259-283). New York: Guilford.
- Larsson, Henrik, Viding, Essi, Rijdsdijk, Fruhling V. & Plomin, Robert. (2008). Relationships between parental negativity and childhood antisocial behavior over time: A bidirectional effects model in a longitudinal genetically informative design. *Journal of Abnormal Child Psychology*, 36, 633-645. doi:10.1007/s10802-007-9151-2
- Lee, Walter J. (1994). The socialization of home-schooled and public-schooled children. Unpublished doctoral dissertation, University of La Verne, La Verne, CA.
- Londerville, Susan, & Main, Mary. (1981). Security of attachment, compliance, and maternal training methods in the second year of life. *Developmental Psychology*, 17, 289-299. doi:10.1037/0012-1649.17.3.289
- Maccoby, Eleanor E. (2007). Historical overview of socialization theory and research. In Joan E. Grusec & Paul D. Hastings (Eds.), *Handbook of socialization* (pp. 13-41). New York: Guilford.
- Maccoby, Eleanor E., & Martin, John A. (1983). Socialization in the context of the family: Parent-child interaction. In P. H. Mussen (Ed.) & E. M. Hetherington (Vol. Ed.),

- Handbook of child psychology: Vol. 4. Socialization, personality, and social development* (4th ed., pp. 1-101). New York: Wiley.
- Martinez, Charles R., & Forgatch, Marion S. (2001). Preventing problems with boys' noncompliance: Effects of a parent training intervention for divorcing mothers. *Journal of Consulting and Psychology, 69*, 416-428. doi:10.1037/0022-006X.69.3.416
- McEntire, T. Wayne. (2005). Religious outcomes in conventionally schooled and home schooled youth. *Home School Researcher, 16*(2), 13-18.
- McDowell, Susan A. (1999). The perceived impact of home schooling on the family in general and the mother-teacher in particular—Part I. *Home School Researcher, 13*(4), 1-21.
- McDowell, Susan A. (2000). The perceived impact of home schooling on the family in general and the mother-teacher in particular—Part II. *Home School Researcher, 14*(1), 1-13.
- McKinley, Marcia J., Asaro, Jesika, N., Bergin, Jamie, D'Auria, Nicole, & Gagnon, Katherine. (2007). Social skills and satisfaction with social relationships in home-schooled, private-schooled, and public-schooled children. *Home School Researcher, 17*(3), 1-6.
- Medlin, Richard G. (1995). Home-schooling: What's hard? What helps? *Home School Researcher, 11*(4), 1-6.
- Medlin, Richard G. (2000). Homeschooling and the question of socialization. *Peabody Journal of Education, 75*(1,2), 107-123.
- Medlin, Richard G. (2007). Homeschooled children's social skills. *Home School Researcher, 17*(1), 1-8.
- Meighan, Roland. (1995). Home-based education effectiveness research and some of its implications. *Educational Review, 47*, 275-287. doi:10.1080/0305569840100308

- Miller, Bryan G. (2000). Socialization and home-educated children: An exploratory study. *Home School Researcher*, 14(2), 7-14.
- Montgomery, Linda. (1989). The effect of home schooling on the leadership skills of home schooled students. *Home School Researcher*, 5(1), 1-10.
- Owen, Daniela J., Slep, Amy M. S., & Heyman, Richard. (2009). The association of promised consequences with child compliance to maternal directives. *Journal of Clinical Child and Adolescent Psychology*, 38, 639-649. doi:10.1080/15374410903103510
- Parpal, Mary, & Maccoby, Eleanor E. (1985). Maternal responsiveness and subsequent child compliance. *Child Development*, 56, 1326-1334. doi:10.2307/1130247
- Ray, Brian D. (2004). *Home educated and now adults*. Salem, OR: NHERI Publications.
- Ray, Brian D. (2009). Who's afraid of "the other?" How about mixing it up? *Home School Researcher*, 25(2), 11-13.
- Ray, Brian D. (2010). The harms of homeschooling? Where are the premises? *Home School Researcher*, 25(3), 11-16.
- Reich, Rob. (2002). The civic perils of homeschooling. *Educational Leadership*, 59(7), 56-59.
- Reich, Rob. (2005). Why homeschooling should be regulated. Retrieved from <http://www.stanford.edu/group/reichresearch/cgi-bin/site/wp-content/uploads/2011/01/Reich-WhyHomeSchoolsShouldBeRegulated.pdf>
- Resetar, Mark A. (1990). An exploratory study of the rationales parents have for home schooling. *Home School Researcher*, 6(2), 1-7.
- Rothbaum, Fred, & Weisz, John R. (1994). Parental caregiving and child externalizing behavior in nonclinical samples: A meta-analysis. *Psychological Bulletin*, 116, 55-74. doi:10.1037/0033-2909.116.1.55

- Sheffer, Susannah. (1997). *A sense of self: Listening to home-schooled adolescent girls*.
Portsmouth, NH: Boynton/Cook.
- Shyers, Lawrence E. (1992a). A comparison of social adjustment between home and traditionally schooled students. Unpublished doctoral dissertation. University of Florida, Gainesville.
- Shyers, Lawrence E. (1992b). A comparison of social adjustment between home and traditionally schooled students. *Home School Researcher*, 8(3), 1-8.
- Siegal, Michael, & Cowen, Jan. (1984). Appraisals of intervention: The mother's versus the culprit's behavior as determinants of children's evaluations of discipline techniques. *Child Development*, 55, 1760-1766. doi:10.2307/1129923
- Smedley, Thomas C. (1992). Socialization of home school children. *Home School Researcher*, 8(3), 9-16.
- Smetana, Judith G.. (1988). Adolescents' and parents' conceptions of parental authority. *Child Development*, 59, 321-335. doi:10.2307/1130313
- Smith, Cynthia L., Calkins, Susan D., Keane, Susan P., Anastopoulos, Arthur D., & Shelton, Terri L. (2004). Predicting stability and change in toddler behavior problems: Contributions of maternal behavior and child gender. *Developmental Psychology*, 40, 29-42. doi:10.1037/0012-1649.40.1.29
- Strand, Paul S. (2002). Coordination of maternal directives with preschoolers' behavior: Influence of maternal coordination training on dyadic activity and child compliance. *Journal of Clinical Child and Adolescent Psychology*, 21, 6-15.
doi:10.1207/153744202753441620

- Strand, Paul S., Wahler, Robert G., & Herring, Melissa. (2001). The impact of behavior-specific and behavior-nonspecific reinforcement on child compliance to mother directives. *Behaviour Research and Therapy, 39*, 1085-1097. doi:10.1016/S0005-7967(00)00090-5
- Sutton, Joe, & Galloway, Rhonda. (2000). College success of students from three high school settings. *Journal of Research and Development in Education, 33*(3), 137-46.
- Vigilante, Vanessa A., & Wahler, Robert G. (2005). Covariations between mothers' responsiveness and their use of 'do' and 'don't' instructions: Implications for child behavior therapy. *Behavior Therapy, 36*, 207-212. doi:10.1016/S0005-7894(05)80069-3
- Volling, Brenda L., Blandon, Alysia Y., & Gorvine, Benjamin J. (2006). Maternal and paternal gentle guidance and young children's compliance from a within-family perspective. *Journal of Family Psychology, 20*, 514-525. doi:10.1037/0893-3200.20.3.514
- Wahler, Robert G., Herring, Melissa, & Edwards, Mair. (2001). Coregulation of balance between children's prosocial approaches and acts of compliance: A pathway to mother-child cooperation? *Journal of Clinical Child Psychology, 30*, 473-478. doi:10.1002/jcop.1030
- West, Robin L. (2009, Summer/Fall). The harms of homeschooling. *Philosophy and Public Policy Quarterly, 29*(3/4), 7-12.
- White, Scott, Williford, Elizabeth, Brower, John, Collins, Terance, Merry, Roman, & Washington, Maryam. (2007). Emotional, social, and academic adjustment to college: A comparison between Christian home schooled and traditionally schooled college freshmen. *Home School Researcher, 17*(4), 1-7.

Table 1

Means and Standard Deviations of the Number of Positive and Negative Directives Given by Mothers to Boys and Girls in Each Group

Control Group	Positive Directives <i>M (SD)</i>	Negative Directives <i>M (SD)</i>
Boys	8.67 (1.16)	0.00 (0.00)
Girls	9.11 (5.47)	0.56 (1.33)
Total	9.00 (4.69)	0.42 (1.17)
Experimental Group		
Boys	15.43 (4.96)	1.57 (1.40)
Girls	14.40 (3.72)	0.80 (0.84)
Total	15.00 (1.25)	1.25 (1.22)

Table 2

Means and Standard Deviations of the Percentage of Compliant and Noncompliant Responses to Maternal Directives for Boys and Girls in Each Group

Control Group	Percent Compliance <i>M (SD)</i>	Percent Noncompliance <i>M (SD)</i>
Boys	95.83 (7.22)	4.17 (7.22)
Girls	97.08 (6.73)	2.92 (6.73)
Total	96.77 (6.54)	3.23 (6.54)
Experimental Group		
Boys	91.18 (7.76)	8.82 (7.76)
Girls	97.29 (3.77)	2.71 (3.77)
Total	93.73 (6.92)	6.27 (6.92)

Table 3

Means and Standard Deviations of Parent Questionnaire Scores for the Mothers of Boys and Girls in Each Group

Control Group	Parent Questionnaire Scores <i>M (SD)</i>
Boys	82.33 (11.59)
Girls	86.22 (6.72)
Total	85.25 (7.77)
Experimental Group	
Boys	81.00 (18.89)
Girls	82.40 (2.70)
Total	81.58 (14.06)

Appendix

Parent Questionnaire**Please answer these demographic questions:**

Age of Child: _____ Grade of Child: _____ Gender of child: M F

Ethnic group or race of child: _____ I am the: Mother Father

Your ethnic group or race: _____

Please carefully fill out this survey, using a scale from 1 to 6.**1=Very Seldom 2 3 4 5 6=Very Often.**

1. When I tell my child to do something, he or she does it immediately. _____
2. When another adult (not a parent) tells my child to do something, he or she does it immediately. _____
3. My child does his or her chores when they are supposed to be done. _____
4. My child does his or her chores without complaining. _____
5. My child argues with me when I tell him or her to do something. _____
6. When I tell my child to stop doing something, he or she stops immediately. _____
7. My child refuses to do schoolwork. _____
8. My child puts off doing schoolwork as long as possible. _____
9. My child tries to negotiate with me when I tell him or her to do something. _____
10. My child displays a bad attitude when I ask him or her to do something he or she considers unpleasant (such as rolling eyes, sighing, or crossing arms). _____
11. Other adults compliment my child's behavior. _____
12. My child is well-behaved. _____
13. My child argues with me. _____

14. My child questions my reasoning when I ask him or her to do something. _____
15. My child tries to please me. _____
16. My child gets into trouble. _____
17. I have to tell my child to do something more than once before he or she will obey. _____
18. It is difficult to get my child to wear appropriate clothing. _____

This is an accepted manuscript of an article published by the National Home Education Research Institute in *Home School Researcher* in 2012, available online at:
<http://www.nheri.org/home-school-researcher/>

REFERENCE:

Sharick, H. M. & Medlin, R. G. (2012). Compliance in homeschooled children. *Home School Researcher* 26 (3), 1-10.