Title of Document: ECOLOGICAL DETERMINANTS OF PARENTING PRACTICES AMONG LATIN AMERICAN AND CARIBBEAN MOTHERS OF ADOLESCENTS: FINDINGS FROM THE NEW IMMIGRANT SURVEY

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Latin American and Caribbean immigrants are the fastest growing immigrants in the United States. Prior studies suggest that Latin American and Caribbean immigrant families in the U.S. face a number of risk factors including poverty, linguistic barriers, and mental health problems. Growing concern exists about the factors affecting the development of Latino and Caribbean immigrant adolescents. Moreover, a separate literature indicates that new immigrant Latin American and Caribbean families may face particular challenges in parenting their children within a new environment. Few studies include Latina and Caribbean mothers of adolescents; or examine the influence of various contextual factors on the parenting behavior of new immigrants. This study addresses these limitations through the use of a cultural-ecological framework to explore the relationship between three selected ecological factors and parenting practices of Latina and Caribbean immigrant mothers of early and late adolescents.

Data are drawn from a subset of 415 Latina and Caribbean mothers of an adolescent child age 10 to 17 in the New Immigrant Survey (NIS-2003). Multiple linear regression analyses were conducted to examine hypothesized models testing the
relationship between maternal acculturation, extended-family coresidence, and religious involvement and parenting practices.

After controlling for demographic characteristics, the findings revealed that one measure of maternal acculturation, years of U.S. residence, was related to lower use of cognitive stimulating activities and strict punishment discipline, as well as less parental school involvement. A second measure of maternal acculturation, English proficiency, was associated with lower use of cognitive stimulating activities, but greater parental school involvement. Greater maternal religious involvement was related to less emotional support, less parental school involvement, and more cognitive stimulation. All three ecological factors were unrelated to positive control discipline. The findings also revealed differences among adjustee mothers and new-arrival mothers. Implications for research and culturally appropriate interventions for Latin American and Caribbean families and their children are discussed.
ECOLOGICAL DETERMINANTS OF PARENTING PRACTICES
AMONG LATIN AMERICAN AND CARIBBEAN MOTHERS OF ADOLESCENTS:
FINDINGS FROM THE NEW IMMIGRANT SURVEY

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DEDICATION

*Pitit sè richès pòv malèrè.*  
(Children are riches…)  

Haitian Proverb

This dissertation is dedicated to the most valuable riches in my life, my daughters, Yanell Jamila Edmond-Pierre and Ellyana Najja Edmond-Pierre, with gratitude to their father, Ellis Pierre. Yanell and Ellyana, you are my anchors, my reason for being, and the inspiration for everything in my life. I am forever thankful to God for choosing me to be your mommy.
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Bon pa gaspiyé.
(Good is never wasted)

Haitian Proverb

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CHAPTER I: INTRODUCTION

The *Immigration and Nationality Act Amendments of 1965* (PL 89–236) profoundly changed the character of immigration in the United States. This landmark legislation, which eliminated the national origins quota system and established admission based mostly on kinship ties to relatives already in the United States, revolutionized a century of exclusionary policies based on race and nationality, so that today the newest immigrants are no longer of European descent (Fallon, 1996; Greenblatt, 1995; Mindel, Habenstein, & Wright, 1998). Instead, new immigrants have come from Asia, Africa, the Middle East, Latin America, and the Caribbean (Fallon, 1996; Ho, 1986; U.S. Census Bureau, 2004). In essence, the new immigrants have drastically changed the racial, ethnic, cultural, and linguistic makeup of the United States (U.S. Department of Health and Human Services, 2001).

For more than a decade, Latin American and Caribbean immigrants and their families have been at the center of a contentious political debate on immigration. According to Greenblatt (1995), “since 1967, European and Canadian immigration to the U.S., which had accounted for approximately 85 percent of the total from 1820–1960, has fallen to 17 percent, while immigration from Asia and Latin America has risen to 81 percent” (p. 1067). According to Suarez-Orozco and Suarez-Orozco (2001), the United States is experiencing the largest wave of immigration in its history, and immigrants from Latin America and the Caribbean are disproportionately driving this trend. Moreover, it is estimated that by the year 2010, the children of immigrants will comprise almost one-fourth of the school-age population in the United States (Lambert, 1996; Yearwood, 2001). Despite the increasing numbers of these recent immigrants from Latin America
and the Caribbean, there is limited understanding of child socialization practices among these groups (Mindel et al., 1998; Miranda, Estrada, & Firpo-Jimenez, 2000; Roopnarine, Krishnakumar, Metindogan, & Evans, 2006; Vega, 1990).

Statement of the Problem

Descriptive analysis of recent surveys, such as the National Survey of American Families, indicates that children of immigrant families, compared with those in native-born families, have higher poverty rates, worse perceived health status, and less health care access (Capps, Fix, Ost, Reardon-Anderson, & Passel, 2004). In response, policymakers are now asking for information from the research conducted with immigrant populations to help them plan future services (Foss, 1996). In a related effort, researchers, clinicians, and educators are beginning to probe many important questions regarding factors affecting the development of these immigrant children as well as the child socialization practices used by their parents.

Some scholars of immigration have identified research on children of Asian, Latin American, and Caribbean immigrants, as well as their parents, as a priority area (Hernandez & Charney, 1998; Portes & Rumbaut, 2001), because parenting practices used in the native-born U.S. population have been found to be strong determinants of children’s competence and psychosocial adjustment (Abidin, 1992; Belsky, 1984; Hill, 2001; Jacobson & Crockett, 2000; Koa, 2004; Reis, Barbera-Stein, & Bennett, 1986; Steinberg, 2001). For example, in families experiencing economic hardship, parental acceptance and support have been shown to improve children’s mental health and resilience in the face of chronic stressors in their social environment (Luthar, 1999; McLoyd, 1990, 1998). Furthermore, in a review of the parenting literature, Kotchick and
Forehand (2002) found that parenting behaviors that include positive reinforcement, warmth, affection, active monitoring of children’s activities, consistent discipline, and active involvement in the children’s school have been significantly associated with positive socioemotional outcomes for children and adolescents.

Early research on nonimmigrant and immigrant children and youth also has identified parental socialization practices as critical in determining child and youth outcomes in diverse ethnic and cultural groups (Steinberg, Dornbusch, & Brown, 1992). Increasing evidence indicates that effective socialization behavior, such as warm and involved parenting, appropriate control, and acceptance/support, has a positive influence on child and adolescent social, emotional, and academic adjustment (Belsky, 1984; Dumka, Roosa, & Jackson, 1997; Maccoby & Martin, 1983). For example, Dumka et al. found in their study of 121 Spanish-speaking low-income Mexican immigrant and Mexican American families that high levels of supportive parenting were linked to low levels of child depression and child conduct disorders. However, the literature also indicates differences in the way individuals within each minority group parent. Specifically, the research notes variations in the parenting patterns of ethnic parents depending on their socioeconomic status, educational status, and the number of years they have been in the United States (Jambunathan, Burts, & Pierce, 2000).

Moreover, using an ecological approach (Bronfenbrenner, 1986), recent research on immigrants has begun to untangle the cultural and contextual factors that influence parenting practices in these growing ethnic populations (Eamon, 2002, 2005; Figueroa-Moseley, Ramey, Keltner, & Lanzi, 2006; Roopnarine et al., 2006). Several researchers have found that traditional factors, such as educational level, age, and socioeconomic
status (Bonds, Gondoli, Sturge-Apple, & Salem, 2002; Jacobson & Crockett, 2000), as well as language fluency, family composition, and immigration status, are positively associated with parenting (Varela et al., 2004). There is general agreement that multiple determinants of parenting practices are specific to these cultural groups. For example, Garcia Coll et al. (1996) and Foss (1996) emphasize that contextual factors, such as race, socioeconomic status, discrimination, migration, acculturation, economic resources, language ability, extended living arrangements, family and kinship networks, community-based religious and social ties, and political environment, are integral to the study of immigrant parenting practices.

Varela et al. (2004) further assert that the ecological context in which families live and the cultural background of the parents are adaptive elements that shape family socialization processes and children’s outcomes in immigrant families. More importantly, while minority families of various ethnicities in the United States face similar ecological challenges, such as poverty, segregation, and racism, variations in cultural values, beliefs, and behaviors might influence how child-rearing practices evolve within specific groups to meet these challenges (Garcia Coll et al., 1996; Ogbu, 1981).

Latin American and Caribbean families represent a particular developmental context for children. As waves of these new immigrants and refugees continue to increase throughout the United States, there is obviously a need to identify specific factors associated with optimal parenting within this particular developmental context. Furthermore, Garcia Coll et al. (1996) emphasize the need to examine family, community, and cultural level variables and processes in order to answer more fully the
critical questions regarding parenting (Meyers, 1999), including what factors relate to Latin American and Caribbean immigrant parenting behavior.

One salient factor that has been associated with optimal parenting is acculturation, defined as a dynamic process by which individuals and families adapt to the norms and values of the American culture through English proficiency, length of residence, generational status, and ethnic identity (Buriel & DeMent, 1997). According to Dumka et al. (1997), parenting practices within an immigrant ethnic group can vary depending on the parents’ level of acculturation. Specifically, the extent to which immigrant parents take on the norms and values of the host culture and also retain the norms and values of their native culture helps define the parenting practices they consider optimal. Research shows, for example, that less acculturated Puerto Rican and Dominican parents used more negative verbal feedback and were more controlling than more acculturated parents during a teaching task with their preschool children (Planos, Zayas, & Busch-Rossnagel, 1995). Although the parenting practices exhibited by the less acculturated mothers were not necessarily associated with successful adaptation in mainstream U.S. culture, they might have been in line with Puerto Rican and Dominican culture. However, recent research on immigrant parenting and optimal child outcomes asserts that higher parental acculturation might reflect a more advantageous fit between the family as a developmental niche and the majority culture; as a result, the probability of positive child and youth outcomes is increased (Hacker, 2001; Hill, Bush, & Roosa, 2003).

Another relevant factor connected to successful parenting is extended-family coresidence, measured by number of nonparental adults in home, which can be some combination of adult siblings, parents, grandparents, and other kin and nonkin members
residing in the same living quarters (Burr & Mutchler, 1993; Hofferth, 1984; Roosa, Morgan-Lopez, Cree, & Specter, 2002). Studies examining living arrangements and parenting assert that the extended family is a problem-solving and stress-coping system that addresses, adapts, and commits available family resources to transitional and crisis situations (Harrison, Wilson, Pine, Chan, & Buriel, 1990; Julian, McKenry, & McKelvey, 1994; Mowbray, Bybee, Hollingsworth, Goodkind, & Oyserman, 2005; Sarkisian, Gerena, & Gerstel, 2006). For example, support from coresiding extended family members has been linked to positive parenting among Latina mothers (Contreras, 2004; Leyendecker & Lamb, 1999). Thus, Latin American and Caribbean families’ extended living arrangements can influence socialization practices of immigrant parents through the provision of tangible aid, guidance, and supervision from other nonparental adult household members (Roosa et al., 2002).

A third influence on immigrant parenting is religious involvement, often measured as the frequency of church attendance and church membership. Previous studies have shown that religious involvement is strongly associated with better socioemotional adjustments among new immigrants (Prudent, 1988). More recent studies have cited the connection between religious involvement and the family in the socialization process of young children and adolescents (Pearce, Jones, Schwab-Stone, & Ruchkin, 2003; Yearwood, 2001). Many studies note that religious involvement might function as an external regulator of maternal parenting behavior through the access of instrumental and emotional support (Keating-Lefler, Hudson, Campbell-Grossman, Fleck, & Westfall, 2004), as well as shared cultural and social norms from a religious
network (Chrispin, 1998). Thus, religious involvement by immigrant Latin American and Caribbean mothers, and the family unit, might promote positive parenting practices.

Although the body of research on Latin American and Caribbean families has grown, the available literature on determinants of parenting practices within these groups is limited. In the few studies on parenting among Central and South American families, more attention is devoted to the parenting behavior of immigrant mothers of young children than those of adolescents (DeSantis, Thomas, & Sinnet, 1994; Dumka et al., 1997; Miranda, Siddique, Der-Martirosian, & Belin, 2005). In addition, very few of the numerous studies on protective factors examine the influence of both personal and contextual factors on parenting outcomes (Roopnarine et al., 2006). Moreover, in the various studies on social network support and parenting practices in immigrant populations, living arrangements and church attendance are often confounded within the broader definitions of social support (Bowsher, Maloney, & Lillis, 1997; House, 1987; Mowbray et al., 2005). Few studies have separately examined the influence of living with extended family and the religious involvement of individuals and families on parenting behavior.

Rationale for the Study

Many theorists and researchers have written about the posited or observed direct effects of psychological and social factors on parenting in the native U.S. population (Cairney, Boyle, Offord, & Racine, 2003; Embry & Dawson, 2002; Gelfand & Teti, 1990; Wright, George, Burke, Gelfand, & Teti, 2000). However, research has not addressed the role of personal and contextual factors in predicting parenting behavior in the newest U.S. immigrants. Moreover, most studies that have investigated the
relationship of acculturation levels and parenting practices among Latin American and Caribbean immigrants have relied solely on mothers’ self-report measures. Also, few extant studies include families with older Caribbean adolescents. In addition, the literature lacks a focus on the extent to which other ecological determinants, such as specific types of living arrangements and religious involvement, predict various parenting practices. Consequently, more empirical knowledge regarding the relationship of these ecological determinants and parenting among Latin American and Caribbean immigrant families is needed to understand and address more fully the issues facing this growing population.

To address some of the current gaps in the parenting literature, this study explored the possible influences on maternal parenting practices in Latin American and Caribbean immigrant families with adolescents ages 10 to 17. Specifically, this study examined the role of acculturation, extended-family coresidence, and religious involvement in predicting four types of parenting practices—cognitive stimulation, emotional support, discipline, and school involvement—in a national sample of mothers who have immigrated to the United States from Columbia, Cuba, the Dominican Republic, El Salvador, Guatemala, Haiti, Jamaica, Mexico, Peru, and other Latin American and Caribbean nations. Parenting practices in this study included data collected utilizing both self-report and observational methods.

The study involved secondary analyses of a new data source, the New Immigrant Survey (NIS). The NIS is the first longitudinal survey of a nationally representative sample of two types of immigrants to the United States who are considered new legal permanent residents: (1) “New Arrivals,” who are immigrants arriving with documents
acquired abroad, and (2) “Adjustees,” who are those already in the United States illegally or with a temporary nonimmigrant visa admitted to lawful permanent residence (Jasso, Massey, Rosenzweig, & Smith, 2005). The focus of the NIS survey is to collect public-use data on these new legal permanent residents to the United States and their children through the electronic administrative records compiled by the U.S. Immigration and Naturalization Service (INS) and the Office of Immigration Statistics. Three key goals of the NIS are to (1) assess the differences that occur within immigrant lifestyles pre- and post-immigration, (2) assess how social networks of families serve as support, and (3) compare the health and well-being of immigrants with native citizens in terms of child-rearing as well as individual health (Jasso, Massey, Rosenzweig, & Smith, 2006). The first wave of the data collection (NIS–2003) was conducted from May to November 2003 and yielded 8,750 respondents in the Adult Sample and 810 respondents in the Child Sample. Data from this first cohort, which contains a subsample of 415 Latin American and Caribbean mothers drawn from the two samples, were analyzed for this study.

Research Questions

The current study contributed to the literature on parenting practices within Latin American and Caribbean immigrant families with young adolescents by examining the following questions with the subsample of mothers drawn from the NIS:

1. What are the characteristics of new legal permanent resident immigrant mothers from Latin America and the Caribbean?
2. What are the parenting practices of mothers of adolescents in Latin American and Caribbean immigrant families?
3. Are selected ecological factors (i.e., acculturation level, extended-family coresidence, and religious involvement) related to mothers’ parenting practices in Latin American and Caribbean immigrant families?
CHAPTER II: REVIEW OF LITERATURE

Growing concern exists about the vulnerability of Latin American and Caribbean immigrant children and adolescents to development of behavioral and mental health problems, as well as academic underachievement (Martinez, 2006; Plunkett & Bamaca-Gomez, 2003; Weiss, Goebel, Page, Wilson, & Warda, 1999). A key goal of the research on Latin American and Caribbean children and youth has been to determine the degree to which these problems might be influenced by parenting behavior and socialization practices in the home. This chapter examines several lines of research and theories for their relevance in understanding the relationship between various ecological factors that might influence the parenting practices of new immigrant Latin American and Caribbean families. The literature review begins with the theoretical models that will guide this study. It presents the relevant research on optimal parenting, reviews the research on Latin American and Caribbean immigrants, and examines key factors with the potential to influence parenting practices among Latin American and Caribbean families with adolescents.

Theoretical Models

A cultural-ecological systems model guided the organization of this study and served as the theoretical framework. The traditional ecological systems model assumes that developmental and behavioral outcomes are determined by differential and interactive effects of multiple and interdependent systems. Specifically, the theory posits that individuals develop within the context of the following four ecological systems: the microsystem, the mesosystem, the exosystem, and the macrosystem (Bronfenbrenner,
The first context, the microsystem, is the immediate environment that personally affects the individual. Early models were used to examine developmental issues with the child as the individual of focus. For example, parents, day care centers, and schools are microsystems that directly influence children and adolescents through face-to-face interaction. The second context, the mesosystem, refers to the interaction between the developing individual and various microsystems. For example, parent–teacher collaborations at school can influence parent–child interaction at home. The third context, the exosystem, consists of social structures that indirectly influence the microsystems of individuals, such as the neighborhood, workplace, or parent’s social network. The last context, the macrosystem, comprises the three previous systems, as well as the cultural and religious ideologies of a society, which are reflected in its legal or political, economic, and educational systems.

Figure 1. Bronfenbrenner’s ecological systems model
These ecological systems can be likened to influences at four typological nested
levels: the individual level (microsystem), the family level (mesosystem), the community
level (exosystem), and the larger cultural level (macrosystem). When factors within each
of these levels are stressful, children are at developmental and psychological risk (Reis et
al., 1986); when factors are supportive and protective, families are able to respond
positively in adverse situations (Meyers, 1999). In addition, risk and protective factors in
one level of the system can affect the other three levels (Bronfenbrenner, 1986; Potocky-
Tripodi, 2006).

When studying Latin American and Caribbean families, one must pay attention to
the cultural dimension of day-to-day situations (Ogbu, 1991). In an integrated model,
Garcia Coll et al. (1996) expand on the ecological model to include race, ethnicity,
socioeconomic status, migration, acculturation patterns, and structure of the family as
larger cultural–ecological components that influence children’s development in minority
and immigrant families. They posit that “minority parents residing in the United States
must decide what aspects of ethnic parenting they wish to retain and those they wish to
relinquish in favor of the dominant culture’s parental values, attitudes, and practices”
(Garcia Coll et al., 1996, p. 1904). The integrative model further clarifies how immigrant
families adapt their behaviors and values and how this can lead to a downward
assimilation for many Latin American and Caribbean families. Landale’s (1997)
discussion of segmented assimilation asserts that downward assimilation occurs when
immigrant groups assimilate into a marginalized section of the host culture based on a
history of racism and oppression. These immigrants become marginalized also and
develop adaptive behaviors within this new context. Moreover, Garcia Coll et al. (1996)
argue that to understand parenting behavior and developmental outcomes of minority children, studies must examine the unique ecological experiences that are not frequently shared by native-born White families. For Latin American and Caribbean families, acculturation experiences are particularly relevant because “acculturation refers to the process of immigrants interacting with their immediate environment and deciding which elements of the culture of origin to retain and which elements of the new culture to adopt” (Dumka, Prost, & Barrera, 1999, p. 1).

Immigrant adults in their roles as parents are the focus of this study. On the individual level of the ecological system, parental characteristics, such as age, gender, education, and mental health, as well as acculturation, influence the risk of stress related to the daily role of parenting (Bradley, Corwyn, McAdoo, & Garcia Coll, 2001; Jackson, 2000; Middlemiss, 2003). At the family level, the risk of poor parenting also increases in family living arrangements in which the number of adult household members is low (Contreras, Narang, Ikhlas, & Teichman, 2002; Garcia Coll et al., 1996; Harrison et al., 1990; Jackson, Brooks-Gunn, Huang, & Glassman, 2000). Specifically, research using adapted ecological approaches indicates that factors such as marital status, number of children, number of household members, income, and social network resources at the mesosystem and exosystem are important determinants of parents’ ability to provide emotionally supportive home environments and cognitively stimulating activities (Bogenschneider, Small, & Tsay, 1997; Contreras, Narang et al., 2002; Gallagher, 2002; McLoyd, 1990; McLoyd, Jayaratne, Ceballo, & Borquez, 1994). At the community level, activities such as religious involvement can directly influence parenting practices by fostering connections between parents and the broader society and by supporting warm
and positive parent–child relationships (Pearce & Axinn, 1998). Moreover, at the cultural level, religious influences, government policies, and socioeconomic opportunities have been shown to predict parental use of controlling behaviors (Eamon, 2002, 2005).

While several of these investigations have focused largely on parenting in middle-class European American populations (e.g., Bogenschneider et al., 1997; Bronstein et al., 1996), others have focused on specific ethnic groups (Bluestone & Tamis-LeMonda, 1999; Chao, 2001; Contreras, Narang et al., 2002; Eamon, 2002; Foss, 1996; Gallagher, 2002; McLoyd, 1990; McLoyd et al., 1994; Solis-Camara & Fox, 1996). For example, Bluestone and Tamis-LeMonda (1999) examined maternal characteristics, negative child-rearing histories, and parenting styles in 114 working and middle-class African American mothers of children ages 5 to 12 using the Parenting Dimensions Inventory. Results indicated that parenting styles are influenced by parental characteristics, such as mental health, and sociodemographic factors, such as income, even in low-risk community populations. Furthermore, the researchers emphasized the importance of extending research on the determinants of parenting to gain a fuller understanding of the factors that contribute to diverse parenting strategies in underrepresented cultural populations (Bluestone & Tamis-LeMonda, 1999).

In summary, theorists and researchers using ecological models indicate that studies of parenting should (1) examine the context in which families are embedded, (2) investigate the culture-specific practices of families, and (3) identify the factors at various ecological levels that influence parenting strategies. At the individual level, this study investigated the relationship of maternal acculturation level to parenting practices (a family-level outcome). At the family level, the study looked at extended-family
coresidence and its relationship to parenting practices. At the community level, the relationship of religious involvement by mothers to parenting behavior was explored. In addition, the relationship of sociodemographic characteristics, such as child gender, maternal education, and income, to parenting practices were examined as control variables. In the next section, the relevant literature is reviewed on key study variables and findings related to Latin American and Caribbean parenting.

**Family Level: Importance of Parenting**

Recent literature provides clear evidence that parents play an important role in the lives of children and youth and that parenting practices significantly influence child and adolescent social, emotional, and academic adjustment (Ceballo, 2004; Eamon, 2005; Koa, 2004; Spera, 2005). Parenting is a complex activity that includes many specific behaviors and attitudes that work individually and together to influence child outcomes (Belsky, 1984). Two key variables examined by researchers to understand parenting are parenting style and parenting practices.

Darling and Steinberg (1993) have suggested that researchers maintain a distinction between parenting style and parenting practices. They define parenting styles as a “constellation of attitudes toward the child that are communicated to the child and create an emotional climate in which the parents’ behavior is expressed” (p. 493). In contrast, they define parenting practices as “the specific, goal-directed behaviors through which parents perform their parental duties” (p. 488). This study focuses on parenting practices. However, given the sparse literature on immigrant families and parenting practices and the relatively large literature on immigrant families and parenting style, this
latter body of research also was reviewed to provide guidance on developing hypotheses for the research.

**Parenting Style**

Parenting style captures two key constructs of parenting identified by research and theory: parental responsiveness and parental demandingness (Maccoby & Martin, 1983). According to Baumrind (1991), the first construct, parenting responsiveness, comprises emotionally supportive and responsive interactions. It refers to “the extent to which parents intentionally foster individuality, self-regulation, and self-assertion by being attuned, supportive, and acquiescent to children’s special needs and demands” (p. 62). The second construct, parenting demandingness, involves the provision of effective discipline, monitoring, and control. It refers to “the claims parents make on children to become integrated into the family whole, by their maturity demands, supervision, disciplinary efforts and willingness to confront the child who disobeys” (p. 62).

According to Darling (1999), categorizing parents according to whether they are high or low on parental responsiveness and demandingness creates a typology of four parenting styles: permissive, authoritarian, authoritative, and uninvolved. Each of these parenting styles reflects different, naturally occurring patterns of parental values, attitudes, and practices (Maccoby & Martin, 1983) and has been shown to predict behavioral outcomes for children and adolescents (Baumrind, 1991).

Permissive parents are characterized as “more responsive than they are demanding” (Baumrind, 1991, p. 62), offering little guidance and failing to set limits for their children. Moreover, these parents allow their children to regulate their own behavior. Authoritarian parents are highly demanding and directive but not responsive.
These parents provide well-structured environments with very clear rules and expect their orders to be obeyed without discussion. Authoritarian parents might use coercive, harsh discipline and physical punishment to reinforce parental control and power. Authoritative parents are both demanding and responsive. They supervise and set clear guidelines for their children’s behavior. Uninvolved parents are low in responsiveness and demandingness. In extreme parenting cases, this parenting style encompasses neglectful and rejecting parents. Researchers of child and adolescent development have found that permissive, authoritarian, and uninvolved parenting can be associated with children who are aggressive and impulsive, lack social skills, and demonstrate adjustment problems (Baumrind, 1991; Dornbusch, Ritter, Leiderman, Roberts, & Fraleigh, 1987). In contrast, authoritative parenting has been associated with positive child outcomes, such as academic achievement, self-reliance, and competence (Baumrind, 1991; Deater-Deckard, Dodge, Bates, & Petit, 1996; Steinberg, Elmen, & Mounts, 1989; Weiss & Schwartz, 1996).

**Parenting Style and Child Outcomes**

Several studies that examined parenting styles in relation to child outcomes have consistently found that supportive parenting fosters children’s and adolescents’ social and emotional adjustment (Baumrind, 1966, 1971; Dornbusch et al., 1987; Weiss & Schwarz, 1996). In her comprehensive longitudinal study of children ages 3 to 15 from middle-class and working-class European American families, Baumrind (1967) found that children with authoritative parents are more mature, independent, prosocial, active, and achievement-oriented than children with nonauthoritative parents.
Slicker (1998) conducted a study of 1,311 public high school seniors ages 16 to 20 (89% of whom were non-Hispanic White and 7% of whom were African American) and found significant differences in behavioral adjustment among graduating high school seniors who characterized their parents as authoritative, authoritarian, indulgent, or neglectful. Older adolescents approaching high school graduation who rated their parents as authoritative experienced the most favorable adjustments. Authoritarian parenting provided maximum resiliency to older adolescents in the area of alcohol use but not in the area of deceit or theft. Moreover, older adolescents raised by authoritarian parents reported significantly more problem behaviors and less conventional behaviors than those adolescents who rated their parents as authoritative in the areas of school misbehavior, deceit or theft, aggression, delinquency, religiosity, and academic aspirations. Overall, authoritative parents were associated with the most beneficial adjustment, whereas indulgent (permissive) and neglectful parenting was associated with the worst adjustment.

Steinberg, Lamborn, Dornbusch, and Darling (1992) conducted a series of studies on parenting styles with 6,400 ethnically and socioeconomically heterogeneous samples of 14- to 15-year-olds. The studies explored the influence of authoritative parenting on adolescent achievement via self-report surveys filled out by the student body at nine high schools. The researchers found that authoritative parenting had a significant impact on adolescent school performance and engagement during the high school years. This finding was supported both in the significant correlations between authoritativeness and the indices of achievement, as well as in the comparisons of academic scores among adolescents from households varying in authoritativeness. However, although
Authoritative parenting was highly correlated with adolescent grade point average and engagement in school for White families, it was not for African American and Hispanic families. Specifically, authoritarian parenting was highly related to adolescent engagement for Hispanic adolescents, whereas the effect was relatively weak for other subgroups.

**Parenting Practices**

Solis-Camara and Fox (1996) note that, whereas parenting style sets the context of the parent–child relationship by communicating the parent’s attitude toward the child, parenting practices represent the specific parent behaviors used to guide children toward attaining socialization goals. In this section, studies investigating the relationship of parenting practices to child outcomes are reviewed. In a later section, findings regarding racial–ethnic differences in parenting practices are reviewed. The research on parenting practices as they relate to child and adolescent outcomes has focused on several key parenting constructs.

**Cognitive Stimulation**

One general construct of parenting practices examined by several researchers is parental cognitive stimulation. Cognitive stimulation consists of activities and factors within and outside the home that parents use to promote the child’s comprehension and learning. Parents provide cognitive stimulation by reading to the child and encouraging hobbies, extracurricular activities, and participation in cultural events. Parental cognitive stimulation has been found to be positively related to academic achievement (Bradley et al., 2001; Jackson et al., 2000) and negatively related to problem behaviors (Patcher,
Auinger, Palmer, & Weitzman, 2006). For example, Patcher et al. examined parenting practices among a sample of 884 White, 538 Black, and 404 Latino economically disadvantaged families of children ages 6 to 9 from the National Longitudinal Survey of Youth (NLSY). They found that parents of children who provide cognitive stimulating activities in the home and encourage participation in cultural events were more likely to have high-achieving children than parents who do not provide these activities.

*Emotional Support*

One other important parenting construct noted by the literature that seems to predict children’s competence and psychosocial adjustment is parental emotional support (Bronstein et al., 1996; Maccoby & Martin, 1983; Solis-Camara & Fox, 1996). Parental support consists of guiding behaviors to encourage maturity, such as assigning chores, and nurturing behaviors, such as hugging the child, praising the child to nurture self-esteem, and responding to the child’s needs (Bronstein et al., 1996).

*Discipline*

Parental discipline involves both positive and negative controlling (Bronstein et al., 1996), such as punishing the child to bring about compliance, setting curfews, supervising homework to facilitate academic achievement, and allowing the child to express emotions openly (e.g., crying, anger, and laughter). The research indicates that parents’ use of consistent discipline facilitates children’s development of empathy, encourages children’s regulation of their behavior, and promotes children’s social competence (Pinderhughes, Dodge, Bates, Pettit, & Zelli, 2000; Spera, 2005).
Another significant parenting practice construct cited in the literature that has a strong and positive relationship to child outcomes is parental school involvement. Involvement practices initiated by parents consist of ongoing efforts to directly participate in school decisions and activities (Spera, 2005). They include constant communication between parents and teachers, constructive collaboration between teachers and parents, and participation in parent–teacher meetings. Several researchers have found that parental involvement in school activities can positively influence children’s social competence as well as behavior in the school setting (Bogenschneider, 1997; Hill & Taylor, 2004; Pong, Hao, & Gardner, 2005; Rong & Brown, 2001; Steinberg et al., 1992; Zellman & Waterman, 1998). For example, in a study of 10,000 students in grades 9 to 12 (60% of whom were White, 14% of whom were Asian, 12% of whom were Hispanic, and 9% of whom were African American), Bogenschneider (1997) found a significant and positive relationship between children’s school performance and parental involvement in school activities, such as attending PTA meetings, volunteering in classrooms, and participating in parent–teacher meetings. Furthermore, in a review of the literature on parental involvement that included families from diverse ethnic and sociodemographic backgrounds, Spera (2005) found that parental involvement in school provides greater continuity between home and school and promotes the value of education, which can motivate children to work harder in school and behave properly in that environment. However, some studies report differences in parental involvement in schools based on ethnicity and/or race. For example, Stevenson, Chen, and Uttal (1990) noted that Latino mothers reported being less involved in their children’s schooling than
African American and non-Hispanic white parents, despite having positive attitudes toward their children’s schooling. Other studies also report a decline in parental involvement during adolescence (Bronstein, Ginsburg, & Herrera, 2005; Spera, 2006), which indicates the need for further research on parental involvement in school activities and its decrease during the adolescence development stage.

**Parenting Practices and Child Outcomes**

Researchers have identified several ways that parenting practices have shaped child and adolescent adaptation. In a study of 43 fifth-grade students of European American background in a suburban school district in northern New England, Bronstein et al. (1996) examined family factors related to middle school adjustment, using both preadolescents’ and parents’ reports as well as observational measures. They found that supportive, aware parenting practices, characterized by affection, approval, attentiveness, responsiveness, guidance, and receptivity to emotions, were associated in fifth-grade girls and boys with a more positive self-concept, higher academic achievement, greater popularity with peers, and lower incidence of psychological and behavioral problems.

McCoy, Frick, Loney, and Ellis (1999) examined the role of parenting practices in the development of conduct problems with a clinic-referred sample of 30 African American and 111 White children and adolescents between the ages of 6 and 17 and their primary custodial parents. Parenting practices were measured by the *Alabama Parenting Questionnaire*, which assesses a parent’s use of positive reinforcement techniques, involvement in the child’s activities, monitoring and supervision of the child, discipline, and use of corporal punishment or noncorporal methods of punishment. Conduct problems were measured using the *National Institute of Mental Health Diagnostic
Interview Schedule for Children and the Aggressive Behavior and Delinquency subscales of the parent-completed Child Behavior Checklist. Findings showed that conduct problems were mediated by the influence of ineffective parenting practices, such as poor monitoring and supervision of the child, parental inconsistency in discipline, and corporal punishment.

Bradley et al. (2001), using the National Longitudinal Survey of Youth and the Home Observation for Measurement of the Environment Short Form (HOME-SF), noted the relationship between parenting practices and child academic achievement. The survey sample included African American, European American, and Hispanic American families of children ages 8 to 14. The pattern of findings of positive and significant effects of cognitive/learning stimulation and parental responsiveness on cognitive outcomes held for all age groups and for all three racial-ethnic groups.

In addition, in a longitudinal study with 93 White children ages 9 to 12 in grades 5 to 7 and their parents, Bronstein et al. (2005) studied the pathways between parenting practices and children’s academic achievement during the transition to middle school and found that three types of parenting practices (external control, guidance, and autonomy support) were linked to children’s achievement over time.

In summary, the early literature on parenting styles and parenting practices indicates that the emotional climate in which parents socialize their children (Slicker, 1998), as well as their level of supportive and guiding behavior, influences child and adolescent outcomes (Bronstein et al., 1996; Spera, 2005). Parents who are responsive to their children’s needs, discipline their children through inductive reasoning, encourage independence, and foster their children’s emotional adjustment through encouragement of
emotional expressiveness are more likely to have children who are independent, self-assured, competent, cooperative, and friendly (Bronstein et al., 2005). On the other hand, parents who are directive, controlling, and restrictive and who use an authoritarian style are more likely to have children who exhibit antisocial and aggressive behaviors (McCoy et al., 1999). However, recent scholars (Bradley et al., 2001; Hill, 2001; Jambunathan et al., 2000; Roopnarine et al., 2006) have asserted that these results are based on a dichotomous typology of “positive” and “negative” parenting, whereby the standard for “positive parenting” is defined by the norms and values of middle-class European American families. Moreover, they note the need to consider the cultural and historical roots of specific groups when assessing parenting outcomes. Specifically, they assert that parents in most ethnic minority groups employ a set of parenting practices that promote positive child and adolescent outcomes, which vary to meet the demands of the environment and their cultural socialization goals (Garcia Coll et al., 1996; Harrison et al., 1990). Controlling behaviors, demandingness and harsh discipline might be normative for particular ethnic groups and therefore have different meanings and child outcomes (Cabrera, Shannon, West, & Brooks-Gunn, 2006). Overall, typologies of optimum parenting should reflect how parenting interacts with several factors such as characteristics of the child (age, gender, and temperament) and characteristics of the context (family ethnicity, family structure, proximity to social network, acculturation, and economic resources).

*Latin American and Caribbean Immigrants*

The data from the U.S. Census Bureau (2004) indicate that Latin America and Caribbean immigrants are a multiracial, multilingual, and multicultural group from
approximately 25 independent republics and approximately 16 Caribbean territories geographically south of the continental United States. These areas include persons of Spanish, French, and Portuguese ancestry, as well as Indo-Chinese, African, and indigenous heritage, including Aymara, Carib, Garifuna, Guarani, Zapotec, Mixtec, and other Amerindian groups (Chabran & Chabran, 1996; Latin American Network Information Center, 2005). The median age of these Latin American and Caribbean immigrants is 26 years, and approximately 36% of them are younger than 18 years of age (Torres, 2004).

Most immigrants from Latin America and the Caribbean region tend to identify themselves by their country of origin, for example, Jamaican, Haitian, Mexican, Salvadoran, and Colombian. This preference is tied to their heritage and identity (Leyendecker & Lamb, 1999). However, once in the United States, immigrants from Latin America and the Caribbean must select a pan-ethnic identity. In the United States, three terms that are commonly used to describe immigrants from Latin America and the Caribbean are Hispanic, Latino, and Caribbean. The term Latino was constructed by the U.S. Census Bureau (2003) to describe both U.S.-born citizens of Hispanic origin and immigrants from Latin America and the Caribbean (Chabran & Chabran, 1996). Although some immigrants prefer Hispanic, others believe that the term does not accurately reflect the gender or identity of those from the region. Therefore, the term Latino/Latina is preferred. For example, people who come from Haiti (Afro- and Euro-French culture) identify as Caribbean and Latino but not as Hispanic; also, people from Brazil (Afro- and Euro-Portuguese culture) identify as Latino but not as Hispanic. In this
study, the terms *Latino* and *Caribbean* are used because they offer the most inclusive classifications.

According to Suarez-Orozco, Todorova, and Louie (2002), migration from Latin America and the Caribbean occurs in four key patterns: (1) seasonal migration, whereby parents migrate to work in a host country for several months; (2) serial migration, in which one parent, usually the father, migrates first and sends for the rest of the family at a later date; (3) parental migration, whereby parents migrate for an indefinite amount of time and leave the child or children in the care of kin or family members; and (4) family migration, in which parents and children migrate together. These migration patterns allow Latino and Caribbean families to maintain their language, practices, and values as key components of their identities (Smith, Lalonde, & Johnson, 2004; Torres, 2004).

Overall, approximately 39 million immigrants from Latin America and approximately 4 million immigrants from the Caribbean reside in the United States and make up almost 13% of the total population (Suarez-Orozco & Sommer, 2000; U.S. Department of Justice, 2000). In the current study, respondents of Latin American and Caribbean origin are considered as a group due to the nature of the NIS dataset.

*Latino and Caribbean Cultural Values*

A review of the literature indicates that several norms are characteristic of both Latino and Caribbean groups, such as extended-family living arrangements, informal child care networks (or child fostering), and religious involvement. The literature shows that values such as loyalty to family, adherence to parental authority, respect, responsibility for others, interdependence, and education are common to most of the cultural and ethnic subgroups from Latin America and the Caribbean (Antshel, 2002;
Jambunathan et al., 2000; Jones, Sharpe, & Sogren, 2004; Leyendecker & Lamb, 1999; Suarez-Orozco & Sommer, 2000; Yearwood, 2001). In the United States, these collective values and cultural commonalities stand out because of the way in which they contrast with the individualistic values of European Americans. As in the earlier review of the general literature on parenting, the review here includes studies of both parenting style and parenting practices.

**Latino and Caribbean Immigrant Parenting Styles**

Although Latino and Caribbean families share many values, the findings from early research on parenting styles among Latino populations are mixed. Some investigators indicate that Latino parents are permissive (e.g., Vega, 1990), whereas several researchers indicate that they are authoritarian (e.g., Julian et al., 1994). Vega (1990) indicates in a review of the literature on Hispanic/Latino families that the parent–child relationship is warm and nurturing, not authoritarian and strict. In one ethnographic study of parenting in 19 immigrant and first-generation Mexican American families, Delgado-Gaitan (1993) found that immigrant parents socialize their preschool-age children toward values of respecting others, being active, sharing with others, and being part of a larger family unit. In her investigation of Latino families and child discipline practices, Fontes (2002) found a stronger cultural emphasis on parental monitoring and control than on responsiveness and reasoning. Ceballo (2004) notes in her qualitative study of parenting strategies of 10 first-generation poor immigrant Latino families that parents emphasize the need for children to conform and achieve a high level of maturity.

In an attempt to unravel earlier findings on parenting style and diverse ethnic–cultural groups, Varela et al. (2004) examined the relationship between parenting style
and culture in a socioeconomically mixed sample of 300 Mexican-descent mothers, fathers, and children ages 10 to 14. When they examined the parenting styles of Mexican, Mexican immigrant, Mexican American (those born in the United States), and non-Hispanic White parents, they found that Mexican immigrant and Mexican American parents used more authoritarian parenting than Mexican parents and that non-Hispanic White parents were less authoritarian than Mexican American parents. However, no differences were noted in authoritarian style between Mexican and non-Hispanic White parents.

Another study by Pong et al. (2005) investigated the role of parenting style and social capital, such as parental involvement, intergenerational closure, and trust, in predicting school performance among ethnic groups and immigrant generations. The researchers compared three generations of 17,996 socioeconomically diverse Asian, Hispanic, and White adolescents in grades 7 to 12 and found that first-generation Hispanic parents were less likely to be permissive with their second-generation students than native White parents. They also found that immigrant Hispanic parents had higher expectations for their children than native White parents.

Research on Caribbean parenting style conducted by Roopnarine et al. (2006) indicates that traditional Caribbean parents tend to share common authoritarian parenting styles with Latin American groups. The study sample consisted of a diverse ethnic mix of 70 African, Indo-Chinese, and Portuguese parents with children ages 3 to 6 from Antigua, Barbados, Jamaica, Grenada, Guyana, St.Vincent, and Trinidad and Tobago residing in the New York City area. Researchers interviewed mothers, fathers, and children separately, with parents completing the Parental Authority Questionnaire and children
completing the *Kaufman Survey of Early Academic and Language Skills*. Specifically, the investigators found that, across ethnic and social classes, parental behavioral expectations of obedience, displays of respect and manners, educational competence, and sociability in young children are rooted in cultural and religious values commonly accepted by Caribbean communities. However, some parental gender differences were noted. Specifically, mothers tended to be authoritative, whereas fathers who were the disciplinarians tended to be authoritarian. For example, mothers lectured a child who disobeyed, but fathers spanked or punished the child. On the other hand, in examining the association among parenting styles, parent–child academic interaction at home, and parent–school contact, as well as the children’s academic achievement and social behaviors, Roopnarine et al. noted that fathers demonstrated an authoritative parenting style, whereas mothers used an authoritarian parenting style. More importantly, the researchers emphasized that education, acculturation level, and social class might be contextual factors that influence parenting behavior among this Caribbean population.

Overall, parenting styles in Latino and Caribbean families reflect the traditional hierarchical and vertical structure of family dictated by the cultures, in terms of age, sex, and position of authority, whereby the line of authority is from elders to children and from men to women. For example, parents’ attitudes toward children are not egalitarian; regardless of their age, children are expected to obey, respect, and assist their parents and elders. In addition, parents control the family capital; therefore, parental power and authority are strictly enforced (Gopaul-McNicol 1998; Yearwood, 2001).
Latino and Caribbean Immigrant Parenting Practices

A number of researchers (Buriel, Mercado, Rodriguez, & Chavez, 1991; Buriel, 1993; Corona, Lefkowitz, Sigman, & Romo, 2005; Fontes, 2002; Frias-Armenta & McCloskey, 1998; Solis-Camara & Fox, 1996) indicate that controlling parenting practices, including strict discipline, directive verbal cues, and physical punishment, are common disciplinary strategies used by Latin American and Caribbean parents to train productive adults who conform to the values and social norms of the culture. In an ethnographic study of parenting practices among Caribbean families, Yearwood (2001) interviewed 16 Jamaican immigrant parents with children younger than 18 years of age in a New York suburban city. She found that traditional Jamaican immigrant parents believe in unilateral, respectful, and mannerly behavior and tend toward strict discipline strategies that are meant to keep children in line with parental authority and demands.

In a review of the child socialization literature, Zayas and Solari (1994) report that Mexican American, Puerto Rican, and other Hispanic parents prefer behaviors in children that encourage family closeness and respect for parental authority. Therefore, based on the age of the child and context, parents tend to use strategies such as modeling, verbal directives, monitoring, and strict discipline, which are consistent with their personal and cultural socialization goals.

In a recent study on parenting practices in Latino families, Domenech Rodriguez, Davis, Rodriguez, and Bates (2006) interviewed 50 Spanish-speaking families from Mexico and other Latin American countries that have a child between the ages of 4 and 9. Using both survey and observational measures, the researchers found that parents used positive parenting practices, such as positive involvement, problem solving, skills
building, parental monitoring, and effective discipline, which significantly predicted positive child outcomes.

In addition, Figueroa-Moseley et al. (2006) examined intracultural variations in parenting behavior among three major Head Start Spanish-speaking Latino subgroups in the United States: Puerto Ricans, Salvadorans, and Mexican Americans. The researchers used a subset of 995 parents and children from the National Head Start/Public Schools Early Childhood Transition Project. The findings revealed that Puerto Rican caregivers reported more nurturing behaviors with their children than Mexican Americans or Salvadorans. However, although Mexican American and Salvadoran parents scored statistically lower, they appeared to have very nurturing parent–child relationships. The investigators also found that the mothers were very permissive with their young children, with the overall attitude of placating them. Overall, these findings confirm the intracultural variations in parenting among Spanish-speaking Latino subgroups in the areas of nurturance and consistency as well as in their attitudes toward children.

In summary, although some of the literature indicates that Latin American and Caribbean parents are authoritarian, rigid, and strict compared with non-Latino White parents and African American parents (Delgado-Gaitan, 1993; Varela et al., 2004; Zayas & Solari, 1994), other studies note different parenting strategies with differential outcomes for children and adolescents (Domenech Rodriguez et al., 2006; Figueroa-Moseley et al., 2006; Pong et al., 2005; Vega, 1990; Yearwood, 2001). In addition, the research indicates that although Latin American and Caribbean parents tend to use parenting practices such as strict discipline (corporal punishment), which are associated with negative outcomes in White children and adolescents, these practices do not
necessarily directly translate into negative outcomes for Latin American and Caribbean adolescents. Based on family ecologies of Latin American and Caribbean adolescents, strict discipline might serve as a protective measure for Latin American and Caribbean adolescents (Pong et al., 2005). Family ecologies include family background, ethnic identity acculturation, language use with family, and parents’ cultural knowledge (Roosa et al., 2002), as well as socioeconomic status of the community. According to Roosa et al., Latino and Caribbean parents share an ecological niche and historical experiences that provide the foundation for parenting beliefs and practices. In addition, immigrant parents also share environmental challenges and opportunities that might influence their parenting decisions and goals. Hence, Latino and Caribbean immigrant parents residing in new environments that are unfamiliar might adopt strategies to protect their children from harm and negative influences. Overall, it is unclear to what extent these decisions and behaviors are a result of parental cultural child-rearing belief systems or parents’ reactions to ecological stressors.

Despite the extensive literature on parenting styles and parenting practices in general, further research is needed on the cultural context within which these parenting behaviors occur. Bogenschneider et al. (1997) note that in addition to exploring parental attitudes and the way in which parents behave with their children, what is needed is “a systematic attempt to disentangle what contributes to competent parenting—those specific components and processes that explain individual differences in parental functioning” (p. 345). Many families who have migrated to the United States from Latin America and the Caribbean endure a set of experiences not typically encountered by other parents. For example, Leslie (1993) notes that the experience of Central American
immigrants from El Salvador, Nicaragua, and Guatemala, countries with political instability, civil unrest, and repression, is often different from the experience of other immigrants. In a sample of 91 Central American adults with a mean age of 30, she found that political violence had interfered with the normal operation of daily life, which contributed to the poor economic situations and education in their countries. Moreover, she asserts that the “pre- and post-migration picture for Central American immigrant families is not encouraging. The families are highly stressed, may have limited resources for coping with the demanding life circumstances they face, and have not received systematic support from the host country” (p. 203).

In addition, the Committee on the Health and Adjustment of Immigrant Children and Families, in its report on the well-being of children in immigrant families (Hernandez & Charney, 1998), noted a concern for the children with origins in the 12 countries that account for approximately half of all children in immigrant families. According to the report, children from these 12 countries are more likely to experience socioeconomic risk factors, such as family incomes below the poverty threshold and parents with very little formal education. These risk factors are highly correlated with negative health, developmental, and educational outcomes. Of the 12 countries identified by the report, more than half are Caribbean, Central American, and South American. The report also cites economic, political, and social problems of the Latin American and Caribbean region as the impetus for the large northern migration to the United States. Specifically, parents from four of the countries (El Salvador, Guatemala, Nicaragua, and Haiti) tend to flee north because of war, community violence, or political conflict, whereas parents from three of the countries (Mexico, Honduras, and the Dominican Republic) tend to
migrate north in search of unskilled work because of chronic structural underemployment.

*Latino and Caribbean Immigrant Adolescents*

The literature on Latino and Caribbean families documents particular factors that place immigrant adolescents at risk for adjustment and behavioral problems (Jones et al., 2004; Pottinger & Brown, 2005; Smith et al., 2004; Suarez-Orozco et al., 2002). Pottinger and Brown (2005) note that a vast number of Latino and Caribbean children endure lengthy separations from their parents during the migration process and face issues of grief, loss, and attachment. They further speculate that, for some of these individuals, the child–parent reunion is filled with challenges because most often the reunion occurs in adolescence, when children are battling with developmental issues of identity and trying to discern where they belong. Similarly, using Erickson’s theoretical model, Comas-Diaz and Grenier (1998) speculate that migration before adolescence is less stressful for immigrant youth. However, during adolescence, the process of adaptation becomes more complex owing to the stage of development in which changes and adjustment to conflicting cultural contexts are much more momentous (Jones et al., 2004).

Moreover, a large number of Latino and Caribbean immigrant adolescents tend to struggle with differences in language, accent, social systems, and race classification, as well as educational achievement, during this transition and transformation period. Specifically, Hernandez and Charney (1998) found that immigrant adolescents from Mexico, Central America, the Dominican Republic, and Haiti tend to be behind in their grade level or are more likely not to graduate from high school. The researchers also
indicate that Latin American and Caribbean adolescents’ well-being declines the longer families live in the United States. Martinez (2006) points out that Latino and Caribbean immigrant parents who become frustrated by the “stress and storm” of adolescence, as well as the acculturation process, might begin to reduce their levels of support, communication, and monitoring of their teens to avoid conflict with their more Americanized values.

However, several surveys—the National Survey of American Families (NSAF), New Immigrant Survey (NIS), National Longitudinal Study of Adolescent Health (Add Health), and National Longitudinal Survey of Youth (NLSY)—note that youth from immigrant families appear to be doing just as well as, or even better than, their native-born peers in the areas of physical health, mental health, and avoidance of high-risk behavior (Portes & Rumbaut, 2001). Specifically, a number of researchers have identified particular parenting variables that are related to successful outcomes in adolescents. For example, Vega, Gil, Warheit, Zimmerman, and Apospori (1993) found that family and parenting factors, such as respect, pride, cohesion, and support, are associated with a lower propensity to deviance for Cuban adolescents. Given the growth in the number of Latin American and Caribbean adolescent immigrants and the documented links between parenting and adolescent development, it is important to have a better understanding of parental and family characteristics as well as parenting practices that might contribute to development during this transitional stage (adolescence) in a wider range of diverse immigrant families.

Overall, additional studies on cross-cultural determinants of parenting are needed to provide new insights into factors that influence optimal parenting in our growing
multicultural, multiracial, and multilingual population. Although existing literature on nonimmigrant Latinos and other ethnic minority groups does provide some insight into family ecologies of ethnic minority children (Chapman & Perreira, 2005; Delgado-Gaitan, 1993; Harrison et al., 1990), it is important to assess Latin American and Caribbean families directly in order to understand more fully how specific migration and acculturation factors influence parenting practices for this distinctive cultural group.

Ecological Factors and Parenting in Immigrant Families

Toward the end of the last century, researchers’ interest in understanding factors that influence parenting behavior intensified (Abidin, 1992). A number of researchers using cultural–ecological models have shown that parenting is multiply determined by factors in three domains: (1) personal psychological functioning of the parents, (2) the broader social context, and (3) characteristics of the child (Foss, 1996; Jackson, Gyamfi, Brooks-Gunn, & Blake, 1998; McLoyd, 1990; Patcher et al., 2006; Reis et al., 1986; Slaughter-Defoe, Nakagawa, Takanishi, & Johnson, 1990; Spera, 2005). Some researchers have further demonstrated that factors in the parent, as well as contextual factors, such as the process of immigration, are most central to parenting competence (Delgado-Gaitan, 1993; Eamon, 2005; Foss, 1996; Garcia-Coll et al., 1996; Zayas & Solari, 1994). However, additional research is needed on ecological factors at the individual, family, and community levels that determine parenting practices, such as cognitive stimulation, emotional support, and discipline among new immigrants. The following discussion summarizes the target variables in this study that, based on the literature, might be key determinants of parenting for this unique group of immigrant parents.
Individual Level: Parental Acculturation

In the microsystem, one factor that might be an important determinant of parenting practices and family functioning is acculturation. As previously mentioned, acculturation has been described as a process by which migrating individuals adapt to or adopt the behaviors, attitudes, and values of the dominant culture (Berry, Kim, Power, Young, & Bujaki, 1989; Dumka et al., 1999; Elder, Broyles, Brennan, Zuniga de Nuncio, & Nader, 2005). The cultural-ecological model indicates that the acculturation process is dictated by numerical, economic, and political powers of the members of a group. Immigrants are often minorities in a host country; the process of adopting the cultural practices of the larger group is of significance to their adaptation (Chapman & Perreira, 2005; Garcia Coll et al., 1996). Specifically, the cultural-ecological model points out that the values and beliefs expressed within the home arise not only from cultural factors, but also through socioeconomic effects on the family, as well as the cultural adaptation of the family to the current contextual demands (Schmitz, 2005). Therefore, it is important to understand the relationship between various levels of acculturation and whether the acculturation process represents protective factors, such as access to opportunities, resources, and ties to the dominant culture, or risk factors, such as stress, marital conflict or parent–child conflict, and language conflict. Acculturation has been shown to have distinct and sometimes opposite effects on behavioral variables such as parenting practices (Gonzales, Knight, Morgan-Lopez, Saenz, & Sirolli, 2002). For example, some researchers have found that greater acculturation predicted effective parenting practices and better adolescent outcomes (Dumka et al., 1997; Lopez, Sanchez, & Hamilton, 2000; Pena, 2000), while other researchers have noted that greater parental acculturation
predicted lower parental support, communication, and monitoring of teens (Martinez, 2006).

**Acculturation Models**

Models of acculturation have been categorized as linear, two-dimensional, and multidimensional (Elder et al., 2005). Early linear and unidirectional models of acculturation focused on assimilation and Anglo-American cultural characteristics, with high acculturation resulting in assimilation and favorable outcomes (Elder et al., 2005; Landale, 1997). Linear and unidirectional models imply that immigrants move along a continuum from low acculturation to full assimilation. This perspective assumes that immigrants will become increasingly similar to the native population as they spend more time in the country and that they will eventually lose their cultural and socioeconomic uniqueness, such as native language and cultural practices, thus becoming part of the dominant European American culture (Chapman & Perreira, 2005; Landale, 1997). Other two-dimensional and multidimensional models of acculturation focused on segmented assimilation and sociocultural context, with variation in the direction of change, diverse outcomes, and individual choices in determining these outcomes (Abraido-Lanza, Armbrister, Florez, & Aguirre, 2006; Arcia, Skinner, Bailey, & Correa, 2001; Lara, Gamboa, Kahramanian, Morales, & Bautista, 2005). This perspective acknowledges that structural constraints faced by ethnic minority groups, the interactions at economic, political, cultural, and social levels between different ethnic groups, and the availability of ethnic enclaves and social network support result in immigrant groups adapting in different ways to varied cultural groups. Moreover, the models recognize that many new immigrants are grounded in two or more cultures, with successful adaptation defined as
the ability to participate effectively in each culture (Abraido-Lanza et al., 2006; Arcia et al., 2001; Buriel & DeMent, 1997). For example, bicultural individuals might use their native language or dialect to interact with family and friends and use English to communicate with English-only speakers (Miranda et al., 2000). Therefore, parental acculturation levels, based on parents’ years of residence in the United States, language preference and proficiency, ethnic identity, social ties with family and kin of the same ethnic group, and affiliation with the larger community will have an impact on parenting practices of Latino and Caribbean parents (Abraido-Lanza et al., 2006).

According to the various models of acculturation, assessments of acculturation include several levels and methods. Although acculturation can be assessed at the group level (cultural, social, and institutional), the main focus of most studies has been at the individual level of acculturation, assessing behaviors and attitudes (Arcia et al., 2001; Dinh, Roosa, Tein, & Lopez, 2002; Dumka et al., 1997, 1999; Miranda et al., 2000). In most acculturation scales, an individual’s position in the acculturation process is converted into a score and used as a marker of the level of acculturation. Studies measuring individual acculturation have used various proxies to gauge where individuals fall along the acculturation continuum. The most commonly used proxy is language use and proficiency (e.g., Arcia et al., 2001; Dumka et al., 1999; Gil, Wagner, & Vega, 2000; Vega et al., 1993; Wallen, Feldman, & Anliker, 2002), followed by ethnic identity (e.g., Baptiste, 1993; Murphy & Mahalingam, 2006; Zephir, 1996, 2001). Other proximal measures include length of residence in the host country, generational status, and immigration status (e.g., Delgado-Gaitan, 1993; Domenech Rodriguez et al., 2006; Hacker, 2001).
Acculturative Stress

The decision to immigrate to another country has critical social and psychological implications for both the individual and his or her family group (Suarez-Orozco et al., 2002). Prior research has noted a few differences in the parenting practices of ethnic minority and immigrant groups compared with the dominant culture (Baptiste, 1993; Berry et al., 1989; Bhatia & Ram, 2001; Chao, 2001; DeSantis & Thomas, 1994; Dumka et al., 1999; Gonzales, Deardorff, Formoso, Barr, & Barrera, 2006; Hovey & King, 1996; Khandelwal, 2002; Koa, 2004; Zephir, 1996). These differences include use of harsh discipline by African American parents (Deater-Deckard et al., 1996; Pinderhughes et al., 2000), physical punishment and monitoring by Haitian families to control child behavior (Zephir, 1996), and verbal cues and modeling for teaching by Cuban mothers (DeSantis & Thomas, 1994). In addition, the literature indicates that many minority and immigrant Caribbean and Mexican parents emphasize self-control and doing well in school (Khandelwal, 2002) as well as social skills and family support (Dumka et al., 1999; Gonzales et al., 2006) to maintain family stability. Some of these differences have been attributed to the parents’ level of acculturation (Baptiste, 1993; Bhatia & Ram, 2001; Dumka et al., 1999; Gonzales et al., 2006). Specifically, the few studies on Latin American and Caribbean immigrant families indicate that the process of adapting to another culture, which is sometimes stressful and filled with conflict, entails modification in individual and family functioning at the physical, social, psychological, and cultural levels (Berry et al., 1989; Hovey & King, 1996; Thomas, 1995; Zephir, 1996). For example, many immigrant families must adjust to new living arrangements and
environments, flexible family roles, ethnic identities (from Cuban, Nicaraguan to Latino), and values (from collective worldview to individualism).

According to acculturative stress theory (Berry & Anis, 1974; Williams & Berry, 1991), several situations specific to the migration and acculturation process are stressful. The loss of the homeland due to war or political unrest, the level of acceptance of the host country, linguistic difficulties, the condition of the receiving ethnic communities, financial insecurity, a sense of isolation, and conflict between cultural patterns—all of these situations lead to stress.

Hovey (2000a) explored the levels of acculturative stress among adult Central American immigrants and found that they were correlated positively and significantly with high levels of depression, which has been found to negatively affect parenting practices. Several recent studies exploring the relationship between maternal depression and parenting behavior in nonimmigrant ethnic minority families have resulted in similar findings (Contreras, Lopez, Rivera-Mosquera, Raymond-Smith, & Rothstein, 1999; Eamon, 2005; Guo & Harris, 2000; Kavanaugh et al., 2006; Lovejoy, Graczyk, O’Hare, & Neuman, 2000). This research shows, for example, that parental depression can lead to reduced parental warmth and responsiveness (Kavanaugh et al., 2006), which in turn can affect the ability of children and adolescents to develop a sense of control or mastery of their environment (Eamon, 2005; Gelfand & Teti, 1990; Petterson & Albers, 2001). Thus, stressors associated with the acculturation process, including changes in social networks and discrimination, and the depression that can result from acculturation stress might negatively influence parenting practices (Eamon, 2005; Planos, Zayas, & Busch-Roßnagel, 1997; Thomas, 1995).
Acculturation and Immigrant Parenting Behavior

Researchers have examined the influence of acculturation on several parenting behaviors. Miranda et al. (2000) used the *American-International Relations Scale* (AIRS) to measure family acculturation in 181 families from Mexico, Central America, and South America, with respondents ranging in age from 13 to 58. The researchers found that lower acculturated families were more cohesive, but higher acculturated Latina mothers used less rejection and inconsistent discipline than lower acculturated mothers. In addition, higher acculturation families were found to be more conflictual than lower acculturated and bicultural families. Bicultural families were those who were proficient in both Spanish and English and held values and respected the norms of both cultures. Gil et al. (2000) point out that, although acculturation has several phases that initiate immigrants into the values and norms of their new environment, these new values and norms can lead to family and marital conflicts.

Similarly, Gonzales et al. (2006) point out that parenting behavior might shift as parents become more oriented to mainstream American cultural values. The researchers examined a mediational model linking acculturation with other family mediators and mental health outcomes for 183 Mexican American adolescents ages 11 to 15 and their mothers. Measures included the *Children’s Report of Parents’ Behavior Inventory*, the *Child Behavior Checklist Parent Report Subscale*, the *Multicultural Events Scale for Adolescents*, and the *Children’s Depression Inventory*. The researchers found that, although acculturated families indicated high levels of family conflict, acculturation showed no relationship to inconsistent discipline.
A few studies have also examined proxies of acculturation, such as years in the United States and specific types of parenting behavior, such as cognitive stimulation, emotional support, and school involvement among Latino and Caribbean families (Buriel, 1993; Moreno & Lopez, 1999; Schmitz, 2005). For example, using data from the National Longitudinal Survey of Youth (NLSY), Schmitz (2005) investigated the effect of acculturation on cognitive stimulation and emotional support in the home environment. The sample consisted of 47 Cuban, 240 Mexican, 162 Puerto Rican, and 415 Mexican American mothers of children aged 0 to 14 years. The results revealed that Mexican American and Cuban mothers, who had greater length of residence in the United States, showed significantly more cognitive stimulation than did Mexican mothers. However, cognitive stimulation declined as the child aged, for parents with longer residency in the United States, but increased as the child aged for mothers who used Spanish as language preference. In an earlier study, Buriel (1993) examined the relationship between years in the United States and generation status as proxies of acculturation, socioeconomic status, and childrearing practices of Mexican American families. The sample consisted of 317 parents of 186 adolescents in seventh grade, 96 were boys and 90 were girls. The findings revealed that third generation Mexican American mothers were more supportive, than first generation immigrant Mexican mothers, and second generation Mexican American mothers. Specifically, U.S. born Mexican American parents scored higher on emotional support and expectation of proper behavior at home and school, while immigrant Mexican parents scored higher on responsibility, which was characterized by adherence to family rules within an open parent-child relationship. In another study, using mothers’ number of years living in the United States as proxies of acculturation, Moreno and
Lopez (1999) investigated the relationship between levels of acculturation and Latina mothers’ involvement in their first graders school. The sample included 158 mothers from Mexico, Central and South America, with 13 years average length of residence in the U.S. The results indicated that less acculturated and less educated mothers reported more barriers regarding their involvement as compared to more acculturated mothers and more educated mothers. However, there was no difference with respect to the frequency/quantity of parental involvement based on level of acculturation. In a related line of research, Garcia Coll et al (2002) noted that groups that are not considered part of the mainstream culture in the United States differ not only in cultural characteristics, but also in their position on the stratification system of U.S. society. Factors related to processes of acculturation, such as years in the United States, may act in concert to influence parental school involvement. The researchers explored immigrant group and individual differences within groups in parental reports of school involvement of 334 Portuguese, Dominican, and Cambodian parents. The findings indicated that all three groups had high aspirations for their children, such as obtaining a college education and a professional occupation. However, year of immigration to the United States and English language comfort were linked to different trajectories of parental school involvement and access to the structural benefits of participation in mainstream culture and society.

Several other studies have also investigated the relationship between acculturation and other parenting behaviors, such as discipline, and school involvement. For example, some studies, using English usage or proficiency as a proxy of acculturation, suggest that acculturation is positively linked to both family conflict and parental control (Dinh et al., 2002; Fontes, 2002; Hill et al., 2003). For example, Dinh et al. (2002), using English
proficiency as a measure of acculturation level, found in a sample of 330 Mexican children and adolescents in grades 4 through 8 that intergenerational conflict between parents and children, in which children acculturated at a faster rate than their parents, was significantly related to strict parenting practices and adolescent problem behavior. Moreover, the researchers concluded that the language conflict aspect of acculturation presented considerable stresses for Mexican families and that Mexican youth had to confront challenges beyond those typically connected with the adolescent period.

In another study, Hill et al. (2003) examined the differences and similarities in the relationship between parenting practices and family construct and children’s conduct problems and depressive symptoms. The researchers used children’s and mothers’ language preference as a proxy for acculturation level, with a sample of 344 low-income parents with children ages 8 to 13, of which 177 were Mexican American mothers and 167 were European American mothers. Findings revealed that low-acculturated Mexican American (Spanish-speaking) mothers used both hostile control and acceptance, whereas high-acculturated Mexican American (English-speaking) mothers used less hostile control and more acceptance. However, the researchers also noted that hostile control might have played a greater role in reducing conduct problems. Moreover, they concluded that for Spanish-speaking Mexican American families, a combination of high levels of parental warmth and firm or harsh discipline might be adaptive for families living in environments that are highly unusual for them.

Dumka et al. (1999), using language proficiency to measure acculturation among 85 immigrant Mexican parents and 40 Mexican American parents of 7th and 8th graders, noted that more acculturated immigrant Mexican parents and Mexican American parents
used more consistent and harsh discipline, which predicted less depression and fewer behavioral problems in their seventh- and eighth-grade children. On the other hand, less acculturated and stressed mothers engaged in inconsistent discipline. However, the researchers found no difference between more and less acculturated families on supportive parenting and parent–child attachment.

Other studies have examined the role of English proficiency and parental school involvement. For example, in a qualitative study of 48 Mexican parents at an elementary school in Texas, Pena (2000) found that while parental involvement was influenced by several ecological factors, such as employment and level of education, language differences and limited English fluency were a primary determinant of parents’ participation in their child’s school. Language proficiency determined not only the level of parental involvement, but also the types of activities in which parents chose to participate. Specifically, parents with stronger English fluency were better able to communicate with teachers and advocate for their child. In addition, in a sample of 393 Mexican-American parents of early adolescents, Lopez, Sanchez, and Hamilton (2000) found that parents who mainly spoke Spanish were less likely to participate in school activities than both primarily English speakers and bilingual speakers. Although all three groups indicated education as a value and a goal for their children, parents’ lack of English proficiency prevented their interaction with the school.

In summary, a number of researchers examined the relationship between level of acculturation and immigrant parenting practices. However, key limitations of the research involve its focus predominantly on Latino families of Mexican origin and on single measures of acculturation (e.g., Gonzales et al., 2006; Hill et al., 2003). The mixed results
from all of these studies indicate a clear need for further research on acculturation using broader measures and more diverse samples. The findings also indicate the need to examine the relationship between acculturation and parenting practices among recent immigrants. Based on the current literature, this study will focus on English proficiency and years in the United States as measures of acculturation. Although these measures serve as rough proxies for a complex and multidimensional phenomenon, results from previous research provide a high degree of confidence that these items are robust and reliable proximal measures of acculturation (Arcia et al., 2001; Dinh et al., 2002).

**Family Level: Extended-family coresidence**

A second key variable that might affect the parenting practices of Latin American and Caribbean parents is extended-family coresidence. Extended-family coresidence is defined in the literature as a household in which nonparental adults, such as grandparents, adult siblings, cousins, aunts, uncles, other relatives and friends share living arrangements with a nuclear family (Angel & Tienda, 1982; Glick, Bean, & Van Hook, 1997; Hamilton, 2005; Hofferth, 1984; Kamo, 2000).

Cultural-ecological models have identified specific factors in parents’ lives, such as extended family living arrangements, that facilitate positive parenting practices (e.g., warmth and monitoring) in the face of stress or mental health problems (Contreras, Narang et al., 2002; Mowbray et al., 2005; Roosa et al., 2002). Extended-family coresidence as a family-level resource has been cited widely in the literature as an important determinant of parenting practices (Contreras, Narang et al., 2002; Julian et al., 1994; Roosa et al., 2002; Shorris, 1992). Specifically, extended-family coresidence is noted as an adaptive strategy used to adjust to challenging economic and discriminatory
environments (Dornbusch et al., 1985; Taylor, Casten, & Flickinger, 1993; Wiley, Warren, & Montanelli, 2002). According to Roosa et al. (2002), socialization practices for those living in extended family households will likely be adapted to the ecological niche that made the extended family structure necessary and, therefore, might be different from those found in other families.

Kamo (2000) has pointed out that, in the migration process, the role played by extended family households with relatives and friends is well-established. Temporary extended family living arrangements function as safety nets, especially for economically disadvantaged minority groups. By combining the resources of more than one nuclear family unit, extended family households are able to use limited resources effectively (Blank, 1998). For example, a new immigrant often lives with a sibling until he or she can afford housing (Glick et al., 1997; Kamo, 2000). Moreover, this phenomenon has been instrumental in sustaining the successive waves of Latin Americans and Caribbeans who migrate north. In an early study of extended families, Fjellman and Gladwin (1985) described how Haitian extended family households, which include biological and fictive kin, made it possible for immigrants to survive and prosper in harsh economic and social conditions in South Florida.

Several studies have explored the relationship between extended family households and parenting and have noted that extended family structures in ethnic minority families can be significant for mothers who are at risk for problems in parenting or well-being (Mowbray et al., 2005; Perez, 1994; Wiley et al., 2002). Mowbray et al. examined the effects of extended family living arrangements, the well-being of mothers, and parenting in a sample of 379 African American and White mothers of children ages 1
to 17 and found that, for African American mothers, these living arrangements were associated with enhanced functioning and reduced parenting stress. More recently, family researchers have suggested that interactions within the microsystem of the family might be particularly important to Latin American and Caribbean families because of the values that many members hold regarding the importance of family, cooperation, and positive interactions with others (Eamon, 2005; Portes & Rumbaut, 2001; Zephir, 2001). For example, living with grandparents and other nonparental adults might mitigate the stressors related to the acculturation process by serving to reduce feelings of loneliness and alienation for new immigrants. Extended family living arrangements also might influence parenting by ensuring the availability of other adult household members to share parental household chores and responsibilities, such as child care, housework, and cooking, as well as socialization processes.

However, Hamilton (2005) notes that, although the presence of nonparental adults in the household might be associated with positive well-being among adolescents, their presence also might be associated with negative outcomes. Coresident adults can negatively affect children in the home by interfering with parenting. For example, grandparents might disagree with parenting practices, or additional adults in the home might be a source of stress to parents by decreasing resources, such as money, time, privacy, and physical space. Hamilton examined the association between the presence of nonparental adults in the household and adolescent well-being in a sample of 20,745 White, Black, Hispanic, and Asian families with adolescents. The findings revealed that adolescents whose households include other adults reported greater depressive symptoms than those who reside with grandparents. In addition, adolescents residing with
grandparents reported less deviant behavior than those who do not reside with grandparents. Moreover, the researcher found that among adolescents who live with other adults, deviant behavior decreases as the number of siblings increases. Overall, the results indicated that grandparent coresidence appears to be associated with beneficial results with regard to depression and deviant behaviors, whereas nonparental adult coresidence does not. However, the study did not parcel out the number of nonparental adults in the home.

Similarly, in an ethnographic study of kinship networks among Salvadoran immigrants, Menjivar (1997) interviewed 50 Salvadoran men and women with an average age of 30.7 years, residing in San Francisco. She found that although living with relatives and friends at the place of destination might lower both the sociopsychological and monetary costs of immigration for some Salvadoran newcomers, their presence also can create an environment rife with conflict. Specifically, government immigration policies, employment opportunities, crowded housing, and the reception of the larger community can create conditions that weaken family cohesion, which then can lead to acculturative stress.

Overall, several studies indicate that extended-family coresidence has implications for parenting practices, socialization decisions, and children’s roles in the family and might have a positive and significant relationship to family well-being (Harrison et al., 1990; Mowbray et al., 2005). However, research examining how extended-family coresidence is related to parenting practices of new immigrant mothers is limited. Thus, the relationship between extended-family coresidence, levels of acculturation, and parenting practices should be further investigated.
Community Level: Religious Involvement

To fully understand maternal parenting behavior, the broader context operating in the lives of immigrant parents must be considered (Foss, 1996; Hovey, 2000b). At the community level, one factor that might be a strong influence on positive parenting practices is religious involvement, measured by church attendance and church membership (Feinman, 2001). The role of religious involvement among ethnic minority groups has been of particular interest as a protective factor in the socialization process for U.S.-born adolescents (Brody & Flor, 1998; Feinman, 2001; Pearce et al., 2003). Religious involvement by African American adolescents, native-born Latino adolescents, and their families might alleviate life stressors by providing a sense of community and enhancing positive parenting practices. For example, a recent study of 1,703 high-risk urban African American (n = 1,040), Hispanic (n = 462), and White (n = 201) adolescents, ages 11 to 19 in a northeastern U.S. urban public school system found that religious factors, such as church attendance, were associated with lower levels of adolescent conduct problems (Pearce et al., 2003).

Similarly, frequent church attendance has been linked to higher academic achievement in African American youth (Brody & Flor, 1998; Brown & Gary, 1991). In a study of parenting practices and children’s psychosocial competence, Brody and Flor (1998) examined maternal religiosity as a distal variable directly associated with parenting practices and indirectly associated with child competence. The respondents included 156 African American single-mother-headed families with a child ages 6 to 9, residing in rural areas of Georgia. The results indicated that greater maternal religious involvement was significantly related to parental support and control, higher mother–
child relationship quality, and more maternal involvement in the child’s school (Brody & Flor, 1998).

Pearce and Axinn (1998), in a longitudinal study that included 867 White families from the Intergenerational Panel Study of Mothers and Children (IPSMC), assessed the relationship between religious involvement and the mother–child bond. The IPSMC was conducted over a 23-year period starting in 1962 with families with a first, second, or fourth child born in 1961 in the Detroit metropolitan area. As in the previous study, findings revealed that mothers’ attendance at religious services was positively and significantly linked to mothers’ perception of the quality of the mother–child relationship. The findings were consistent across time; mothers who frequently attended church reported a more positive affective relationship with their children. The researchers noted that frequent church attendance and church membership, which were important to these mothers, strengthened the bonds with their children; church attendance or religious social interaction seem to have provided mothers with the resources to improve their relationships. Specifically, religious involvement served as a coping mechanism that helped parents deal with conflict or the independence asserted by adolescent children. Although the results clearly demonstrate the salience of religious involvement as a determinant of warmth and positive mother–child relationships, there are limitations to the study. The data do not include objective measures of the quality of the mother–child relationship or parenting behaviors.

In another study, Gunnoe, Hetherington, and Reiss (1999) assessed the association between parental religiosity and authoritative (demanding and responsive) and authoritarian (highly demanding and directive, nonresponsive) parenting styles using
data from 486 predominantly White parents (95%) of adolescents ages 10 to 18 in the Nonshare Environment (NSE) study. The NSE included parents from nondivorced families and stepfamilies in 47 states who were married for a minimum of 5 years. Religiosity was measured by an 11-item index of frequency of parents’ church attendance and the degree of religious belief. The results indicated, after accounting for demographic factors, that religiosity was associated positively with authoritative parenting for both mothers and fathers. However, no positive associations were found between religiosity and authoritarian parenting. The researchers noted that these findings support the premise that individuals with frequent church attendance, and church membership, who also attend church with their child, might combine demandingness, a characteristic of authoritative parenting, with high responsiveness.

In a more recent study, Wiley et al. (2002) examined the relationship between mothers’ religiosity, stressful life events, and parenting practices in rural communities. The respondents included 92 low-income African American mothers with a child between the ages of 8 and 12 who were living in rural areas of Illinois. Religiosity was defined by the frequency of church attendance and the amount of faith in God. The results indicated that more religious parents reported using fewer coercive parenting strategies and experiencing fewer stressful life events than less religious parents. The researchers noted that greater maternal church attendance and personal faith have beneficial effects on parenting in these rural, low-income communities, which might be due to social support available at churches in the form of food, clothing, and financial and parenting assistance.
Several studies exploring the role of religion and adaptation of new immigrants have resulted in similar findings (Hovey, 1999; Prudent, 1988; Skinner, Correa, Skinner, & Bailey, 2001). In an early study of immigration and religious involvement, Prudent (1988) explored the frequency of church attendance as an indicator of the availability of a social support network among 100 Haitian men and women ages 21 to 65, residing in Boston. Results indicated that Haitians with a higher frequency of church attendance reported lower levels of grief and separation from their native country. Similarly, Hovey (1999) examined religious activities and suicidal ideation in a sample of 201 Latin American immigrants ages 17 to 77 in Los Angeles. The results indicated that church attendance was significantly and negatively associated with suicidal ideation. The researcher noted that high religiosity might play a protective role against suicide; church attendance might be an important indicator of the shared beliefs and practices of a religious group, and it might be positively linked to support resulting from networking.

Although several studies have investigated the role of religious involvement and adolescent and adult well-being among immigrants, only a few have focused on the relationship between religious involvement and parenting practices of new immigrants. In the ethnographic study conducted by Yearwood (2001), mentioned earlier, religious involvement was a crucial component of the child-rearing practices of Jamaican immigrants. The researcher indicated that, within the mesosystem, parents and children were embedded in strong positive relations with the church community. Specifically, the social kinship networks available in church not only reinforced the values held by the family and the cultural group with respect to self-development and relationships with others, they also allowed parents an opportunity to access some of the human and
spiritual capital necessary to raise children within the complex environment of the United States.

Conversely, some researchers have failed to find a relationship between religious involvement, immigrant adjustment, and parenting practices. In an early study on resilience and acculturative stress, Chrispin (1998) examined the predictive relationship between acculturation, religious affiliation, and parental influence, on the one hand, and adolescent resilience, on the other. Using a sample of 96 church-affiliated Haitian immigrant adolescents ages 13 to 19 in the New York City area, the study revealed parental influence as a strong predictor of emotional resilience, and bicultural acculturation as a strong predictor of academic resilience. However, religious involvement was not found to be related to any of the indices. A key limitation of the study was the lack of variability in the sample. All of the participants were church-goers who reported high levels of church attendance. Similarly, in a recent study of 348 low-income Black and Latino adolescents ages 11 to 14, Feinman (2001) examined the interaction between church attendance, parenting style, and adolescent antisocial behavior. The results failed to reveal any significant relationship between church attendance and parenting style. However, there were several limitations to this study, such as lack of variability in church attendance and the validity of the parenting style measure.

Overall, research examining the role of religious involvement as a determinant of parenting practices among immigrants is scarce. However, the few studies on religious involvement and immigrant adjustment clearly support it as a predictor of parenting practices within the home. In general, there is little extant research examining the
predictive relationship between religious involvement and parenting practices, two important socializing agents in developing social competence in adolescents. This exploratory study fills this gap in the extant literature by probing this relationship.

Sociodemographic Factors

Several studies have found that parenting practices are strongly related to sociodemographic characteristics, such as maternal age, maternal education, family income, child gender, age of child, and number of children younger than 18 years of age in the household. For example, recent studies on immigrant and nonimmigrant families have found maternal age and maternal level of education to be strong predictors of positive parenting behavior and children’s academic and social competence (Bluestone & Tamis-LeMonda, 1999; Duckworth & Sabates, 2005; Roopnarine et al., 2006). Specifically, older mothers with higher levels of education exhibit higher levels of warmth and emotional support in parent–child interactions (Bradley et al., 2001), provide more cognitive stimulation (Eamon, 2005), and use less harsh discipline (Duckwork & Sabates, 2005). The literature also indicates that low family income and poverty are significant predictors of parenting practices. Bradley et al. (2001) noted that poor parents are less likely than nonpoor parents to use consistent discipline or to communicate effectively with their children. In addition, some researchers have found differential treatment of boys and girls in Latin American and Caribbean families (Delgado-Gaitan, 1993). For example, Delgado-Gaitan (1993) points out that Latino parents are more protective of their daughters and therefore might use more rigid discipline to protect them. Similarly, DeSantis et al. (1994) indicate that Haitian parents tend to be stricter with their adolescent daughters as they mature sexually than they are with their
adolescent sons. More recent research has found that parenting behavior and attitudes often relate to the child’s age and maturity (Roopnarine et al., 2006). For example, parents might use physical punishment with early adolescents (ages 10 to 13) and reasoning with late adolescents (ages 14 to 17). In addition, the literature has noted the negative association between the number of children younger than 18 years of age living in a household and nurturing and consistent parenting by the primary caregiver (Figueroa-Moseley et al., 2006). On the basis of these findings, maternal age, family income, and child age were entered into the analysis as control variables.

Conclusion

The extant research demonstrates that parental personal and contextual factors influence parenting behaviors. Several studies examine the determinants of parenting practices among White, African American, and Latino and Caribbean families. Researchers using cultural–ecological frameworks (Brody & Flor, 1998; Harrison et al., 1990) and other theoretical frameworks (Pearce et al., 2003) have emphasized the important influence of demographic, personal, cultural, and social factors on parenting practices. The literature is consistent in documenting that Latin American and Caribbean immigrant families have evolved adaptive ways of parenting their adolescents in the context of acculturation (Feinman, 2001; Harrison et al., 1990; Yearwood, 2001). Still needed are further explorations of ecological factors, such as extended family living arrangements and religious involvement, and their influences on maternal parenting practices.

The literature also notes commonalities between the various Latino and Caribbean groups in terms of norms, values, and parenting. However, significant diversity is found
in parenting practices used by the various groups. A limitation of the literature is that most of the studies were conducted with the three major Hispanic/Latino groups in the United States: Mexican/Mexican Americans, Puerto Ricans, and Cubans. Only a few studies focus on immigrant Latinos from Central and South America or on Caribbean immigrant families. Furthermore, there is a limited amount of research on Caribbean immigrant parenting practices during adolescence. To this end, this study filled several gaps in the literature by examining the influence of maternal acculturation levels, extended-family coresidence, and religious involvement on parenting practices in a wide range of immigrant families from Latin America and the Caribbean.

Purpose of the Study

As previously discussed, the main goal of this study was to use a cultural-ecological framework to examine the relationship between individual parental characteristics, as well as influences in the immediate home and broader social environments, on parenting practices of a national sample of immigrant Latin American and Caribbean mothers of early and late adolescents. The identification of ecological factors related to optimal parenting is particularly important for Latino and Caribbean families because emotionally supportive parenting practices have been linked to better outcomes for children and adolescents in diverse samples (Guo & Harris, 2000; Miranda et al., 2000; Spera, 2005).

Specifically, this study explored the relative strength of three independent variables—maternal acculturation, extended-family coresidence, and religious involvement—in predicting four types of parenting practices—cognitive stimulation, emotional support, discipline, and involvement in school. Control variables included six
demographic variables: maternal age, maternal education, family income, child gender, child age, and number of children younger than 18 years of age. Figure 2 represents the conceptual model of ecological factors potentially related to parenting practices.

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Figure 2. Hypothesized model for proposed prediction of parental practices.
Operational Definitions of Variables

Predictor Variables

Maternal Acculturation:

*Years in United States.* Mothers’ number of years of living in the United States, as measured by self-report on the NIS.

*English Proficiency.* Mothers’ ability to speak and understand English, as measured by self-report on the NIS.

Extended-family coresidence. Number of nonparental adult household members, such as mother’s parents, mother’s stepparents, spouse’s parents, spouse’s stepparents, siblings older than 18 years, godparents, friends, housemates, and others in the home, as measured by self-report on the NIS.

Religious Involvement. Mothers’ attendance of religious services since becoming a legal permanent resident, membership of a specific church, parish, temple, synagogue, or mosque, and attendance of the same church, parish, temple, synagogue, or mosque with their child, as measured by self-report on the NIS.

Maternal Age. Mother’s or female parent’s age group, defined as younger mothers, middle-age mothers, and older mothers.

Maternal Education. Years of formal education completed by the mother.

Parental Income. Total annual household income of the participating mother.

Child Gender. Sex of the target adolescent, female or male.

Age of Adolescent Child. Ages 10 to 17.

Number of Children. Children in the household younger than 18 years of age.
Outcomes Variables

**Parenting Practices**

*Cognitive Stimulation.* Mothers’ provision of household resources to promote adolescent learning, such as reading materials, musical instruments, and cultural activities.

*Emotional Support.* Mothers’ encouragement of maturity, participation in social activities, and responsiveness, such as assigning routine chores, gathering with extended family and kin, demonstrating positive feelings, and conversing regularly.

**Discipline:**

*Strict Punishment.* Mothers’ use of spanking, grounding, and withdrawal of rewards to address adolescent misconduct.

*Positive Control.* Mothers’ use of talking, lecturing, and other non-punitive measures to guide adolescent behavior.

**Involvement in School.** Mothers’ and fathers’ participation in school activities, such as communicating with teachers, visiting the child’s class, and attending school meetings, as measured by self-report on the NIS.

**Selection**

*Immigrant.* Mothers in this study who are born in another country before migrating to the United States, as measured by self-report on the NIS.

*Country of Origin (Latin America and Caribbean).* Determined by countries south of the continental United States, including Colombia, Cuba, the Dominican Republic, El Salvador, Guatemala, Haiti, Jamaica, Mexico, Peru, and other Latin American and Caribbean nations.
Hypotheses

The present study includes five major hypotheses. Some of these hypotheses are directional and derived from the literature review. For example, based on the theory of linear acculturation, it is expected that as mothers years in the US and English proficiency increase, their parenting practices will reflect higher levels of cognitive stimulation and positive discipline (Dumka et al., 1999). Other hypotheses are exploratory and are based on a cultural-ecological framework and segmented assimilation theory. For example, it is expected that mothers’ years in the United States, one measure of acculturation, might negatively influence their parenting practices in the areas of emotional support and school involvement (Buriel et al., 1991; Schmitz, 2005). In contrast, mothers’ English proficiency, another measure of acculturation, might positively influence their parenting practice in the areas of cognitive stimulation and school involvement (Schmitz, 2005). In addition, based on the cultural-ecological framework, it is also expected that selected contextual factors (coresidence, religious involvement) might influence mothers’ parenting practices. Because of the dearth of evidence on which to base directional predictions, hypotheses which relate to these contextual factors are exploratory.

**Hypothesis 1:** Acculturation, extended-family coresidence and religious involvement will each be significantly associated with cognitive stimulation. It is expected that:

a) More years in the U.S. will be associated with higher levels of cognitive stimulation.

b) Higher levels of English proficiency will be associated with higher levels of cognitive stimulation.
c) Coresidence will be associated with higher levels of cognitive stimulation.

d) More religious involvement will be associated with higher levels of cognitive stimulation.

**Hypothesis 2:** Acculturation, extended-family coresidence, and religious involvement will each be significantly associated with emotional support. It is expected that:

a) More years in the U.S. will be associated with less emotional support.

b) Higher levels of English proficiency will be associated with higher levels of emotional support.

c) Coresidence will be associated with higher levels emotional support.

d) More religious involvement will be associated with higher levels emotional support.

**Hypothesis 3:** Acculturation, extended-family coresidence, and religious involvement will each be significantly associated with strict punishment. It is expected that:

a) More years in the U.S. will be associated with lower levels of strict punishment.

b) Higher levels of English proficiency will be associated with lower levels of strict punishment.

c) Coresidence will be associated with higher levels of strict punishment.

d) More religious involvement will be associated with lower levels of strict punishment.

**Hypothesis 4:** Acculturation, extended-family coresidence, and religious involvement will each be significantly associated with positive control. It is expected that:

a) More years in the U.S. will be associated with higher levels of positive control.
b) Higher levels of English proficiency will be associated with higher levels of positive control.

c) Coresidence will be associated with lower levels positive control.

d) More religious involvement will be associated with higher positive control.

**Hypothesis 5:** Acculturation, extended-family coresidence, and religious involvement will each be significantly associated with parental school involvement. It is expected that:

a) More years in the U.S. will be associated with lower levels of school involvement.

b) Higher levels of English proficiency will be associated with higher levels of parental school involvement.

c) Coresidence will be associated with higher levels of parental school involvement.

d) More religious involvement will be associated with lower parental school involvement.
CHAPTER III: METHODOLOGY

Dataset

This study is a secondary analysis of data from the New Immigrant Survey (NIS-2003) cohort. The NIS-2003 data were collected as part of a nationally representative longitudinal study funded by the National Institutes of Health (National Institute of Child Health and Human Development and National Institute on Aging), Bureau of U.S. Citizenship and Immigration Services, U.S. Department of Health and Human Services/Office of the Assistant Secretary for Planning and Evaluation, and Pew Charitable Trusts. The study is the first to collect data on a nationally representative sample of new legal immigrants to the United States (Jasso, Massey, Rosenzweig, & Smith, 2004).

The NIS is a multicohort prospective–retrospective panel study of new legal immigrants to the United States and their children. The families in the NIS are followed longitudinally every 3 to 5 years, and new cohorts are added every 4 to 5 years. The data from Round 1 of the NIS-2003 cohort were released to the public in March 2006 (Jasso et al., 2006).

Sample

The sampling frame is based on the electronic administrative records collected for new immigrants by the U.S. government, for example, by the U.S. Immigration and Naturalization Service (INS) and its successor agencies, the Bureau of U.S. Citizenship and Immigration Services, and the Office of Immigration Statistics (OIS) (Jasso et al., 2004). The sampling frame includes new-arrival immigrants, who arrived in the United
States with immigrant documents obtained abroad, and adjustee immigrants, who were already in the United States with temporary nonimmigrant visas and who are adjusting to lawful permanent residence.

The first full cohort (NIS-2003) includes data from both adult and child samples. The adult sample consisted of 8,573 respondents and their spouses with principal visas, and the child sample consisted of both 810 children with child-of-U.S.-citizen visas who are younger than 18 years of age and adopted orphans who are younger than 5 years of age. In both the adult and child samples, if a female parent was eligible for an interview (married to the main respondent, coresident, and older than 18 years of age), the female respondent completed the survey on the target child. If no female parent was eligible, the survey was administered to the male main respondent. The response rates for the adult and child samples were 68.6% and 64.8%, respectively. In addition, the NIS-2003 oversampled employment-based and diversity immigrants. To adjust for the oversampling and to account for nonresponse, sampling weights calculated by the NIS were used (Jasso et al., 2004).

Procedure

As noted earlier, data were drawn from a nationally representative sample of immigrant mothers (Jasso et al., 2004). The procedures for selecting the original sample consisted of three important stages. In the first stage, OIS prepared the administrative records for all new legal immigrants whose records were entered in a specific period. In the second stage, the principal investigators (PIs) selected the adult and child samples using a stratified methodology in order to obtain reliable information on the visa categories, such as spouses of U.S. citizens, employment principals, and refugees (Jasso
et al., 2004). Geographically, a random sample of the top 10 metropolitan statistical areas and top 10 counties where new legal permanent residents receive their green cards was selected. In addition, selection was carried out using a random-number statistical routine, whereby each immigrant received a sampling number and the first range of cases in each stratum was taken. In the third stage, the selected samples were forwarded by the PIs to the National Opinion Research Center, a survey organization affiliated with the University of Chicago (Jasso et al., 2004).

Face-to-face interviews were conducted with sampled adult immigrants and their spouses and with the sponsor-parents of sampled child immigrants and the spouses of the sponsor-parents. Parents were interviewed in their homes by trained bilingual interviewers or a team comprising an interviewer and an interpreter. As indicated earlier, each respondent was assigned an alphanumeric identification number to ensure the confidentiality of all of the collected data. For the purposes of this study, mothers who were born in a Latin American or Caribbean country with an adolescent child in the household were selected as a subsample for analysis. A separate dataset was used that contained only the identification number and the needed data for the study variables for the merged adult and child sample of Latino and Caribbean mothers. The Institutional Review Board (IRB) of the University of Maryland, College Park, approved the study (see Appendix A).
**Measures**

The measures for the NIS were developed from other major U.S. longitudinal surveys, such as the National Longitudinal Survey of Youth (NLSY79), the Health and Retirement Study (HRS), and the Panel Study of Income Dynamics (PSID; Jasso et al., 2004). For the secondary data analysis, only measures that corresponded with the variables of interest were used. All of the selected measures are included in Appendices B, C, and D.

**Predictor Variables**

**Parental Acculturation.** Acculturation in Latin American and Caribbean populations has been measured through various scales based on a linear model of acculturation, with most relying heavily on indicators of English language use, generational status, and length of residency (Wallen et al., 2002). In this study, acculturation was measured in two ways (see Appendix C). First, the number of years lived in the United States was calculated from the responses to item K3_1R, which asked mothers, “In what year did you leave your country of birth?” and item K6_1, which asked mothers, “To what country did you move at that time?” The K3 was then subtracted from the year of the NIS interview (2003). The second way in which acculturation was measured was by mothers’ responses to two language-based items (J13 and J14; Dinh et al., 2002). Using these two methods, acculturation was defined as a unidimensional construct, ranging from low to high acculturation (Dinh et al., 2002); that is, the higher the level of English proficiency (understanding and speaking) and the higher number of years in the United States indicate higher acculturation levels. The J13 and J14 variables
ask mothers about their ability to understand and speak English, respectively, using a four-point Likert scale (1 = very well, 2 = well, 3 = not well, 4 = not at all). Responses to J13 and J14 were reverse-coded and summed to create a total score. Scores range from a low of 2 to a high of 8, with higher scores indicating higher levels of acculturation to U.S. culture (Dinh et al., 2002; Plunkett & Bamaca-Gomez, 2003; Wallen et al., 2002). Each of the two acculturation variables was used separately in analytic models to examine acculturation as a possible predictor.

Extended-family Coresidence. Defined as the number of nonparental adult members in the household, coresidence was computed using two items in the demographic section of the survey (A11 and A15). Question A11 asked parents, “How many people are living in your household?” Mothers gave an open response, which is reported as the total number of household members. Question A15 asked mothers about the relationship of the household members to the respondent. A new variable was created for each household member to reflect the number of nonparental adults residing in the household. Nonparental adults older than 18 years of age, such as grandparents, great-grandparents, siblings of the parents, aunts and uncles of the parents, adult children of the parents, friends, godparents, housemates, roommates, and other adults, were coded as 1, and respondents, spouses, and partners were coded as 0. These variables were then summed to arrive at the total number of nonparental adults in the household, which ranged from 0 to 7 (see Appendix B). A second descriptive variable was created that separated the number of adults into type of household. Households without nonparental adults were coded 0 and labeled Nuclear Household. Households with nonparental adults were coded 1 and labeled Extended Coresidence Households.
Religious Involvement. Religious involvement is a complex concept that is often measured by single indicators of church attendance or church membership (Pearce & Axinn, 1998). However, some researchers have used composite measures that combine several items to better conceptualize how religious involvement functions in the lives of immigrant refugees (Burwell, Hill, & Van Wicklin, 1986). According to Bernard (2000), single indicators capture only a piece of a complex concept, to capture complex variables, like religious involvement, it is best to use composite instruments or cumulative indexes made up of several indicators.

In this study, religious involvement was measured by a cumulative index that included indicators measuring (1) frequency of church attendance, (2) church membership, and (3) frequency of child attending same church with mother. The frequency of maternal church attendance was obtained from item J38o, which asked mothers, “Since becoming a permanent resident how many times have you attended religious services?” with higher frequency representing higher church attendance (see Appendix C). Church membership was obtained from item J39, which asked mothers, “Do you presently consider yourself to be a member of a specific church, parish, temple, synagogue, or mosque in the United States?” Frequency of child’s same-church attendance with mother was obtained from item J55a, which asked mothers, “How often do your children attend the same church, parish, temple, synagogue, or mosque as you do?” Each variable was dichotomized to represent the presence or absence of religious involvement. Responses to question J38o that were below the median of church attendance were coded 0, and responses in the top 50% (at or above the median) were coded 1. Questions J39 and J55a were coded 1 = yes and 0 = no. The religious
involvement index was then computed by adding the dichotomized score on the three church attendance variables, which resulted in a 3-point scale ranging from 1 (religious involvement on at least one of the three scales) to 3 (religious involvement on all three scales).

**Outcome Variables**

**Parenting Practices.** Parenting behavior was assessed using NIS items based on Bradley and Caldwell’s (1981) shortened version of the *Home Observation for Measurement of the Environment Inventory* (HOME-SF). These behaviors include subscales for cognitive stimulation, emotional support, and discipline (see Appendix D).

The HOME-SF has been widely used to measure the degree of the quality of the home environment and as an overall measure of parenting. The HOME-SF items include both parent/caregiver-reported items and interviewer observation of the home environment. The HOME-SF comprises four parts in the NIS: (1) the Infant–Toddler (IT) HOME for children younger than 3 years of age, (2) the Early Childhood (EC) HOME for children ages 3 to 5, (3) the Middle Childhood (MC) HOME for children ages 6 to 9, and (4) the Early Adolescent (EA) HOME for children 10 years of age and older. This study uses the Early Adolescent part because the sample includes mothers of children ages 10 to 17.

For the purpose of this study, the HOME-SF scale was disaggregated into three conceptual categories in order to obtain more meaningful measures of the HOME-SF scores (Guo & Harris, 2000). Factor analysis was conducted to explore the possibility that an alternate structure may obtain subscales that have higher alphas than those presented in the National Longitudinal Study of Youth (NSLSY ’79) handbook (Center
for Human Resource Research, 1998). The factor analysis resulted in the following three conceptual categories: Cognitive stimulation, emotional support, and discipline, as described below and in Table 1.

*Cognitive Stimulation.* The first conceptual category, cognitive stimulation, was assessed using nine items (MD1, MD3, MD4, MD5, MD6, MD7, MD8, MD9, and MD19), including questions such as whether the child has access to books, how often the child is expected to manage his or her own time, and whether the parent encourages the child to develop hobbies (e.g., “Is there a musical instrument at home?).

*Emotional Support.* The emotional support measure consisted of twelve items (MD2A, MD2B, MD2C, MD2D, MD2E, MD2F, MD16, MD17, MD18, CSOB-2C, CSOB-5C, CSOB-6C) and assessed mothers’ interaction with the child and whether the mother encouraged independence and discussion (e.g., “how often is child expected to manage his/her own time?).

*Discipline.* Two discipline measures were used: (1) strict punishment and (2) positive control. The items in each discipline measure were selected based on the result of the principal component analysis with varimax rotation. The strict punishment measure consisted of seven items (MD21A, MD21B, MD21D, MD21F, MD21G, MD21H, MD21I). These seven items include types of punishment (e.g., “would you spank your child for a temper tantrum?). The positive control measure also consisted of seven items (MD22A, MD22B, MD22C, MD22E, MD22G, MD22H, MD22I). These seven items measured mother’s use of non-punitve strategies with the adolescent (e.g., “If your child brought home a report card with grades lower than expected, how likely would you be to lecture the child?). Overall, the factor analysis obtained items that tapped into punitive
and non-punitive discipline and reduced a large number of overlapping variables (Prinzie, Onghena, & Hellinckx, 2007).

A dichotomous (yes/no) response format, with values of 1 and 0, respectively, was used for scoring the items on the HOME-SF. Yes indicates that the item was reported by the parent. All the individual item scores were recoded into the dichotomous variables. For cognitive stimulation, emotional support, and positive control, the items are summed, with higher values indicating more positive outcomes, such as a higher level of cognitive stimulation, emotional support, and positive discipline. The strict punishment subscale was summed, with higher scores indicating a greater amount of strict discipline and spanking (see Appendices D and E for NIS items and subscale coding, respectively).

The HOME-SF and the Early Adolescent subscale for youth ages 10 and older have been used in both the NLSY79 and the PSID (Caughy, 1996; Mainieri, 2006; Mott, 2004). The NLSY provides internally normed standards and percentile scores for the overall HOME-SF, as well as for the cognitive stimulation and emotional support subscores (Center for Human Resource Research, 1998). The HOME-SF has been tested with various cultural groups (Duckworth & Sabates, 2005; Eamon, 2002; Patcher et al., 2006), including African Americans (Zaslow et al., 2006) and Latinos (Bradley et al., 2001). The HOME-SF has also been tested with Latino adolescents ages 10 – 16 (Eamon, 2005). It has shown good validity and reliability with a Cronbach’s alpha of .90 for the total score, and alphas ranging from .50 to .72 for the subscales across the three age groups (Baker, Keck, Mott, & Quinlan, 1993).
Table 1

**HOME-SF Scale Factor Analysis (N=415)**

<table>
<thead>
<tr>
<th>Measure and Variables</th>
<th>Factor Loading</th>
<th>Cronbach’s alpha</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Cognitive Stimulation (9 Items)</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>About how many books does child have?</td>
<td>.46</td>
<td></td>
</tr>
<tr>
<td>Is there a musical instrument?</td>
<td>.45</td>
<td></td>
</tr>
<tr>
<td>Does your family get a daily newspaper?</td>
<td>.41</td>
<td></td>
</tr>
<tr>
<td>About how often does child read for enjoyment?</td>
<td>.42</td>
<td></td>
</tr>
<tr>
<td>Does your family encourage child to start and keep doing hobbies?</td>
<td>.70</td>
<td></td>
</tr>
<tr>
<td>Does child get special lessons?</td>
<td>.66</td>
<td></td>
</tr>
<tr>
<td>How often has family members taken child to museum?</td>
<td>.74</td>
<td></td>
</tr>
<tr>
<td>How often has family members taken child to any type of performance?</td>
<td>.73</td>
<td></td>
</tr>
<tr>
<td>Do you discuss TV program with child?</td>
<td>.42</td>
<td></td>
</tr>
<tr>
<td>Aigenvalues: 1.97</td>
<td></td>
<td>.54</td>
</tr>
<tr>
<td><strong>Emotional Support (12 Items)</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>How often child expected to make own bed?</td>
<td>.67</td>
<td></td>
</tr>
<tr>
<td>How often child expected to clean own room?</td>
<td>.79</td>
<td></td>
</tr>
<tr>
<td>How often child expected to pick up after self?</td>
<td>.71</td>
<td></td>
</tr>
<tr>
<td>How often child expected to keep shared areas clean?</td>
<td>.67</td>
<td></td>
</tr>
<tr>
<td>How often child expected to do routing chores?</td>
<td>.58</td>
<td></td>
</tr>
<tr>
<td>How often child expected to help manage her time?</td>
<td>.50</td>
<td></td>
</tr>
<tr>
<td>How often does child spend time with father?</td>
<td>.75</td>
<td></td>
</tr>
<tr>
<td>How often does child spend time in outdoor activities with father?</td>
<td>.67</td>
<td></td>
</tr>
<tr>
<td>How often does child eat with both parents?</td>
<td>.76</td>
<td></td>
</tr>
<tr>
<td>Mother encourages child to contribute to conversation</td>
<td>.50</td>
<td></td>
</tr>
<tr>
<td>Mother introduced interviewer</td>
<td>.51</td>
<td></td>
</tr>
<tr>
<td>Mother’s voice conveyed positive feeling about child</td>
<td>.43</td>
<td></td>
</tr>
<tr>
<td>Aigenvalues: 2.46</td>
<td></td>
<td>.61</td>
</tr>
<tr>
<td><strong>Discipline: Strict Punishment (7 Items)</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Grounding for temper tantrum</td>
<td>.58</td>
<td></td>
</tr>
<tr>
<td>Spanking for temper tantrum</td>
<td>.34</td>
<td></td>
</tr>
<tr>
<td>Household chores for temper tantrum</td>
<td>.65</td>
<td></td>
</tr>
<tr>
<td>Send to room for more than 1 hour for temper tantrum</td>
<td>.47</td>
<td></td>
</tr>
<tr>
<td>Take away allowance for temper tantrum</td>
<td>.61</td>
<td></td>
</tr>
<tr>
<td>Take away TV, phone, or other privileges for temper tantrum</td>
<td>.58</td>
<td></td>
</tr>
<tr>
<td>Put child in a short time out for temper tantrum</td>
<td>.48</td>
<td></td>
</tr>
<tr>
<td>Aigenvalues: 2.24</td>
<td></td>
<td>.61</td>
</tr>
<tr>
<td><strong>Discipline: Positive Control (7 Items)</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Grades lower than expected – contact teacher</td>
<td>.68</td>
<td></td>
</tr>
<tr>
<td>Grades lower than expected – lecture child</td>
<td>.49</td>
<td></td>
</tr>
<tr>
<td>Grades lower than expected – keep closer eye on child</td>
<td>.74</td>
<td></td>
</tr>
<tr>
<td>Grades lower than expected – talk to child</td>
<td>.74</td>
<td></td>
</tr>
<tr>
<td>Grades lower than expected – tell child to spend more time on HW</td>
<td>.77</td>
<td></td>
</tr>
<tr>
<td>Grades lower than expected – help child with HW</td>
<td>.63</td>
<td></td>
</tr>
<tr>
<td>Grades lower than expected – limit non-school activities</td>
<td>.50</td>
<td></td>
</tr>
<tr>
<td>Aigenvalues: 3.34</td>
<td></td>
<td>.74</td>
</tr>
</tbody>
</table>
Parental Involvement in School. Involvement in school activities was assessed with a study-specific measure (see Appendix C). The four-item measure includes questions that assess parents’ participation in school, such as attending meetings and visiting classrooms. Parents responded yes (1) or no (0) to each of these questions. A total score was created by summing all of the responses. The scores ranged from 0 to 4, with higher scores indicating higher levels of parental involvement.

Control Variables

Specific items used to measure the control variables appear in Appendix A.

Maternal age was obtained by item A7mo, which asked mothers for their year of birth. When this information was missing in the respondent section, it was obtained from item A147 in the spouse section, which asked, “In what year was your husband/wife born?” The response was used to select the year range for the mother’s year of birth. Maternal age ranges were recoded as follows: younger mothers (1970–1980 or later) = 0, middle-age mothers (1955–1969) = 1, and older mothers (before 1940–1954) = 2.

Maternal education was obtained using item A24 on the NIS, which asked respondents for their “years of formal education completed.” If this information was missing, it was obtained from item A168 (“How many years of schooling in total did your spouse complete?”), and the response from the spouse or partner was used. Only twenty-nine percent of mothers had missing information.

Family income was calculated from items G5 (mother’s self-employment), G7A (mother’s wages and salary), G11 (mother’s income from tips), G14 (spouse or partner’s self-employment), G16 (spouse or partner’s wages and salary), G18 (spouse’s income from professional practice), G19 (spouse’s income from tips), G23, G28, G35, G40
(mother’s and spouse’s unemployment and Social Security Benefits over the past 12 months), for the total family income (in U.S. dollars).

*Child gender* was measured using item mchsx_1 on the NIS, which asked respondents about the gender of the target adolescent and was coded 1 for male or 2 for female, but were recoded as male = 0 and female = 1.

*Child age* was measured using item mchage1 on the NIS, which asked respondents about the age of the adolescent. Child age was split into two groups and recoded into early adolescents (ages 10 to 13) = 0 and adolescents (ages 14 to 17) = 1.

*Number of children* in the household was computed using three items in the demographic section of the survey (A11, A15, and A18). Question A11 asked mothers, “How many people are living in your household?” Mothers gave an open response, which is reported as the total number of household members. Question A15 asked mothers about the relationship of the household members to the respondent. Question A18 asked mothers for the year of birth of household members. A new variable was created for each household member to reflect the number of children residing in the household. Children younger than 18 years of age, such as sons, daughters, nieces, nephews, friends, siblings of the parents, and others, were coded as 1, and all of the others, including respondents, spouses, partners, grandparents, aunts and uncles, housemates, and roommates, were coded as 0. These variables were then summed to arrive at the total number of children in the household (see Appendix A).
Data Analysis

Sample Size and Missing Values

In the secondary data analysis, the sample size was limited to a nationally representative subsample of 415 Latin American and Caribbean mothers of early and late adolescents ages 10 to 17 in the NIS-2003 dataset. The initial sample consisted of 823 Latin American and Caribbean families with adolescents ages 10 to 17. Because of the small sample size, respondents who were fathers were excluded from the proposed study (a decrease of 53 cases). In addition, if items were missing on the main variables, the respondents were excluded. The sample with complete cases on all of the main variables consisted of 415 mothers. According to Tabachnick and Fidell (2001), for multiple regression analysis, assuming a medium relationship between the independent variables and the dependent variables, $\alpha = .05$ and $\beta = .20$ for a regression sample size of $N \geq 50 + 8$ (number of independent or predictor variables) when testing for individual predictors or overall correlation. The estimated sample size for this secondary analysis with 12 predictor variables is 146 respondents. Therefore, the sample size of 415 is adequate for this secondary analysis.

Descriptive Analysis

All statistical procedures were conducted using SPSS-PC software. The analyses for the study consisted of four steps. First, descriptive statistics (including means, standard deviations, frequencies, and percentages) were generated to summarize the demographic characteristics of the sample and examine the distributions of the independent and dependent variables. Second, Cronbach’s alpha coefficients for the HOME-SF subscale scores, English proficiency, and parent involvement in school total
score were computed to examine their internal consistency reliability. Before descriptive analyses, individual items on the measures for language-based acculturation, church attendance, parenting practices, and parent involvement in school were summed to create composite scores. In turn, each scale or subscale total was then treated as an interval scale in the analyses. In addition, assumptions of normality, linearity, and homoscedascity were assessed using frequency histograms with normal distribution overlay. Mahalanobis distance was used to evaluate multivariate outliers. Those variables with moderate to severe skewness and kurtosis (>3, <-3) from zero when using the z distribution were considered for data transformation (e.g., square root transformation and dichotomizing variables) to improve analysis (Tabachnick & Fidell, 2001). Three variables were improved for both skewness and kurtosis: family income, emotional support, and strict punishment. Square root transformations were completed for family income and emotional support. Log10 (x+1) transformation was completed for strict discipline. These square root transformed variables required a single outlier reduction each (Lomax, 2001; Pedhazur, 1997). Third, correlational analyses to examine the bivariate relationships between the variables were conducted. Specifically, the demographic variables were correlated with the study variables, and the study variables were correlated with each other. Demographic variables that were significantly correlated with the study variables were included in the analyses as control variables.
Multiple Regression Analysis

To test the hypothesized models (refer to Figure 2), the analytic technique of multiple regression analysis was conducted. This approach allowed for examining the significant association of the dependent variables (parenting practices) and the independent variables (acculturation, extended coresidence, religious involvement, and control variables). In multiple regression, the independent variables are entered into the analysis and are assessed by how each one adds to the explanation of the dependent variables when considered in combination with all the other independent variables. Separate regression equations were used to test each of the individual hypotheses. For Hypothesis 1 cognitive stimulation was separately regressed onto years in the United States or English proficiency, extended-family coresidence, and religious involvement. Hypothesis 2 was tested by regressing emotional support onto years in the United States, English proficiency, extended-family coresidence, and religious involvement. Hypothesis 3 was tested by separately regressing strict punishment onto years in the United States or English proficiency, extended-family coresidence, and religious involvement. Hypothesis 4 was tested by regressing positive control onto years in the United States, English proficiency, extended-family coresidence, and religious involvement. Hypothesis 5 was tested by regressing parental school involvement onto years in the United States, English proficiency, extended-family coresidence, and religious involvement. A summary of the study research questions, hypothesis, and analytic methods is provided in Table 2.
<table>
<thead>
<tr>
<th>Research Question</th>
<th>Hypothesis</th>
<th>Analytic Method</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. What are the characteristics of the new legal resident immigrant mothers from Latin America and the Caribbean?</td>
<td>None.</td>
<td>Descriptive statistics</td>
</tr>
<tr>
<td>2. What are the parenting practices of mothers of adolescents in Latin American and Caribbean immigrant families?</td>
<td>None</td>
<td>Descriptive statistics</td>
</tr>
<tr>
<td>3. Are selected ecological factors (i.e., acculturation level, extended-family coresidence, and religious involvement) related to mothers’ parenting practices in Latin American and Caribbean immigrant families?</td>
<td><strong>Hypothesis 1:</strong> Acculturation, extended-family coresidence, and religious involvement will each be significantly associated with cognitive stimulation.</td>
<td>Multiple Regression</td>
</tr>
<tr>
<td></td>
<td><strong>Hypothesis 2:</strong> Acculturation, extended-family coresidence, and religious involvement will each be significantly associated with emotional support.</td>
<td>Multiple Regression</td>
</tr>
<tr>
<td></td>
<td><strong>Hypothesis 3:</strong> Acculturation, extended-family coresidence, and religious involvement will each be significantly associated with strict punishment.</td>
<td>Multiple Regression</td>
</tr>
<tr>
<td></td>
<td><strong>Hypothesis 4:</strong> Acculturation, extended-family coresidence, and religious involvement will each be significantly associated with positive control.</td>
<td>Multiple Regression</td>
</tr>
<tr>
<td></td>
<td><strong>Hypothesis 5:</strong> Acculturation, extended-family coresidence, and religious involvement will each be significantly associated with parental school involvement.</td>
<td>Multiple Regression</td>
</tr>
</tbody>
</table>
CHAPTER IV: RESULTS

Demographic Characteristics of the Sample

As noted earlier, this sample of 415 Latina and Caribbean mothers was drawn from a national dataset of new immigrants. The results for the first research question which are related to the demographic characteristics of the sample are presented in Table 3. The average age of the target adolescent was 13 years, with approximately half (48%) being 14 years old or older. Forty-eight percent of the target adolescents were girls and 52% were boys. The age range of mothers in the study was 24 to 63 years, with roughly 59% between the ages of 34 and 48. The majority (77%) were adjustee immigrants who had been in the United States an average of 12 years. Forty-eight percent of mothers were born in Mexico, and three fourths reported being White (76%), with the majority identifying as Latina (96%). Overall, mothers had completed an average of nine years of education, 63% had less than a high school degree, 17% had a high school degree, and 23% had a college and/or graduate degree. In terms of family structure, most mothers (75%) were married; 20% were single, divorced, separated, or widowed; and 5% cohabited with a partner. On average, mothers reported residing with two children and in an extended-family household. Fifty percent of families resided in the Northeast United States. The average annual family income was $25,802. Regarding employment, nearly two thirds (62%) reported being employed outside the home, 24% were homemakers, 12% were unemployed, and 9% were students, interns, or disabled.
Table 3
Demographic Characteristics of the Sample (N = 415)

<table>
<thead>
<tr>
<th>Demographic Characteristic</th>
<th>M (SD)</th>
<th>Range</th>
</tr>
</thead>
<tbody>
<tr>
<td>Child age in years</td>
<td>13.39 (2.29)</td>
<td>10–17</td>
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<tr>
<td>Maternal education in years</td>
<td>9.44 (4.51)</td>
<td>0–21</td>
</tr>
<tr>
<td>Maternal years of residence in U.S.</td>
<td>11.54 (6.99)</td>
<td>1–36</td>
</tr>
<tr>
<td>Number of children &lt; 18 in household</td>
<td>2.47 (1.22)</td>
<td>1–7</td>
</tr>
<tr>
<td>Annual family income</td>
<td>$25,802 (17,050)</td>
<td>$0–154,500</td>
</tr>
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</table>

<table>
<thead>
<tr>
<th>n (Percentage)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Child gender</td>
</tr>
<tr>
<td>Male</td>
</tr>
<tr>
<td>Female</td>
</tr>
<tr>
<td>Maternal country of birth</td>
</tr>
<tr>
<td>Colombia, El Salvador, Guatemala, Peru</td>
</tr>
<tr>
<td>Cuba, Dominican Republic, Haiti, Jamaica</td>
</tr>
<tr>
<td>Mexico</td>
</tr>
<tr>
<td>Other Latin American and Caribbean countries</td>
</tr>
<tr>
<td>Maternal age</td>
</tr>
<tr>
<td>24–33 years</td>
</tr>
<tr>
<td>34–48 years</td>
</tr>
<tr>
<td>49–63 years</td>
</tr>
<tr>
<td>Maternal race</td>
</tr>
<tr>
<td>White</td>
</tr>
<tr>
<td>Black</td>
</tr>
<tr>
<td>Amerindian</td>
</tr>
<tr>
<td>No response</td>
</tr>
<tr>
<td>Pan-ethnic Identification</td>
</tr>
<tr>
<td>Latina</td>
</tr>
<tr>
<td>Caribbean</td>
</tr>
<tr>
<td>Demographic Characteristic</td>
</tr>
<tr>
<td>------------------------------------</td>
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<td>Adjustment status</td>
</tr>
<tr>
<td>New arrival</td>
</tr>
<tr>
<td>Adjustee</td>
</tr>
<tr>
<td>Household type</td>
</tr>
<tr>
<td>Parent &amp; child only</td>
</tr>
<tr>
<td>Extended-family coresidence</td>
</tr>
<tr>
<td>Marital status</td>
</tr>
<tr>
<td>Married</td>
</tr>
<tr>
<td>Cohabitating</td>
</tr>
<tr>
<td>Single/divorced/separated/widowed</td>
</tr>
<tr>
<td>Employment status</td>
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<td>Employed</td>
</tr>
<tr>
<td>Homemaker</td>
</tr>
<tr>
<td>Unemployed</td>
</tr>
<tr>
<td>Student/intern/disabled/other</td>
</tr>
<tr>
<td>State of residence</td>
</tr>
<tr>
<td>New York, New Jersey, other Northeast</td>
</tr>
<tr>
<td>Florida, Maryland, Virginia, DC, other South</td>
</tr>
<tr>
<td>California, Mountain &amp; Pacific</td>
</tr>
<tr>
<td>Texas, Illinois, Indiana, Wisconsin, other Midwest</td>
</tr>
</tbody>
</table>
Reliability of Study Measures

Cronbach’s coefficient alphas were computed to examine the internal consistency of the study measures. The reliability coefficients of these measures are presented in Table 4. The alpha coefficient for the English proficiency scale had a reliability of .92. Of the HOME-SF parenting subscales, cognitive stimulation had a reliability of .54, and emotional support had a reliability of .61. The two discipline subscales, strict punishment and positive control, had coefficient alphas of .61 and .75, respectively. These results are consistent with the reliability from previous studies with Latinos using the HOME-SF (Bradley et al., 2001). The reliability coefficient for the parental school involvement scale was .58. With the exception of the HOME-SF cognitive stimulation subscale and the parental school involvement scale, all of the reliability coefficients are in an acceptable range (Baker et al., 1993).

Table 4
Coefficient Alphas for Study Measures

<table>
<thead>
<tr>
<th>Measure</th>
<th>No. of items</th>
<th>Coefficient alpha</th>
</tr>
</thead>
<tbody>
<tr>
<td>English proficiency</td>
<td>2</td>
<td>.92</td>
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<tr>
<td>HOME-SF</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cognitive stimulation</td>
<td>9</td>
<td>.54</td>
</tr>
<tr>
<td>Emotional support</td>
<td>12</td>
<td>.61</td>
</tr>
<tr>
<td>Discipline</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Strict punishment</td>
<td>7</td>
<td>.61</td>
</tr>
<tr>
<td>Positive control</td>
<td>7</td>
<td>.75</td>
</tr>
<tr>
<td>Parental school involvement</td>
<td>4</td>
<td>.58</td>
</tr>
</tbody>
</table>
Frequencies and Scores of Study Measures

Table 5 presents frequencies, means, and standard deviations for the predictor variables (years in U.S., English proficiency, extended-family coresidence, and religious involvement). According to these mothers’ responses, 58% \((n = 245)\) have been in the United States for more than 10 years. On the two-item English proficiency measure, mothers reported how well they understood English and how well they spoke English. Higher scores indicated higher levels of English proficiency, with lower scores indicating limited English proficiency. Study participants’ mean score on English proficiency was 5.81 \((SD = 1.69)\). More than half (56%) of the mothers reside with two or more nonparental adults. Religious involvement was assessed using a three-item cumulative index of frequent church attendance, church membership, and child’s frequency of church attendance with mother. Higher scores indicated greater level of church involvement. Mothers’ mean score on this index was 2.1 \((SD = .73)\).

Table 5
Scores and Frequencies of Predictor Measures

<table>
<thead>
<tr>
<th>Predictor ((N = 415))</th>
<th>Range</th>
<th>Mean</th>
<th>SD</th>
</tr>
</thead>
<tbody>
<tr>
<td>English proficiency</td>
<td>2–8</td>
<td>5.81</td>
<td>1.69</td>
</tr>
<tr>
<td>Total nonparental adults in household</td>
<td>0–7</td>
<td>1.72</td>
<td>1.08</td>
</tr>
<tr>
<td>Religious involvement index</td>
<td>1–3</td>
<td>2.1</td>
<td>0.73</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Years in U.S.</th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>1–5 years</td>
<td>105</td>
<td>25%</td>
<td></td>
</tr>
<tr>
<td>6–10 years</td>
<td>65</td>
<td>16%</td>
<td></td>
</tr>
<tr>
<td>11–15 years</td>
<td>129</td>
<td>31%</td>
<td></td>
</tr>
<tr>
<td>16–20 years</td>
<td>85</td>
<td>20%</td>
<td></td>
</tr>
<tr>
<td>21 or more years</td>
<td>31</td>
<td>7%</td>
<td></td>
</tr>
</tbody>
</table>
Parenting Practices of the Sample

The results for the second research question, which are related to the parenting practices of Latina and Caribbean mothers are presented in Table 6. Mothers’ parenting behaviors were measured using three subscales from the HOME-SF: cognitive stimulation, emotional support, and discipline. On the 9-item Cognitive Stimulation measure, higher scores indicated higher levels of stimulation. Study mothers had an average score of 4.86 ($SD = 1.87$). A high percentage of mothers indicated that they encouraged hobbies (84%), and discussed television programming with their adolescent child (81%). Only a few mothers reported providing musical instruments (27%), or to taking their adolescent child to a performance (36%).

On the 12-item Emotional Support measure, higher scores indicated greater levels of support. The mothers’ mean score on the 12-item Emotional Support scale was 8.41 ($SD = 1.99$). The majority of mothers expected their adolescent child to keep their room clean (90%), pick up after themselves (93%), keep the home clean (92%), and manage their time (94%). Somewhat fewer mothers reported their adolescent child eating a meal with both parents (71%), spending time with their fathers (79%), or conveyed positive feelings when talking about their child (57%).

Discipline was measured in two ways by selected items in the modified HOME-SF. The first discipline measure, Strict Punishment, was assessed by 7 items. Lower scores indicated less strict discipline. Study mothers had a mean score of 2.16 ($SD = 1.31$). Mothers were more likely to take away TV from their adolescent child (58%), and less likely to ground the child (25%) or send them to their room (18%). Further, ninety-six percent of mothers indicated not spanking their adolescent child. On the whole, Latina
and Caribbean mothers in this study are more likely to provide a low level of strict punishment. The second discipline measure, Positive Control, also consisted of 7 items. Higher scores indicated greater use of non-punitive control. Mothers’ average score on this measure was 1.08 ($SD = 1.52$). Overall, Latina and Caribbean mothers indicated lower level of lecturing, talking, and helping parental behavior to control adolescent misbehavior.

Mothers’ school involvement was assessed by 4 items. Higher scores indicated greater parental involvement and interaction with the child’s school. Mothers indicated a low level of parental school involvement, with a mean score of 1.45 ($SD = 1.15$). Overall, Latina and Caribbean mothers were less likely to attend school meetings (17%) and more likely to volunteer at their adolescent child’s school (71%).

Table 6

Scores on Parenting Measures

<table>
<thead>
<tr>
<th>Measure</th>
<th>Range</th>
<th>Mean</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>HOME-SF</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cognitive stimulation</td>
<td>0–9</td>
<td>4.86</td>
<td>1.87</td>
</tr>
<tr>
<td>Emotional support</td>
<td>0–12</td>
<td>8.41</td>
<td>1.99</td>
</tr>
<tr>
<td>Discipline</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Strict punishment</td>
<td>0–7</td>
<td>2.11</td>
<td>1.28</td>
</tr>
<tr>
<td>Positive control</td>
<td>0–7</td>
<td>1.09</td>
<td>1.55</td>
</tr>
<tr>
<td>Parental school involvement</td>
<td>0–4</td>
<td>1.45</td>
<td>1.15</td>
</tr>
</tbody>
</table>
Table 7 presents a correlation matrix depicting the relationships between all of the study variables. Years in the United States was significantly and negatively correlated with parental school involvement \((r = -0.17, p < 0.01)\). This indicates that as mothers’ years in the United States increased, there was a corresponding decrease in school involvement. English proficiency was significantly and negatively correlated with cognitive stimulation \((r = -0.23, p < 0.01)\) and significantly and positively related to parental school involvement \((r = 0.22, p < 0.01)\), indicating that as mothers’ proficiency in English increased, there was a corresponding decrease in cognitively stimulating activities, but a corresponding increase in school involvement. Extended-family coresidence was significantly and positively correlated with parental school involvement \((r = 0.11, p < 0.05)\), indicating that as nonparental adults in the household increased; there was a corresponding increase in parental school involvement. Religious involvement was significantly positively related to cognitive stimulation \((r = 0.10, p < 0.05)\) and emotional support \((r = 0.13, p < 0.01)\) and significantly negatively related to school involvement \((r = -0.14, p < 0.01)\). This indicates that as mothers’ religious involvement increased, there was a corresponding increase in cognitively stimulating activities and emotional support, but a corresponding decrease in school involvement. Additionally, cognitive stimulation was significantly negatively related to emotional support \((r = -0.24, p < 0.01)\) and parental school involvement \((r = -0.31, p < 0.01)\). Emotional support was positively related to school involvement \((r = 0.21, p < 0.01)\).

Years in the United States was not significantly related to cognitive stimulation, emotional support, strict punishment, positive control, or parental school involvement.
English proficiency was not significantly correlated with emotional support, strict punishment, or positive control. Extended-family coresidence was not significantly related to cognitive stimulation, emotional support, strict punishment, or positive control. Religious involvement was not related to strict punishment or positive control. However, it was important to see whether the relationships changed once controls were introduced.

Table 7 also presents the intercorrelations among the control variables and the variables of interest. Child age, maternal age, and annual family income significantly correlated with the predictor and outcome variables of interest. Results indicated that mothers of older adolescents reported residing in extended households with more nonparental adults \( (r = .16, p < .05) \), providing less cognitive stimulation \( (r = -.13, p < .01) \) and less strict punishment \( (r = -.19, p < .05) \), but more emotional support \( (r = .30, p < .01) \) and school involvement \( (r = .16, p < .01) \). In addition, older mothers reported less strict punishment \( (r = -.11, p < .05) \) but more emotional support \( (r = .15, p < .01) \), school involvement \( (r = .14, p < .01) \), and extended-family coresidence \( (r = .14, p < .01) \). Results also indicated that mothers with higher annual family incomes reported residing in extended households with more nonparental adults \( (r = .11, p < .05) \) and provided higher levels of cognitive stimulation \( (r = .10, p < .05) \). In addition, mothers with higher levels of education reported fewer years in the United States \( (r = -.22, p < .01) \) and less English proficiency \( (r = -.40, p < .01) \). Number of children in the household was significantly and negatively correlated with years in the United States \( (r = -.11, p < .05) \). Overall, no control variables were correlated significantly with the predictor or outcome variables of interest at or above .80 indicating multicollinearity (Tabachnick & Fidell, 2001).
Based on the literature, child gender, maternal education, and number of children in the household were proposed as potential factors associated with parenting practices. However, there were no significant correlations between child gender and the predictor and outcome variables. In addition, there were no significant correlations between maternal education and the outcome variables interest, or number of children in the household and the outcome variables of interest. Therefore, child gender, maternal education, and number of children in the household were excluded from further analysis.
Table 7

Bivariate Relationships between Study Variables

<table>
<thead>
<tr>
<th>Variables</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
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<th>11</th>
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<th>13</th>
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</thead>
<tbody>
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<tr>
<td>1. Child gender *</td>
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<td>2. Child age b</td>
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<tr>
<td>3. Maternal age</td>
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<td>.03</td>
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<td>5. No. of children</td>
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<td>-.28**</td>
<td>-.11*</td>
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<td>6. Family income c</td>
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<td>.12*</td>
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<td>Predictor Variables</td>
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<tr>
<td>7. Years in U.S.</td>
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<td>.01</td>
<td>-.03</td>
<td>-.22**</td>
<td>-.11*</td>
<td>.06</td>
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<td>8. English proficiency</td>
<td>-.03</td>
<td>.07</td>
<td>.18</td>
<td>-.40**</td>
<td>.03</td>
<td>-.07</td>
<td>-.25**</td>
<td>-</td>
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<td>9. Extended coresidence</td>
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<td>.16**</td>
<td>.14**</td>
<td>-.05</td>
<td>-.01</td>
<td>.11*</td>
<td>-.06</td>
<td>.18**</td>
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<td>10. Religious involvement</td>
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<td>.00</td>
<td>-.06</td>
<td>.05</td>
<td>.03</td>
<td>.10*</td>
<td>-.12*</td>
<td>-.08</td>
<td>-</td>
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<td></td>
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<td></td>
<td></td>
</tr>
<tr>
<td>11. Cognitive stimulation</td>
<td>.05</td>
<td>-.13**</td>
<td>-.03</td>
<td>.09</td>
<td>-.05</td>
<td>.10*</td>
<td>.02</td>
<td>-.23**</td>
<td>-.09</td>
<td>.10*</td>
<td>-</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>12. Emotional support</td>
<td>-.03</td>
<td>.30**</td>
<td>.15**</td>
<td>.03</td>
<td>-.00</td>
<td>-.04</td>
<td>-.02</td>
<td>.09</td>
<td>.01</td>
<td>.14*</td>
<td>-.24*</td>
<td>-</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>13. Strict punishment</td>
<td>-.02</td>
<td>-.19**</td>
<td>-.12*</td>
<td>.02</td>
<td>.04</td>
<td>-.02</td>
<td>.07</td>
<td>.04</td>
<td>-.06</td>
<td>.05</td>
<td>.02</td>
<td>.04</td>
<td>-</td>
<td></td>
<td></td>
</tr>
<tr>
<td>14. Positive control</td>
<td>.07</td>
<td>.06</td>
<td>.00</td>
<td>-.01</td>
<td>-.04</td>
<td>.05</td>
<td>.01</td>
<td>.02</td>
<td>.01</td>
<td>-.06</td>
<td>-.05</td>
<td>-.04</td>
<td>-.10</td>
<td>-</td>
<td></td>
</tr>
<tr>
<td>15. School involvement</td>
<td>.03</td>
<td>.16**</td>
<td>.14**</td>
<td>-.03</td>
<td>-.09</td>
<td>.02</td>
<td>-.17**</td>
<td>.22**</td>
<td>.11*</td>
<td>-.14**</td>
<td>-.31**</td>
<td>.21**</td>
<td>-.05</td>
<td>.09</td>
<td>-</td>
</tr>
</tbody>
</table>

A major objective of this study was to explore how ecological factors influence parenting practices of new legal immigrant Latina and Caribbean mothers of adolescents. Mother’s age, child’s age, and annual family income were selected as control variables because they had been conceptually linked to parenting behavior in the literature (e.g., Bradley et al., 2001; Eamon, 2002; Hill & Craft, 2003; Slicker, 1998). Multiple regression analyses were used to examine the relationships between the independent and dependent variables. Specifically, standard multiple linear regression was used with a model (Figure 2) containing the full variable set (demographic controls, acculturation, extended coresidence, and religious involvement). All regressions were weighted by normalized population weights.

Regression Model of Cognitive Stimulation on Ecological Variables

Utilizing linear regression analyses, demographic variables (child age, maternal age, and annual family income) and selected ecological variables (years in US, English proficiency, extended-family coresidence, and religious involvement) were assessed for their influence on cognitive stimulation (Figure 3).

![Diagram of the Regression Model](image)

Figure 3. Hypothesized model predicting cognitive stimulation (N = 415).
Regression 1: Cognitive stimulation regressed onto years in the United States, English proficiency, extended-family coresidence, and religious involvement.

Table 8 presents the results of the first regression model for hypotheses 1. The overall model was significant, $F(7, 407) = 5.41, p < .001$. This model explained $7\%$ of the variance in cognitive stimulation primarily because of the inclusion of child age and annual family income as controls, and English proficiency. Mothers’ years in the United States was not associated with cognitive stimulation. Hypothesis 1A predicted that longer U.S. residence would be associated with higher levels of cognitive stimulation. Hypothesis 1A was not supported. Hypothesis 1B predicted that higher English proficiency would be significantly associated with higher levels of cognitive stimulation. Hypothesis 1B was not supported. However, with other variables held constant, higher English proficiency scores were significantly related to lower cognitive stimulation. Mothers who have higher levels of English proficiency were less likely to provide cognitively stimulating activities in the home than mothers with lower levels of English proficiency. Hypothesis 1C predicted that extended-family coresidence would be related to higher levels of cognitive stimulation. Hypothesis 1C was not supported. Hypothesis 1D predicted that mothers’ religious involvement would be related to higher levels of cognitive stimulation. Although religious involvement approached significance ($p = .057$), this hypothesis was not supported. Contrary to expectations, there was no evidence of a significant relationship between mothers’ length of residence in the United States, extended-family coresidence, religious involvement and the level of cognitive stimulation provided in the home.
Table 8

Summary of Multiple Regression Analyses for Ecological Variables Predicting Cognitive Stimulation (N = 415)

<table>
<thead>
<tr>
<th>Predictor Variables</th>
<th>B</th>
<th>SE</th>
<th>β</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>Child age</td>
<td>-.458</td>
<td>.183</td>
<td>-.126</td>
<td>.013</td>
</tr>
<tr>
<td>Maternal age</td>
<td>.140</td>
<td>.144</td>
<td>.049</td>
<td>.334</td>
</tr>
<tr>
<td>Family income</td>
<td>.004</td>
<td>.002</td>
<td>.102</td>
<td>.034</td>
</tr>
<tr>
<td>Years in U.S.</td>
<td>-.013</td>
<td>.013</td>
<td>-.049</td>
<td>.316</td>
</tr>
<tr>
<td>English proficiency</td>
<td>-.235</td>
<td>.055</td>
<td>-.217</td>
<td>.000</td>
</tr>
<tr>
<td>Extended coresidence</td>
<td>-.068</td>
<td>.075</td>
<td>-.045</td>
<td>.364</td>
</tr>
<tr>
<td>Religious involvement</td>
<td>.183</td>
<td>.120</td>
<td>.074</td>
<td>.126</td>
</tr>
</tbody>
</table>

Note: $R^2 = .09$. Adj $R^2 = .07$

Regression Model of Emotional Support on Ecological Variables

Using linear regression analyses, demographic variables (child age, maternal age, and annual family income) and ecological variables (years in U.S., English proficiency, extended-family coresidence, and religious involvement) were examined for their relationship to emotional support (Figure 4).

Regression 2: Emotional support regressed onto yrs. in U.S., English proficiency, extended-family coresidence, and religious involvement.

Table 9 presents the results of the regression model for hypothesis 2. The overall model was significant, $F (7, 407) = 7.98, p < .001$. This model explained 11% of the
variance in emotional support. The only independent ecological variable found to be
significantly associated with emotional support was religious involvement. Hypothesis
2A predicted that mothers with longer U.S. residence would be related to lower
emotional support. This hypothesis was not supported. Hypothesis 2B predicted that
mothers with higher level of English proficiency would be associated with lower levels of
emotional support. This hypothesis was not supported. Hypothesis 2C predicted that
mothers’ extended-family coresidence would be related to higher levels of emotional
support. This hypothesis was not supported. Hypothesis 2D predicted that mothers higher
religious involvement would be related to higher levels of emotional support. This
hypothesis was not supported. However, mothers who had higher levels of religious
involvement, such as frequently attending church, attending church with their child, or
being members of a church, temple, parish, synagogue, or mosque had lower levels of
emotional support. Contrary to the study’s hypotheses, mother’s years in the United
States, English proficiency, and extended-family coresidence were not significant.

Table 9
Summary of Multiple Regression Analyses for Ecological Variables Predicting Emotional
Support (N = 415)

<table>
<thead>
<tr>
<th>Predictor Variables</th>
<th>B</th>
<th>SE</th>
<th>β</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>Child age</td>
<td>.269</td>
<td>.047</td>
<td>.282</td>
<td>.000</td>
</tr>
<tr>
<td>Maternal age</td>
<td>.047</td>
<td>.037</td>
<td>.063</td>
<td>.208</td>
</tr>
<tr>
<td>Family income</td>
<td>-.001</td>
<td>.000</td>
<td>-.091</td>
<td>.055</td>
</tr>
<tr>
<td>Yrs. in U.S.</td>
<td>.001</td>
<td>.003</td>
<td>.011</td>
<td>.817</td>
</tr>
<tr>
<td>English proficiency</td>
<td>.013</td>
<td>.014</td>
<td>.047</td>
<td>.342</td>
</tr>
<tr>
<td>Extended coresidence</td>
<td>-.020</td>
<td>.019</td>
<td>-.050</td>
<td>.297</td>
</tr>
<tr>
<td>Religious involvement</td>
<td>-.085</td>
<td>.031</td>
<td>-.130</td>
<td>.006</td>
</tr>
</tbody>
</table>

Note: $R^2 = .12$. Adj $R^2 = .11$
Regression Model of Strict Punishment on Ecological Variables

Again, conducting multiple regression analyses, demographic variables (child age, maternal age, and annual family income) and ecological variables (years in U.S., English proficiency, extended-family coresidence, and religious involvement) were examined for their relationship with strict punishment (Figure 5).

Figure 5. Hypothesized model predicting strict punishment ($N = 415$).

Regression 3: Strict punishment regressed onto years in the United States, extended-family coresidence, and religious involvement.

Table 10 presents the results of the regression models for hypothesis 3A, 3C, and 3D. The overall model was significant, $F (6, 408) = 3.77, p < .01$. This model explained 4% of the variance in strict punishment. The only independent ecological variable found to be significantly associated with strict punishment was years in the United States.

Hypothesis 3A predicted that mothers’ longer length of residence in the U.S. would be associated with lower levels of strict discipline. This hypothesis was supported.

Hypothesis 3B predicted that extended-family coresidence would be significantly associated with higher levels of strict discipline. This hypothesis was not supported.

Hypothesis 3D predicted that religious involvement would significantly relate to higher levels of strict discipline. This hypothesis was not supported. Overall, Latina and
Caribbean mothers with more years living in the United States had lower levels of strict punishment, such as spanking and grounding. Mothers’ extended-family coresidence and religious involvement were not found to be significantly related to strict punishment.

Table 10
Summary of Multiple Regression Analyses for Ecological Variables Predicting Strict Punishment (with Years in US) (N = 415)

<table>
<thead>
<tr>
<th>Predictor Variables</th>
<th>B</th>
<th>SE</th>
<th>β</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>Child age</td>
<td>-.132</td>
<td>.039</td>
<td>-.171</td>
<td>.001</td>
</tr>
<tr>
<td>Maternal age</td>
<td>-.042</td>
<td>.031</td>
<td>-.070</td>
<td>.170</td>
</tr>
<tr>
<td>Family income</td>
<td>.000</td>
<td>.000</td>
<td>.011</td>
<td>.813</td>
</tr>
<tr>
<td>Years in U.S.</td>
<td>-.005</td>
<td>.003</td>
<td>-.097</td>
<td>.047</td>
</tr>
<tr>
<td>Extended coresidence</td>
<td>-.025</td>
<td>.038</td>
<td>-.672</td>
<td>.502</td>
</tr>
<tr>
<td>Religious involvement</td>
<td>.015</td>
<td>.026</td>
<td>.028</td>
<td>.570</td>
</tr>
</tbody>
</table>

Note: $R^2 = .05$. Adj $R^2 = .04$.

Regression 4: Strict punishment regressed onto English proficiency, extended-family coresidence, and religious involvement.

A separate regression model was conducted to explore the influence of English proficiency, along with the other ecological factors, on strict discipline. Table 11 presents the results of the regression model. The overall model was significant, $F (6, 408) = 3.52$, $p < .01$. This model explained 3% of the variance in strict punishment primarily because of the inclusion of child age as a control. Hypothesis 3B predicted that higher levels of English proficiency would be significantly related to strict discipline. Mothers’ English proficiency was not found to be significantly associated with strict discipline.
Table 11

*Summary of Multiple Regression Analysis for Ecological Variables Predicting Strict Punishment (with English Proficiency) (N = 415)*

<table>
<thead>
<tr>
<th>Predictor Variables</th>
<th>B</th>
<th>SE</th>
<th>β</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>Child age</td>
<td>-.135</td>
<td>.039</td>
<td>-.175</td>
<td>.001</td>
</tr>
<tr>
<td>Maternal age</td>
<td>-.048</td>
<td>.031</td>
<td>-.080</td>
<td>.123</td>
</tr>
<tr>
<td>Family income</td>
<td>.000</td>
<td>.000</td>
<td>.011</td>
<td>.822</td>
</tr>
<tr>
<td>English proficiency</td>
<td>.018</td>
<td>.011</td>
<td>.078</td>
<td>.116</td>
</tr>
<tr>
<td>Extended coresidence</td>
<td>-.030</td>
<td>.038</td>
<td>-.039</td>
<td>.429</td>
</tr>
<tr>
<td>Religious involvement</td>
<td>.014</td>
<td>.026</td>
<td>.026</td>
<td>.588</td>
</tr>
</tbody>
</table>

Note: $R^2 = .05$. $Adj R^2 = .04$.

**Regression Model of Positive Control on Ecological Variables**

Using linear regression analyses, demographic variables (child age, maternal age, and annual family income) and ecological variables (years of residence, English proficiency, extended-family coresidence, and religious involvement) were examined for their relationship with positive control (Figure 6).

![Diagram](image.png)

Figure 6. Hypothesized model predicting positive control ($N = 415$).
Regression 5: Positive control regressed onto years in the United States, English proficiency, extended-family coresidence, and religious involvement.

Table 12 presents results of the regression model for hypothesis 4, which examined the influence of demographic and ecological factors on positive control. Based on the literature, it was expected that ecological factors, such as years in the United States, English proficiency, extended-family coresidence, and religious involvement, would be significantly associated with discipline, specifically positive control. The overall model was not significant, $F(7, 407) = .765$, ns. The model explained less than 1% of the variance in positive control. It was hypothesized that years in the United States, English proficiency, extended coresidence, and religious involvement would be significantly associated with lower levels of positive control. This hypothesis was not supported. Contrary to expectations, there was no evidence of significant relationships between ecological factors and mothers’ use of positive control to discipline adolescents.

Table 12
Summary of Multiple Regression Analyses for Ecological Variables Predicting Positive Control (N = 415)

<table>
<thead>
<tr>
<th>Predictor Variables</th>
<th>B</th>
<th>SE</th>
<th>$\beta$</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>Child age</td>
<td>.194</td>
<td>.159</td>
<td>.063</td>
<td>.224</td>
</tr>
<tr>
<td>Maternal age</td>
<td>-.026</td>
<td>.126</td>
<td>-.011</td>
<td>.835</td>
</tr>
<tr>
<td>Family income</td>
<td>.001</td>
<td>.001</td>
<td>.040</td>
<td>.422</td>
</tr>
<tr>
<td>Years in U.S.</td>
<td>.012</td>
<td>.011</td>
<td>.053</td>
<td>.295</td>
</tr>
<tr>
<td>English proficiency</td>
<td>-.009</td>
<td>.048</td>
<td>-.010</td>
<td>.850</td>
</tr>
<tr>
<td>Extended coresidence</td>
<td>.005</td>
<td>.065</td>
<td>-.004</td>
<td>.938</td>
</tr>
<tr>
<td>Religious involvement</td>
<td>-.148</td>
<td>.104</td>
<td>-.071</td>
<td>.156</td>
</tr>
</tbody>
</table>

Note: $R^2 = .01$. Adj $R^2 = -.00$. 

100
Regression Model of School Involvement on Ecological Variables

Using linear regression analyses, demographic variables and ecological variables were examined for their relationship with parental school involvement (Figure 7).

Regression 6: Parental school involvement regressed onto years in the United States, English proficiency, extended-family coresidence, and religious involvement.

Table 13 presents the results of the regression model for part of hypothesis 5. The overall model was significant, $F(7, 407) = 6.58, p < .001$. This model explained 9% of the variance in parental school involvement. Ecological variables found to be significant were years in the United States ($p < .05$), English proficiency ($p < .05$), and religious involvement ($p < .05$). Hypothesis 5A predicted that longer U.S. residence would be associated with lower levels of parental school involvement. This hypothesis was supported. Hypothesis 5B predicted that higher levels of English proficiency would be associated with higher levels of parental school involvement. This hypothesis was supported. Hypothesis 5C predicted that residence with nonparental adults would be significantly associated with higher levels of parental school involvement. This hypothesis was not supported. Hypothesis 5D predicted that higher levels of religious involvement, represented by mother’s church attendance since becoming a legal permanent resident of the United States; mother’s membership in church, temple, parish,
synagogue, or mosque; and child’s frequency of church attendance with mother would be significantly associated with lower levels of parental school involvement. This hypothesis was supported. Overall, mothers with more years in the United States and mothers with more religious involvement had less interaction with their child’s school. However, mothers with more English proficiency were more involved in school activities than mothers with less English proficiency.

Table 13
Summary of Multiple Regression Analysis for Ecological Variables Predicting Parental School Involvement (N = 415)

<table>
<thead>
<tr>
<th>Predictor Variables</th>
<th>B</th>
<th>SE</th>
<th>β</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>Child age</td>
<td>.272</td>
<td>.114</td>
<td>.118</td>
<td>.018</td>
</tr>
<tr>
<td>Maternal age</td>
<td>.129</td>
<td>.090</td>
<td>.072</td>
<td>.154</td>
</tr>
<tr>
<td>Family income</td>
<td>.000</td>
<td>.001</td>
<td>-.007</td>
<td>.891</td>
</tr>
<tr>
<td>Years in U.S.</td>
<td>-.020</td>
<td>.008</td>
<td>-.121</td>
<td>.013</td>
</tr>
<tr>
<td>English proficiency</td>
<td>.104</td>
<td>.034</td>
<td>.151</td>
<td>.003</td>
</tr>
<tr>
<td>Extended Coresidence</td>
<td>.035</td>
<td>.047</td>
<td>.037</td>
<td>.451</td>
</tr>
<tr>
<td>Religious involvement</td>
<td>-.165</td>
<td>.075</td>
<td>-.105</td>
<td>.028</td>
</tr>
</tbody>
</table>

Note: $R^2 = .10$. $Adj \ R^2 = .09$.

Because there is empirical evidence that parenting behavior might differ according to immigrant adjustment status, especially regarding those who were illegal entrants before becoming legal permanent residents (Garcia Coll & Szalacha, 2004; Gibson, 2001; Thomas, 1995), the sample was divided into two groups: (1) new-arrival immigrants—immigrants who obtained legal immigrant documents abroad before arriving in the United States; and (2) adjustee immigrants—immigrants who were already in the United States illegally or with temporary nonimmigrant visas before adjusting to lawful permanent residence (Jasso et al., 2004). Table 14 presents the demographic
characteristics of the subsample of new-arrival mothers and adjustee mothers. Means, standard deviation, and range are included, as well as frequencies and percentages.

The subsamples consisted of 317 adjustee mothers and 98 new-arrival mothers. In both groups, the average age of the target adolescents was 13 years. The age range of mothers of both groups was 24 to 63 years, with roughly 59% between the ages of 34 and 48. The average length of residence for adjustee mothers was 13 years, whereas the average number of years in the United States for new arrivals was 6 years. Forty-eight percent of adjustee mothers were born in Mexico, whereas only 33 percent of new-arrival mothers were born in Mexico. The majority of both groups reported being White (76%) and Latina (90%). In terms of education, mothers in the adjustee group had completed an average of 9 years of schooling and new-arrival mothers reported almost 11 years of education. The majority of mothers in both groups were married—78% in the adjustee group and 70% in the new-arrival group. Twenty-six percent of new-arrival mothers and 17% of adjustee mothers were single, divorced, widowed, or separated. However, 16% of the adjustee group cohabited with a partner, whereas only 4% of new-arrival mothers cohabited with a partner. On average, the annual family income for adjustee mothers was $26,231 and $24,406 for new-arrival mothers. Approximately two thirds (61%) of adjustee mothers and new-arrival mothers reported being employed outside the home. Finally, 85% of new-arrival mothers resided with extended family and other nonparental adults, compared to 72% of adjustee mothers.
Table 14
Demographic Characteristics of the Sample (By Group)

<table>
<thead>
<tr>
<th>Demographic Characteristic</th>
<th>Adjustee Mothers (N = 317)</th>
<th>New-Arrival Mothers (N = 98)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mean</td>
<td>SD</td>
</tr>
<tr>
<td>Child age in years</td>
<td>13.41</td>
<td>2.31</td>
</tr>
<tr>
<td>Maternal education in years</td>
<td>9.17</td>
<td>4.30</td>
</tr>
<tr>
<td>No. of children &lt; 18 in HH</td>
<td>2.54</td>
<td>1.21</td>
</tr>
<tr>
<td>Total nonparental adults in HH</td>
<td>1.20</td>
<td>1.18</td>
</tr>
<tr>
<td>Annual family income</td>
<td>$26,231</td>
<td>$17,935</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>n (Percentage)</th>
<th>n (Percentage)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Child gender</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Male</td>
<td>170 (53.5%)</td>
<td>46 (47.5%)</td>
</tr>
<tr>
<td>Female</td>
<td>148 (46.5%)</td>
<td>51 (52.5%)</td>
</tr>
<tr>
<td>Maternal age</td>
<td></td>
<td></td>
</tr>
<tr>
<td>24–33 years</td>
<td>71 (22.0%)</td>
<td>17 (17.0%)</td>
</tr>
<tr>
<td>34–48 years</td>
<td>188 (59.0%)</td>
<td>57 (59.0%)</td>
</tr>
<tr>
<td>49–63 years</td>
<td>58 (18.0%)</td>
<td>24 (24.0%)</td>
</tr>
<tr>
<td>Maternal country of birth</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Columbia, El Salvador, Guatemala, Peru</td>
<td>126 (40.0%)</td>
<td>18 (18.0%)</td>
</tr>
<tr>
<td>Cuba, Dominican Republic, Haiti, Jamaica</td>
<td>20 (6.0%)</td>
<td>34 (36.0%)</td>
</tr>
<tr>
<td>Mexico</td>
<td>155 (48.0%)</td>
<td>31 (33.0%)</td>
</tr>
<tr>
<td>Other Latin American and Caribbean countries</td>
<td>19 (6.0%)</td>
<td>12 (13.0%)</td>
</tr>
</tbody>
</table>
Table 14 (continued)

Demographic Characteristics of the Sample (By Group)

<table>
<thead>
<tr>
<th>Demographic Characteristic</th>
<th>Adjustee Mothers</th>
<th>New-Arrival Mothers</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>(N = 317)</td>
<td>(N = 98)</td>
</tr>
<tr>
<td></td>
<td>n (Percentage)</td>
<td>n (Percentage)</td>
</tr>
<tr>
<td>Maternal race</td>
<td></td>
<td></td>
</tr>
<tr>
<td>White</td>
<td>252 (79.0%)</td>
<td>72 (76.0%)</td>
</tr>
<tr>
<td>Black</td>
<td>11 (4.0%)</td>
<td>14 (15.0%)</td>
</tr>
<tr>
<td>Amerindian</td>
<td>12 (4.0%)</td>
<td>7 (7.0%)</td>
</tr>
<tr>
<td>Maternal ethnicity</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Latina</td>
<td>310 (98.0%)</td>
<td>88 (90.0%)</td>
</tr>
<tr>
<td>Caribbean</td>
<td>7 (2.0%)</td>
<td>10 (10.0%)</td>
</tr>
<tr>
<td>Marital status</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Married</td>
<td>247 (78.0%)</td>
<td>69 (70%)</td>
</tr>
<tr>
<td>Cohabitating</td>
<td>16 (5.0%)</td>
<td>4 (4%)</td>
</tr>
<tr>
<td>Single/divorced/separated/widowed</td>
<td>55 (17.0%)</td>
<td>24 (26%)</td>
</tr>
<tr>
<td>Employment status</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Employed</td>
<td>195 (61.0%)</td>
<td>60 (61.0%)</td>
</tr>
<tr>
<td>Homemaker</td>
<td>86 (27.0%)</td>
<td>19 (20.0%)</td>
</tr>
<tr>
<td>Unemployed</td>
<td>30 (9.0%)</td>
<td>15 (16.0%)</td>
</tr>
<tr>
<td>Student/internship/disabled/other</td>
<td>7 (2.0%)</td>
<td>3 (4.0%)</td>
</tr>
<tr>
<td>Extended-family coresidence</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Parent &amp; child only</td>
<td>229 (72.0%)</td>
<td>15 (15.0%)</td>
</tr>
<tr>
<td>Family &amp; nonparental adults</td>
<td>89 (28.0%)</td>
<td>83 (85.0%)</td>
</tr>
</tbody>
</table>
Tests of Multiple Linear Regression Models (By Group)

To further explore the data and understand differences in parenting practices between the two groups of immigrant mothers, additional regression analyses were re-run for the two groups, but only with the ecological and parenting variables found to be significantly related for the full sample. Demographic variables (child age, maternal age, and annual family income) and ecological variables (years in U.S., English proficiency, extended-family coresidence, and religious involvement) were assessed for their influence on cognitive stimulation, emotional support, strict discipline, and parental school involvement. None of the models for positive control were significant for the full sample.

Regression 7: Cognitive stimulation regressed onto years in the United States, English proficiency, extended-family coresidence, and religious involvement (by group)

Table 15 presents the results for the regression models for adjustee and new-arrival mothers. The overall model for adjustee mothers was significant, $F(7, 309) = 4.66, p < .001$. The model explained approximately 8% of the variance in cognitive stimulation. In this model, English proficiency ($p < .001$) significantly predicted lower levels of cognitive stimulation, and religious involvement ($p < .05$) significantly predicted higher levels of cognitive stimulation for adjustee mothers. There was no evidence of a significant relationship between mothers’ years in the U.S. or extended-family coresidence and the level of cognitive stimulation for adjustee mothers. The overall model for new-arrival mothers was significant, $F(7, 90) = 2.97, p < .01$. The model explained 13% of the variance in cognitive stimulation. For new-arrival mothers, years in the U.S. ($p < .01$) and English proficiency ($p < .05$) significantly predicted lower
levels of cognitive stimulation. There was also no evidence of a significant relationship between extended-family coresidence or mothers’ religious involvement and the level of cognitive stimulation for new-arrival mothers.

Table 15
Summary of Multiple Regression Analyses for Ecological Variables Predicting Cognitive Stimulation (By Group)

<table>
<thead>
<tr>
<th>Variable</th>
<th>Adjustee Mothers&lt;sup&gt;a&lt;/sup&gt; (N = 317)</th>
<th>New-Arrival Mothers&lt;sup&gt;b&lt;/sup&gt; (N = 98)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B</td>
<td>SE</td>
</tr>
<tr>
<td>Child age</td>
<td>-.507</td>
<td>.208</td>
</tr>
<tr>
<td>Maternal age</td>
<td>.016</td>
<td>.166</td>
</tr>
<tr>
<td>Family income</td>
<td>.003</td>
<td>.002</td>
</tr>
<tr>
<td>Years in U.S.</td>
<td>-.010</td>
<td>.016</td>
</tr>
<tr>
<td>English proficiency</td>
<td>-.266</td>
<td>.063</td>
</tr>
<tr>
<td>Extended coresidence</td>
<td>-.024</td>
<td>.086</td>
</tr>
<tr>
<td>Religious involvement</td>
<td>.265</td>
<td>.132</td>
</tr>
</tbody>
</table>

Note: <sup>a</sup>R² = .10. Adj R² = .08. <sup>b</sup>R² = .18. Adj R² = .12.
*<i>p < .05</i>. **<i>p < .01</i>. ***<i>p < .001</i>.

Regression 8: Emotional support regressed onto years in the United States, English proficiency, extended-family coresidence, and religious involvement (by group)

Table 16 presents the results for the regression models for adjustee and new arrival mothers. The overall model for adjustee mothers was significant, \( F(7, 309) = 6.81, p < .001 \). The model explained approximately 11% of the variance in emotional support. The only ecological variable found to be significantly associated with emotional support for adjustee immigrant mothers was religious involvement (<i>p < .05</i>). Adjustee immigrant mothers who had higher levels of religious involvement had lower levels of emotional support. The overall model for new-arrival mothers was significant, \( F(7, 90) = 2.21, p < .05 \). The model explained 8% of the variance for new-arrival mothers. The
control variable child age was the only significant predictor of emotional support in the model. No significant relationship was found between any of the ecological variables and emotional support for new-arrival mothers.

Table 16
Summary of Multiple Regression Analyses for Ecological Variables Predicting Emotional Support (By Group)

<table>
<thead>
<tr>
<th>Variable</th>
<th>Adjustee Mothers(^a) ((N = 317))</th>
<th>New-Arrival Mothers(^b) ((N = 98))</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B  (SE)  (\beta)</td>
<td>B  (SE)  (\beta)</td>
</tr>
<tr>
<td>Child age</td>
<td>.262 (.053) (.279^{***})</td>
<td>.249 (.104) (.246^{*})</td>
</tr>
<tr>
<td>Maternal age</td>
<td>.094 (.042) (.128)</td>
<td>-.075 (.081) (.095)</td>
</tr>
<tr>
<td>Family income</td>
<td>-.001 (.000) (-.055)</td>
<td>-.001 (.001) (-.153)</td>
</tr>
<tr>
<td>Years in U.S.</td>
<td>.002 (.004) (.033)</td>
<td>.000 (.009) (.004)</td>
</tr>
<tr>
<td>English proficiency</td>
<td>-.002 (.016) (-.006)</td>
<td>.046 (.033) (.170)</td>
</tr>
<tr>
<td>Extended coresidence</td>
<td>-.033 (.022) (-.082)</td>
<td>-.009 (.043) (-.023)</td>
</tr>
<tr>
<td>Religious involvement</td>
<td>-.087 (.034) (-.137^{*})</td>
<td>-.061 (.075) (-.084)</td>
</tr>
</tbody>
</table>

Note: \(^a\)\(^R^2 = .13. \ Adj R^2 = .11. \(^b\)\(^R^2 = .15. \ Adj R^2 = .08.\)
\(^*p < .05. \ ***p < .01. \ ***p < .001.\)

Regression 9: Strict punishment regressed onto years in the United States, English proficiency, extended-family coresidence, and religious involvement (by group)

Table 17 presents the results for the regression models for adjustees and new-arrivals. The overall model for adjustee mothers was significant, \(F (7, 309) = 3.95, p < .001.\) This model explained 6% of the variance in strict punishment. The only ecological variable found to be significantly related to strict punishment for adjustee mothers was years in the U.S. Adjustee mothers’ years in the United States significantly predicted strict discipline in that mothers with greater years in the U.S. used fewer strict punishment practices as forms of discipline. The overall model for new-arrival immigrant mothers was not significant, \(F (7, 90) = .789, ns.\) The model explained less than 1% of
the variance in strict punishment. None of the ecological variables significantly predicted strict discipline for the new-arrival mothers.

Table 17

Summary of Multiple Regression Analyses for Ecological Variables Predicting Strict Punishment (By Group)

<table>
<thead>
<tr>
<th>Variable</th>
<th>Adjustee Mothers</th>
<th>New-Arrival Mothers</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>( B )</td>
<td>( SE )</td>
</tr>
<tr>
<td>Child age</td>
<td>-.114</td>
<td>.044</td>
</tr>
<tr>
<td>Maternal age</td>
<td>-.055</td>
<td>.035</td>
</tr>
<tr>
<td>Family income</td>
<td>.000</td>
<td>.000</td>
</tr>
<tr>
<td>Years in U.S.</td>
<td>-.009</td>
<td>.003</td>
</tr>
<tr>
<td>English proficiency</td>
<td>.023</td>
<td>.013</td>
</tr>
<tr>
<td>Extended coresidence</td>
<td>-.014</td>
<td>.013</td>
</tr>
<tr>
<td>Religious involvement</td>
<td>.039</td>
<td>.028</td>
</tr>
</tbody>
</table>

Note: \( ^a R^2 = .08. \) \( Adj R^2 = .06. \) \( ^b R^2 = .06. \) \( Adj R^2 = .02. \)

*\( p < .05. \) **\( p < .01. \) ***\( p < .001. \)

Regression 10: Parental school involvement regressed onto years in the United States, English proficiency, extended-family coresidence, and religious involvement.

Table 18 presents the results of the final regression models for adjustee and new-arrival mothers. The overall model for adjustee mothers was significant, \( F (7, 309) = 3.72, p < .01. \) This model explained 6% of the variance in school involvement. The only ecological variable found to be significantly related to parental school involvement was English proficiency \( (p < .01). \) Adjustee mothers with higher levels of English proficiency are more likely to be involved with their child’s school than mothers with lower levels of
English proficiency. The overall model for new-arrival mothers was not significant, $F (7, 90) = 1.95, p = .07$. This model explained 6% of the variance in school involvement. In the new-arrival model, none of the ecological variables significantly predicted parental school involvement.

Table 18

Summary of Multiple Regression Analyses for Ecological Variables Predicting Parental School Involvement (By Group)

<table>
<thead>
<tr>
<th>Variable</th>
<th>Adjustee Mothers</th>
<th>New-Arrival Mothers</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>$(N = 317)$</td>
<td>$(N = 98)$</td>
</tr>
<tr>
<td>Child age</td>
<td>$.207 .126 .096</td>
<td>$.456 .267 .178</td>
</tr>
<tr>
<td>Maternal age</td>
<td>$.194 .100 .114</td>
<td>-.041 .207 -.020</td>
</tr>
<tr>
<td>Family income</td>
<td>$.000 .001 .015</td>
<td>-.001 .003 -.033</td>
</tr>
<tr>
<td>Years in U.S.</td>
<td>-.011 .010 -.065</td>
<td>-.013 .023 -.072</td>
</tr>
<tr>
<td>English proficiency</td>
<td>$.113 .038 .166**</td>
<td>.049 .085 .073</td>
</tr>
<tr>
<td>Extended coresidence</td>
<td>-.015 .052 -.017</td>
<td>.119 .109 .115</td>
</tr>
<tr>
<td>Religious involvement</td>
<td>-.120 .080 -.082</td>
<td>-.314 .192 -.172</td>
</tr>
</tbody>
</table>

Note: *$R^2 = .08$. Adj $R^2 = .06$. *$R^2 = .13$. Adj $R^2 = .06$. *$p < .05$. **$p < .01$. ***$p < .001.*

Summary

There are several key findings regarding the characteristics and parenting practices of the new immigrant Latina and Caribbean mothers of adolescents in this study. Five hypotheses were stated at the beginning of the chapter and the analyses found mixed support for them. A summary of the hypotheses for research question three, and results for the full sample and by group is provided in Table 19.
### Table 19

**Summary of Major Hypotheses for Research Question 3 and Results for the Full Sample and by Group**

Research Q3. Are selected ecological factors (i.e., acculturation level, extended-family coresidence, and religious involvement) related to mothers' parenting practices in Latin American and Caribbean immigrant families?

<table>
<thead>
<tr>
<th>HYPOTHESIS</th>
<th>RESULTS</th>
<th>GROUP</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Hypothesis 1:</strong> Acculturation, extended-family coresidence, and religious involvement will each be significantly associated with cognitive stimulation.</td>
<td>Not supported. Only one of the ecological variables (English proficiency) is associated with cognitive stimulation, and that association is contrary to expectations (see H1B).</td>
<td>Adjustees: No significant findings. New-arrivals: More years in U.S. significantly predicts lower levels of cognitive stimulation.</td>
</tr>
<tr>
<td>a) More years in U.S. will be associated with higher levels of cognitive stimulation.</td>
<td>Not supported.</td>
<td>Adjustees: No significant findings. New-arrivals: More years in U.S. significantly predicts lower levels of cognitive stimulation.</td>
</tr>
<tr>
<td>b) Higher English proficiency will be associated with higher levels of cognitive stimulation.</td>
<td>Not supported. Contrary to expectations, English proficiency was a significant negative predictor of cognitive stimulation.</td>
<td>Adjustees and New-arrivals: For both groups, higher English proficiency significantly predicted lower levels of cognitive stimulation.</td>
</tr>
<tr>
<td>c) Coresidence will be associated with higher levels of cognitive stimulation.</td>
<td>Not Supported.</td>
<td>Adjustees and New-arrivals: No significant findings.</td>
</tr>
<tr>
<td>d) More religious involvement will be associated with higher levels of cognitive stimulation.</td>
<td>Not supported.</td>
<td>Adjustees: Religious involvement was a significant positive predictor of cognitive stimulation; higher levels of religious involvement significantly predicted more cognitive stimulation. New-arrivals: No significant findings.</td>
</tr>
</tbody>
</table>
Research Q3. Are selected ecological factors (i.e., acculturation level, extended-family coresidence, and religious involvement) related to mothers’ parenting practices in Latin American and Caribbean immigrant families?

<table>
<thead>
<tr>
<th>HYPOTHESIS</th>
<th>FULL SAMPLE</th>
<th>GROUP</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Hypothesis 2:</strong> Acculturation, extended-family coresidence, and religious involvement will each be significantly associated with emotional support.</td>
<td>Not supported. Only one of the ecological variables (religious involvement) is associated with emotional support, and that association is contrary to expectations (see H2D).</td>
<td></td>
</tr>
<tr>
<td>a) More years in the U.S. residence will be associated with lower levels of emotional support.</td>
<td>Not Supported</td>
<td>Adjustees and New-arrivals: No significant findings.</td>
</tr>
<tr>
<td>b) Higher English proficiency will be associated with lower levels of emotional support.</td>
<td>Not Supported</td>
<td>Adjustees and New-arrivals: No significant findings.</td>
</tr>
<tr>
<td>c) Coresidence will be associated with higher levels of emotional support.</td>
<td>Not Supported</td>
<td>Adjustees and New-arrivals: No significant findings.</td>
</tr>
<tr>
<td>d) More religious involvement will be associated with higher levels of emotional support.</td>
<td>Not Supported. Contrary to expectations, religious involvement was a significant negative predictor of emotional support.</td>
<td>Adjustees: Higher levels of religious involvement significantly predicted lower levels of emotional support. New-arrivals: No significant findings.</td>
</tr>
<tr>
<td><strong>Hypothesis 3:</strong> Acculturation, extended-family coresidence, and religious involvement will each be significantly associated with strict punishment.</td>
<td>Partially Supported. Only one of the ecological variables (Years in U.S.) was significantly associated with strict punishment.</td>
<td></td>
</tr>
</tbody>
</table>
Research Q3. Are selected ecological factors (i.e., acculturation level, extended-family coresidence, and religious involvement) related to mothers’ parenting practices in Latin American and Caribbean immigrant families?

<table>
<thead>
<tr>
<th>HYPOTHESIS</th>
<th>FULL SAMPLE</th>
<th>GROUP</th>
</tr>
</thead>
</table>
| a) More years in the U.S. will be associated with less use of strict punishment. | Supported. More years in US, less use of strict punishment. | Adjustees: More years in the U.S., less strict punishment.  
New-arrivals: No significant findings. |
| b) Higher English proficiency will be associated with less strict punishment. | Not Supported                       | Adjustees and New-arrivals: No significant findings. |
| c) Coresidence will be associated with more strict punishment. | Not Supported                       | Adjustees and New-arrivals: No significant findings. |
| d) More religious involvement will be associated with lower levels of strict punishment. | Not Supported                       | Adjustees and New-arrivals: No significant findings. |
| **Hypothesis 4:** Acculturation, extended-family coresidence, and religious involvement will each be significantly associated with positive control. | Not Supported                       |                                            |
| a) More years in the U.S. will be associated with higher levels of positive control. | Not Supported                       | Adjustees and New-arrivals: No significant findings. |
| b) Higher English proficiency will be associated with higher levels of positive control. | Not Supported                       | Adjustees and New-arrivals: No significant findings. |
Research Q3. Are selected ecological factors (i.e., acculturation level, extended-family coresidence, and religious involvement) related to mothers’ parenting practices in Latin American and Caribbean immigrant families?

<table>
<thead>
<tr>
<th>HYPOTHESIS</th>
<th>RESULTS</th>
<th>GROUP</th>
</tr>
</thead>
<tbody>
<tr>
<td>c) Coresidence will be associated with lower levels of positive control.</td>
<td>Not Supported</td>
<td>Adjustees and New-arrivals: No significant findings.</td>
</tr>
<tr>
<td>d) More religious involvement will be associated with higher levels of positive control.</td>
<td>Not Supported</td>
<td>Adjustees and New-arrivals: No significant findings.</td>
</tr>
</tbody>
</table>

**Hypothesis 5:**
Acculturation, extended-family coresidence, and religious involvement will each be significantly associated with parental school involvement.

<table>
<thead>
<tr>
<th>FULL SAMPLE</th>
<th>GROUP</th>
</tr>
</thead>
<tbody>
<tr>
<td>Partially supported. Acculturation (years in the U.S., English proficiency) and religious involvement were significantly associated with parental school involvement.</td>
<td>Adjustees and New-arrivals:</td>
</tr>
<tr>
<td>a) More years in the U.S. will be associated with lower levels of parental school involvement.</td>
<td>Supported. More years in the U.S., less parental school involvement.</td>
</tr>
<tr>
<td>b) Higher English proficiency will be associated with higher levels of parental school involvement.</td>
<td>Supported. Higher English proficiency, more school involvement.</td>
</tr>
<tr>
<td>c) Coresidence with nonparental adults in the household will be associated with higher levels of parental school involvement.</td>
<td>Not supported.</td>
</tr>
<tr>
<td>d) More religious involvement will be associated with lower parental school involvement.</td>
<td>Supported. Higher religious involvement, less school involvement.</td>
</tr>
</tbody>
</table>
CHAPTER V: DISCUSSION

The purpose of this exploratory study was to examine the relationship between individual maternal characteristics, factors in the immediate home, and factors in the broader social environment as potential ecological determinants of parenting practices. This study focused on several elements of parenting among Latina and Caribbean mothers of adolescents, including maternal provision of cognitive stimulation and emotional support, use of both strict punishment and positive control as discipline, and involvement in the adolescent’s school activities. Specifically, this study used a cultural-ecological framework to explore the role of three important factors in predicting maternal parenting practices: the individual-level factor of acculturation, the family-level factor of coresidence with nonparental adults, and the community-level factor of religious involvement.

A large body of literature has documented the relationship between various ecological systems and parenting behavior toward adolescents (e.g., Eamon, 2002; Gunnoe et al., 1999; Hamilton, 2005; Hernandez & Charney, 1998; Hill et al., 2003; Pinderhughes et al., 2000; Zhou, 1997). However, relatively few studies have focused exclusively on the newest immigrants from Latin America and the Caribbean, particularly mothers of adolescents. The current study provided an opportunity to examine Latina and Caribbean immigrant mothers’ parenting practices by using data from a national representative dataset, the New Immigrant Survey (NIS-2003). This study also provided a unique opportunity to examine whether individual-, family-, and community-level factors would negatively or positively predict parenting behavior of new Latina and Caribbean immigrant mothers. This study further contributes to the literature on Latino and
Caribbean immigrant families by exploring parenting behavior and immigrant adjustment status. By considering immigrant adjustment status in conjunction with acculturation, extended-family co-residence, and religious involvement, a clearer picture emerged about how selected ecological factors influence parenting practices. In the subsequent sections, a summary of the findings for characteristics and parenting practices of the sample and how they compare with other studies in the literature, as well as a summary of the findings as tied to the theoretical framework is presented. These presentations are followed by a discussion of the major findings from the study for the influence of the ecological variables on each of the parenting practices.

**Characteristics of Immigrant Latina and Caribbean Mothers**

Ecological models emphasize the need to examine the larger context or ecologies that can influence individual functioning; therefore, it is vital to have an understanding of the backgrounds of the mothers in this study. This study includes information on the marital status, education, employment, household structure, and family income of immigrant mothers of adolescents. Overall, study participants had demographic characteristics similar to those of mothers in other investigations involving immigrant Latino and Caribbean families (e.g. Bradley et al., 2001; Ceballo, 2004; Contreras, Kerns, & Neal-Barnet, 2002; Domenech Rodriguez et al., 2006; Hacker, 2001; Leyendecker & Lamb, 1999; Roopnarine et al., 2006; Shorris, 1992).

More than three fourths of study mothers were married or living with a male partner. Nationally, 68% of Latino and Caribbean families are headed by a married couple, and 28% of Latino and Caribbean families live in female-headed households, whereas 67% of U.S. families are headed by married couples (U.S. Census Bureau,
More than three-fourths of mothers were adjustee immigrants, meaning they were awarded legal permanent resident status after illegal entry into the United States or after expiration of their legal/temporary visa. The remainder were new-arrival immigrants, mothers who physically arrived in the United States with legal permanent residency. On average, mothers in the full sample had approximately 9 years of education. However, new-arrival mothers averaged almost 11 years of education. When compared with Latinos overall, according to the U.S. Census (2003), 43% of adults of Latin American and Caribbean ancestry have less than a high school education. When compared with the native-born US population, 18% of mothers had less than a high school education (U.S. Census, 2003). Regarding employment and income, approximately two thirds of the study mothers were working and had an average family income of $25,805 annually. In comparison, the Congressional Budget Office (2004) indicates that 55 percent of Latin American women were employed in 2003, and the median family income was $34,798 for single households and $37,011 for married-couple households. The median income for non-Latino immigrants from Europe was $53,184 for single-parent households and $58,658 for married-couple households. For new immigrants from Asia, the median income was $61,792 for single-parent households and $66,126 for married-couple households. Thus, based on the educational level or family income of the mothers in this study, these indicators suggest that Latina and Caribbean immigrant mothers have fewer available economic resources than do American families in general or European and Asian immigrant families.
Acculturation, Coresidence, and School Involvement of Study Mothers

On average, mothers have lived in the United States for almost 12 years; however, just under one-fourth have resided in the country for 5 years or less. This finding is consistent with national demographics of immigrant families (U.S. Census Bureau, 2003; Hernandez, 2004). For example, Hernandez (2004) notes that nationally 60% of new immigrant families have a mother who has lived in the United States for less than 15 years. In this study, most mothers reported speaking and understanding English between “not well” and “well,” which indicates that most mothers have some English proficiency. In addition, study mothers reported living with an average of two to three children, including the targeted adolescent child. More than half of mothers reported residing in extended households, with an average of two additional nonparental adults. This finding is consistent with previous research that found it common for immigrant Latino and Caribbean families to reside in households with an additional adult relative or friend, such as a mother, aunt, or nonrelated adult (Blank, 1998; Burr & Mutchler, 1993; Kamo, 2000; Sarkisian et al., 2006; Yearwood, 2001). On average, mothers in this study reported a moderate level of church involvement, indicating that they either have attended church several times since becoming legal permanent residents or are members of a church, synagogue, temple, parish, or mosque, or their child has attended church with them. Given the literature on religion and Latino and Caribbean culture (Hovey, 1999; Skinner et al., 2001; Yearwood, 2001), the Latina and Caribbean mothers in this study appear to exhibit relatively lower rates of religious involvement than expected. However, it should be noted that this measure was time-bound (i.e., based on involvement since becoming legal permanent residents).
Overall, immigrant Latina and Caribbean mothers were more likely to be married, employed, and living with extended family and kin. However, Latina and Caribbean mothers were also less educated than the native-born U.S. population and were more likely to have family incomes below that of other immigrant groups. A number of these findings suggest that the Latino and Caribbean immigrant families in this study occupy a vulnerable ecological niche within U.S. society, which is consistent with current literature on Latino and Caribbean families (Congressional Budget Office, 2004; Contreras, Kerns et al., 2002; Garcia Coll & Szalacha, 2004; Hernandez, 2004; U.S. Census Bureau, 2003).

Summary of Major Findings

In the full sample, four of the five models predicting parenting practices were significant. The overall model predicting use of positive control was not significant; nor were any individual ecological factors predictive of positive control. In each of three of the significant models, only one ecological variable was a significant predictor of the parenting practice, two in the unexpected direction. English proficiency was the only predictor for cognitive stimulation (negatively, the unexpected direction); mothers with better English provided less cognitive stimulation. Religious involvement was the only predictor for emotional support (negatively, the unexpected direction); mothers who were more involved in religious activities provided less cognitive stimulation. Finally, years in the US was the only predictor for use of strict punishment (negatively, the expected direction); mothers who have been in the US longer report less use of strict punishment. In the model predicting parent involvement, all of the ecological variables except coresidence were significant predictors, and all associations were in the expected directions: years in the US was negatively associated (parents who had been in the US
longer were less involved in children’s school activities); English proficiency was positively associated (parents with better English were more involved); and religious involvement was negatively associated (parents with more religious involvement were less involved in school activities). Coresidence was not a significant predictor in any of the models examining parenting practices.

When the sample was split, it was found, as in the full sample, that in the adjustee group the overall models were significant for all parenting practices except positive control. Also, as in the full sample, in the adjustee sample in three of the models predicting parenting practices, only one ecological variable was a significant predictor of the parenting practice: religious involvement was negatively associated with emotional support; years in US was negatively associated with the use of strict punishment; and English proficiency was positively associated with parental school involvement. In the model predicting cognitive stimulation, two ecological variables were significant predictors: English proficiency was negatively associated (mothers with better English provided less stimulation); and religious involvement was positively associated (mothers with more religious involvement provide more cognitive stimulation). In the new-arrival group, only the model predicting cognitive stimulation was significant. The two acculturation factors were the only significant predictors in this model: both years in the US and English proficiency were negatively associated with cognitive stimulation (less acculturated mothers provided more cognitive stimulation). In the following sections, the findings for the full sample and the split groups are discussed in terms of the theoretical framework and extant literature.
Cultural-Ecological Framework

A cultural-ecological framework was used in this study because it addresses the broader social contexts associated with parenting behavior (Bronfenbrenner, 1986; Garcia Coll et al., 1996; Ogbu, 1981). According to the cultural-ecological framework, behavioral outcomes are determined by a complicated set of systems, which are connected to the individual and to each of the other systems. Specifically, Latina and Caribbean mothers of adolescents interact with different environments, such as their family and community. These environments not only shape the mothers’ behavior but also are mutually influenced by the characteristics of the mothers as well as the characteristics of the adolescents. The cultural-ecological framework targeted contextual and cultural factors that affect parenting practices of Latina and Caribbean immigrant mothers. The findings from this study are consistent with the cultural-ecological framework. This study found evidence of the influence of various ecological systems on parenting practices. Specifically, factors such as mothers’ acculturation level and religious involvement and the age of the child directly influenced mothers’ parenting behavior. For example, mothers’ level of acculturation (microsystem) significantly predicted mothers’ use of strict discipline (microsystem) and parental involvement in school activities (mesosystem). In addition, mothers’ level of religious involvement (exosystem) was found to be a moderately strong predictor of mothers’ provision of cognitive stimulation and emotional support (microsystem) and involvement with their adolescents’ school (mesosystem). Moreover, an analysis of data by mothers’ adjustment status (adjustee versus new-arrival) revealed associations between various ecological factors and parenting practices. These findings indicate the need to consider the
influence of interacting systems on parents and children when examining parenting outcomes within immigrant families of diverse cultural, racial, ethnic, and national backgrounds (Garcia Coll & Szalacha, 2004). Understanding how factors at each ecological level (i.e., microsystem, mesosystem, and exosystem) affect optimum parenting behavior has implications for developing future culturally specific interventions and policies that address the challenges faced by an increasing new immigrant population.

Ecological Factors and Parenting Practices

As noted earlier, the current study sought to gain a better understanding of the ecological factors that are significantly related to the parenting behaviors of immigrant Latina and Caribbean mothers of adolescents in the home and school domains. The study examined three ecological factors: acculturation, extended-family coresidence, and religious involvement. Acculturation was examined at the individual level in two ways: years in the United States and English proficiency. Extended-family coresidence and religious involvement were explored at the family level and community level, respectively. Parenting practices were examined in terms of the level of cognitive stimulation and emotional support provided by mothers to the target child, their use of strict punishment and positive control as disciplinary strategies, and both parents’ involvement in school activities. This study found evidence of influences from two of these ecological factors on parenting practices.
Cognitive Stimulation

It was hypothesized that all of the ecological factors would be significantly associated with cognitive stimulation in the home. Contrary to expectations, the findings in the full sample did not support most of the hypotheses. It was expected in this study and has been found in previous studies that mothers with more years in the United States and more English proficiency would provide more cognitive stimulation (Eamon, 2005; Figueroa-Moseley et al., 2006; Hacker, 2001; Schmitz, 2005). In the full sample, only one of the acculturation proxies (English proficiency) was found to be a significant predictor of cognitive stimulation. However, this association occurred in the opposite direction of what was expected. The findings revealed that mothers with higher English proficiency reported less cognitive stimulation than their counterparts with lower English proficiency. When the sample was divided into “adjustee immigrant mothers” and “new-arrival immigrant mothers,” the regression analyses revealed that the negative association between English proficiency and cognitive stimulation was replicated for both groups. The finding in the full sample for the association between years in the US was also replicated for the new-arrival (but not the adjustee) group. Specifically, adjustee immigrant mothers and new-arrival mothers with more English proficiency and new-arrival mothers with more years in the United States provided fewer cognitively stimulating activities, such as special lessons, attending performances, or visiting museums.

These negative associations for the acculturation findings were contrary to expectations. One explanation offered by Garcia Coll and Szalacha (2004) is that, as proxies of acculturation, both years in the United States and English proficiency reflect
not only how well Latin American mothers have acculturated to American society but also how mothers might have developed different parenting priorities based on their increased understanding of the issues and stressors related to this new environment. Furthermore, Roosa et al. (2002) note that parenting practices are guided by a hierarchy of goals shaped by immediate environmental conditions and cultural norms; it is possible that for some immigrant Latina and Caribbean mothers, cognitive stimulation in the home might be a lower parenting priority than preparing adolescents for economic success or ensuring their health and safety. However, adjustee immigrant mothers and new-arrival mothers with less English proficiency might have higher aspirations and hope in regard to the future of their children; and, therefore, are more likely to provide cognitive activities that foster future academic success. Consistent with this view, a recent study by Schmitz (2005) also found that cognitive stimulation by Latina mothers with greater length of residence in the United States consistently declined as the child aged. On the other hand, cognitive stimulation by Latina mothers who used Spanish showed greater increases as the child aged, compared to mothers who spoke Spanish less often. These findings also confirm previous research that has indicated the unexpectedly negative consequences of acculturation to American contexts (Gonzales et al., 2006; Rumbaut, 1999).

An alternative explanation could be that another maternal characteristic correlated with acculturation might be influencing the lower level of cognitive stimulation that was not accounted for in this study. Specifically, a second possibility is based on the suggestion by Bradley et al. (2001) that parental employment background influences not only the types of resources used by parents in providing a cognitively stimulating environment but also parental time availability for children. In addition, Thomas (1995)
points out that limited education creates great impediments to securing higher paying jobs, which requires immigrant adults to work more than 40 hours per week at lower paying jobs in order to provide for their families. Although maternal level of education has been cited in the literature as a strong predictor of cognitive stimulation, in this study it was found not to be significantly correlated to cognitive stimulation, and therefore excluded as a control variable. Additionally, to better understand the results, a post-hoc analysis was conducted with maternal education as a control variable, along with the other selected predictors: child gender, child age, maternal age, family income, years in the US, English proficiency, extended-family coresidence, and religious involvement. Although the overall model predicting cognitive stimulation was significant, there was no evidence of a significant relationship between maternal education and the level of cognitively stimulating activities in the home.

Therefore, it appears reasonable that maternal employment is a stronger explanation for the results in this study, since research indicates that the number of hours a mother works impacts her availability to her children (Bianchi, 2000; Hofferth, 1999; Paulson, 1996). For example, in an analysis of women’s employment and children’s access to parental time, Hofferth (1999) points out that mothers who are employed and spend more time outside the home have less time available to spend with their children, and therefore must choose which parenting behaviors are most conducive to better outcomes for their children. In this study, Latina and Caribbean mothers who have more years in the United States and more English proficiency also have higher levels of employment, which can adversely influence the amount of time mothers spend with their adolescent child. Thus, mothers might have less time for cognitively stimulating activities
inside or outside the home as a consequence of working long hours or several jobs (Bianchi, 2000). However, the analysis did not control for maternal employment, due to the large number of missing information in the dataset on hours worked per week and type of employment.

It was also hypothesized that extended-family coresidence would predict Latina and Caribbean immigrant mothers’ use of cognitively stimulating activities. It was expected that mothers who coresided with nonparental adults would provide more cognitive stimulation. However, coresidence was not a significant predictor of cognitive stimulation in the home. This non-significance in the present study is similar to previous studies that failed to find a significant relationship between coresidence with nonparental adults and maternal parenting behavior (Contreras, 2004; Perez, 1994). Coresidence was measured by the actual number of nonparental adults in the household. Thus, one explanation for the lack of significance might be that the purpose for coresidence and the function of nonparental adults are more important determinants of maternal cognitive stimulation than the actual number of nonparental adults in the household (Dornbusch et al., 1985; Keating-Lefler et al., 2004). It was not possible to examine the influence of the purpose or function of coresidence with this dataset.

Contrary to expectations, religious involvement was not a significant positive predictor of cognitive stimulation in the full sample. It was expected that mothers with more religious involvement would provide a greater number of cognitively stimulating activities than mothers with less religious involvement. This association was found to be positively significant in the post-hoc analysis for adjustee immigrant mothers only. Adjustee immigrant mothers who had higher levels of religious involvement reported a
greater number of cognitively stimulating activities. This significant positive relationship between religious involvement and cognitive stimulation for adjustee immigrant mothers might reflect how well immigrant mothers who have been in the US (vs. newly arrived) are tied to social- religious networks that provide parenting resources and models in the area of cognitive stimulation. This is consistent with previous research that shows that religious involvement by parents has a positive influence on parenting behavior by supporting parents in multiple ways as they adapt to change or crisis (Skinner et al., 2001; Wiley et al., 2002; Yearwood, 2001). Skinner et al. (2001) found in their sample of Latino parents that religious involvement often related to social support availability and therefore served as both a cultural tool that provided meaning to challenging experiences and a practical aid that connected individuals to helpful supports and services. This process might be operative in adjustee mothers who have been in the United States, but not yet observable for new arrivals. A longitudinal analysis of these data is needed to better explore this possibility.

Emotional Support

It was hypothesized that all of the ecological factors would be significantly associated with emotional support. It was expected that mothers with more years in the United States and more English proficiency would provide less emotional support than mothers with fewer years in the United States and less English proficiency. There were no significant findings for the relationship between emotional support and the two acculturation proxies in the full sample; nor were there any significant relationships found in the post hoc group level analyses. One possible explanation for the lack of significance is that mothers in this sample reported a moderately high level of emotional
support, which might be less easily influenced by contextual factors (Bacallao & Smokowski, 2007; Schmitz, 2005). Schmitz (2005) points out that, although cognitively stimulating environments can change based on experiences of racism, discrimination, poverty, employment, and other contextual stressors, mothers’ provision of emotional support might be less influenced by these inhibitive experiences.

It was also hypothesized that coresidence would significantly predict emotional support. It was expected that mothers who coresided with nonparental adults would provide more emotional support. This hypothesis was not supported. This non-significant finding might be explained by the same reasons noted for the lack of significant findings for coresidence and cognitive stimulation, in that it is an artifact of the relatively high number of mothers who coreside with extended-family. It suggests that the nature of the interactions between nonparental adults in the home and mothers might have more influence on parenting practices than merely coresidence (as determined by the actual number of nonparental adults). Another possible explanation for the lack of significance between coresidence and emotional support is that nonparental adults might have a stronger impact on adolescent behavior than on parenting behavior (Dornbusch et al., 1985; Hamilton, 2005; Roosa et al., 2002). More research is necessary to understand how extended-family coresidence influences parents’ provision of emotional support to their children in Latin American immigrant families with adolescents.

It was hypothesized that religious involvement would be a significant positive predictor of emotional support. However, contrary to expectations, religious involvement was a significant negative predictor of emotional support. Interestingly, the study findings revealed that mothers with more religious involvement provided less emotional
support when all of the other control and ecological variables were taken into account. When the sample was split, this significant negative association between religious involvement and emotional support was found only for adjustee immigrant mothers. One explanation for the negative association is that as adolescents age their level of church attendance with their family might decline and they might become more engaged in other activities, such as work or sports, which might limit the amount of time and interaction between mother and child (Feinman, 2001). The more limited amount of time for parent–adolescent interaction then might translate into limited opportunities for parents to provide emotional support.

On the other hand, it is also possible that as immigrant mothers (and in particular adjustee mothers) establish stronger ties to religious networks, these networks might reinforce parents’ needs to provide supervision and rules regarding adolescent autonomy. Thus, Latina and Caribbean immigrant mothers might begin to provide more rules, structure, and supervision of adolescents as their religious involvement increases. At the same time, interactions and influences in other ecological systems, such as peers, schools, and neighborhoods, might also be pushing the adolescent towards more independence or to seek emotional support elsewhere. This mismatch between home and the other environments can create family conflict, which can adversely affect the quality of the parent-child interaction (Rumbaut, 2005), and the level of emotional support provided by mothers (Eamon, 2005). For example, in their qualitative study of immigrant childrearing of Mexican families in North Carolina, Bacallao and Smokowski (2007) noted that mothers who were religious were very restrictive in relation to social activities during adolescence. Many mothers would not allow an adolescent child to go to the movies,
dances, or sporting events without parental or kin supervision, based on the adolescent’s age and perceived dangers in the environment.

**Discipline: Strict Punishment**

It was hypothesized that all of the ecological factors would be significantly associated with the use of strict punishment. It was expected that mothers with more years in the United States and higher English proficiency would report less use of strict punishment. As hypothesized, in the full sample, as mothers’ years in the United States increased, use of strict punishment decreases. However, English proficiency was not found to be a significant predictor of strict discipline practices. In addition, this significant positive association for years in the US was found for adjustee mothers only in the post-hoc analyses. Neither acculturation factor was significant for new-arrival mothers. Adjustee immigrant mothers with more years in the U.S. reported using less strict discipline.

These findings are consistent with other studies demonstrating a link between level of acculturation, measured by years in the United States, and use of less strict discipline by immigrant mothers (e.g., Dumka et al., 1997; Hill et al., 2003; Roopnarine et al., 2006; Zayas & Solari, 1994). These findings are also consistent with previous studies on parenting practices of Latin American and Caribbean immigrant parents (Fontes, 2002; Yearwood, 2001), which suggest that immigrant parents might choose to adopt new practices that ensure their successful survival in the new environment. Zayas and Solari (1994) noted in their analysis of parenting behavior of Latina mothers that, traditionally, when Latino children disobey, their parents use strict discipline, sometimes resorting to physical punishment. However, Fontes (2002) indicated that as parents
become accustomed to the norms and laws of American culture (i.e., child abuse laws), more acculturated mothers use less strict discipline than less acculturated mothers. Yearwood (2001) concluded from her ethnographic study that Caribbean immigrant parents felt that if the government, in the form of social services, had authority over their discipline style or the raising of their children through foster care they would be rendered powerless as parents. Therefore, families evolved toward the dominant-culture discipline style of taking away rewards and incentives rather than resorting to stricter physical discipline. Moreover, the more educated and acculturated the families, the closer their disciplinary norms were to those of the dominant culture. The lack of significant findings for acculturation in the new-arrival group might reflect that they have not yet had sufficient time to adjust their parenting practices in response to now living in environments where there are mainstream taboos for strict punishment.

It was also hypothesized that coresidence and religious involvement would significantly predict the use of strict punishment. It was expected that mothers who coresided with nonparental adults would report more use of strict punishment and mothers who had more religious involvement would report less use of strict punishment. However, there was no significant relationship between coresidence and strict punishment, or religious involvement and strict punishment. One explanation is that both coresidence and religious involvement can indirectly influence parenting behaviors, which were not explored in this study, but has been found in studies on Latina and other minority mothers (Mowbray et al., 2005; Pearce et al., 2003).
Discipline: Positive Control

It was hypothesized that all of the ecological factors would be significant positive predictors of the use of positive control. There were no significant findings for any of the overall models or individual associations between the ecological predictors or control variables and positive control. The lack of variability in the sample might have influenced the lack of significant associations between the selected ecological factors and positive control. It could also be that the variable “positive control” is not developmentally appropriate in that during this developmental stage (preadolescence/adolescence) parental monitoring and supervision are more important predictors of mediational parenting practices than positive control (Ceballo, 2004; Dinh et al., 2002; Eamon, 2005).

Parental School Involvement

A major goal of this study was to identify ecological factors that influence parenting practices in the school domain. It was hypothesized that all of the ecological factors would be significantly related to parental school involvement. It was expected that mothers with more years in the United States would be less involved in school activities. As hypothesized, in the full sample, the findings revealed a significant association between years in the United States and parental school involvement. Mothers with more years in the country were less involved in school activities than mothers with fewer years in the country. There were no significant results for the split-group post hoc analyses.

The significant relationship between more years in the US and less parental school involvement for the full sample can be interpreted in several ways. This finding can be partly explained as a natural progression in the family lifecourse (Azmitia & Brown, 2002; Crosnoe, 2001). Several researchers (Bogenschneider, 1997; Bronstein et
al., 2005; Spera, 2006) have noted that as adolescents move up in grades there is a natural decline of parental participation in school activities, such as teacher meetings, class visits, or volunteering, from elementary to middle school and from middle school to high school. Parents may decide to give adolescents more autonomy and decision-making opportunities in the area of school (Azmitia & Brown, 2002), or parents may feel less competent about the more complex school process and material in junior high and high school and therefore focus their time and attention on other important areas (Hoover-Dempsey & Sandler, 1997). In this study, it is possible that immigrant parents with more years in the United States became less involved over time in school activities in order to focus their attention on the next level of parenting priorities for their maturing adolescent, such as career opportunities and moral development (Azmitia & Brown, 2002; Crosnoe, 2001).

In addition, the results also support the different roles of adolescents in immigrant families (Valenzuela, 1999). Various researchers have advanced the idea that immigrant children can have a significant impact on their immigrant parents’ level of school involvement (Martinez, 2006; Suarez-Orozco & Suarez-Orozco, 2001; Vega et al., 1993). For example, as adolescents become more independent, and master the norms of the new culture, they not only are helpful in assisting mothers with household tasks and the care of younger siblings but they also broker for their parents by translating for them (Valenzuela, 1999). Through their role as “culture brokers,” adolescents in Latino and Caribbean families serve as cross-cultural intermediaries between their parents and the world outside (Chao, 2006). In this study, parents with more years in the United States may be more dependent on their adolescents as cultural brokers, given that children often
acculturate and acquire fluency in English at a faster rate than their parents (Chao, 2006). Moreover, parental school involvement may be low for these groups of parents whose adolescent child translate school information and attend school meetings on their behalf (Garcia Coll et al., 2002). Questions regarding the possible influence of adolescents as cultural brokers and parental involvement in school merit further attention in future research.

On the other hand, a stronger explanation, which is in accordance with the cultural-ecological framework and consistent with findings in more recent studies (Delgado-Caitan, 2004; Garcia Coll et al., 2002; Lopez et al., 2000; Pena, 2000), is the contextual nature of family involvement in schools. It has been argued that Latino and Caribbean immigrant parents have different expectations of what is expected in terms of school involvement. According to Delgado-Caitan (2004), Latino and Caribbean immigrant parents define their role and responsibilities in their adolescents’ education by ensuring food, clothing, shelter, and by socializing their child into the norms and expectations of the family. Moreover, they see schools and teachers as the primary source responsible for the academic development of their adolescents (Delgado-Caitan, 2004). Therefore, it could be that Latino and Caribbean immigrant parents are less likely to participate in traditional school venues, such as open house, parent-teacher conferences, or volunteer drives, which are effective with middle-class European American families (Delgado-Caitan, 2004). It may also be that the types of activities available to immigrant parents who work long hours prevent them from participating in school activities. Moreover, parents who lack fluency in English and who were in the U.S. illegally before obtaining permanent residence may feel uncomfortable in the school environment, due to
their fear of deportation, as well as difficulties in communicating with teachers. As in this study, in a study with three groups of immigrant families, Garcia Coll et al. (2002) found that immigrant Latino families tended to have lower levels of participation than other ethnic groups because of a variety of factors. They concluded that parental involvement of immigrant families is influenced by role definition, parental aspirations, school climate, and barriers related to work schedules, transportation, child care, lack of bilingual staff, and immigration status.

It appears reasonable that immigrant parents with more years in the U.S., who have family issues and differential expectations of the role of the home and the school (Lopez et al., 2000; Pena, 2000), who are also dissatisfied with the types of school involvement activities available to them (Portes & MacLoed, 1996; Steinberg et al., 1992), who are less educated (Duckworth & Sabates, 2005; Moreno & Lopez, 1999; Rumbaut, 2005), and who arrived in the U.S. illegally (Garcia Coll et al., 2002) reported lower levels of school involvement, such as visiting their adolescent child’s classroom, attending school meetings, and volunteering at school than immigrant parents with less years in the U.S., but with fewer barriers. Overall, it is possible that structural conditions combined with cultural traditions to deter parental involvement in school (Garcia Coll et al., 2002).

On the other hand, it was found that different patterns of findings emerged, depending on the operational definition of acculturation. It was hypothesized that greater English proficiency would be associated with more parental school involvement. Despite the lower level of school involvement for the full sample, the findings revealed that mothers with greater English proficiency were more involved in school activities than
mothers with lower levels of English proficiency. In the post-hoc analyses, this positive association held only in the adjustee group. This suggests that a somewhat different process may be at work in the acculturation of Latino and Caribbean immigrants with English proficiency. One possible explanation is that the mothers’ ability to speak and understand English facilitates contact with social and cultural interactions within the larger society. Fluent mothers are able to communicate with their child’s teacher, are more able to understand the academic expectations at school, and are more able to garner resources for their children than mothers with lower levels of English proficiency. Moreover, Latino and Caribbean immigrant parents with greater English proficiency might have more parental efficacy in respect to the education of their children.

These results are consistent with previous research linking higher English proficiency of Mexican and immigrant parents with parental interaction with their child’s school (Pena, 2000; Sanchez & Lopez, 1999). A review of previous research on parental school involvement indicates that language is an important factor that affects immigrant parental participation in school activities such as parent meetings with teachers. For example, Pena (2000) found that language differences and limited English fluency were a primary determinant of parents’ participation in their child’s school. As supported in this current study, Latina and Caribbean mothers with higher levels of English proficiency were more likely to participate in parent meetings with teachers, or contact the school to discuss their child’s progress, than mothers with lower levels of English proficiency. Moreover, more current research reinforces the idea that English proficiency enhances social standing in the United States for Latino and Caribbean immigrants, more than years of residence in the United States (Murguia & Forman, 2003). It has been argued
that immigrant parents who are fluent in English are viewed differently than parents with limited English proficiency. Specifically, Latino and Caribbean parents who speak English are seen as more similar to the majority culture (and not as foreigners), and thus are also viewed as more socially acceptable by teachers. These parents are afforded greater social capital and are better able to understand the school culture; and therefore, are more likely to interact with teachers and the school system (Delgado-Caitan, 2004).

It was also hypothesized that coresidence with nonparental adults would be a significant positive predictor of parental involvement in school activities. Contrary to expectation, coresidence was not a significant predictor of school involvement. It was also hypothesized that more religious involvement would be associated with less school involvement. Consistent with expectations, mothers with more religious involvement were less involved in school activities. In the post hoc group analyses, there were no significant findings. A possible explanation for the full-sample finding is that based on mothers’ educational background and level of comfort within the school context, immigrant mothers who have close ties to religious networks might rely on other network members in their congregation to communicate with teachers or attend meetings regarding their child. In addition, many immigrant families utilize parochial schools (i.e., schools sponsored by religious institutions) rather than public schools and in these instances mothers might participate in religious activities, such as family prayer services, life cycle events, and spiritual retreats, rather than those traditionally labeled as school activities (as measured in this study) and have opportunities to interact with school personnel and get involved in their child’s school on a social level.
Overall, the findings from this exploratory study support a number of the hypotheses regarding the relationship between ecological factors and parenting practices. On the individual level, maternal acculturation was found to significantly predict cognitive stimulation, strict discipline, and parental school involvement. At the community level, religious involvement was found to significantly predict cognitive stimulation, emotional support, and parental school involvement. However, on the family level, a surprising finding from this study was the minimal relationship between extended-family coresidence and parenting practices. Hamilton (2005) points out that isolating the effect of additional adults might require additional information on the reasons for coresidency, as well as the interaction between members of the nuclear family and the nonparental adults in the home.

The lack of significant findings for either acculturation proxy in the new-arrival group suggests that the relationship between acculturation and parental involvement is complex. It should be noted that acculturation theories and researchers typically do not make allowances for the fact that in some countries English is the native language of immigrants and Western values have guided parenting and other familial outcomes. Most research is based on samples of bi-lingual or monolingual-Spanish speakers and may not adequately provide the basis for making predictions for studies in which samples have more language diversity such as in the NIS-2003 cohort. More research is needed to better understand other ecological factors and processes that might underlie new-arrival mothers’ parenting practices.

Moreover, the relationships between acculturation levels and personal, contextual, and involvement factors are complex. The findings from this study indicate that
acculturation is not a simple unidimensional construct whereby more acculturation equals more access to resources and opportunities (Moreno & Lopez, 1999). Latina and Caribbean mothers with fewer years in the United States reported more school involvement; less acculturated Latina and Caribbean mothers also reported more cognitive stimulation. Furthermore, these trends varied on the basis of immigration adjustment status, indicating that mothers with previous immigration status as illegal residents might be less likely to participate in school activities because of a variety of inhibitive experiences. In addition, the finding from this present study suggests the need to further explore the intricate process of acculturation and the cumulative character of adaptation.

Study Limitations

This exploratory study has several limitations that must be taken into consideration. First, the study is a secondary data analysis which limits the researcher to data collected in the original study. The goals of the primary study and the instruments used to collect those data might not best support the exploratory objectives of this secondary study. Specifically, other potentially confounding variables (i.e., emotional support available to mothers, tangible support, depression, and self-efficacy) should perhaps be included when examining the relationship between ecological factors and parental behavior. However, the data included in the NIS-2003 were missing approximately 50% of the cases for variables related to depression and tangible support. Given such a large percentage of missing cases, analyses on these variables would not have been meaningful. Moreover, the researcher was unable to add new items that could better measure acculturation, extended family support within the home, and religious
involvement. In addition, because this secondary data analysis used de-identified data, the researcher did not have the opportunity to access subjects to clarify and correct missing data. Missing data were imputed for the continuous variables and decisions were made to exclude outliers on the basis of statistics, not the actual respondents’ answers. Finally, one of the key goals of the NIS is to assess how social networks of families serve as support; however, the dataset included only questions on financial support. It currently does not include questions on emotional support availability, which refers to having someone to talk with about your problems (Bowsher et al., 1997; House, 1987). This type of support in addition to tangible or instrumental support is important to consider, given the stressors experienced by new immigrants (Ceballo & McLoyd, 2002; Planos et al., 1997).

Second, the study uses mothers’ reports of parenting practices; therefore, the findings cannot be generalized to fathers and/or other male caregivers. However, given that Latino and Caribbean immigrant children and youth are more likely to live in two-parent households, it is important for research to assess the influence of both maternal and paternal factors on parenting practices. There are also limited other data sources (e.g., observational data) on mothers’ parenting practices, so the biases of self-report are also introduced into this study.

Third, a key limitation of this study involves the appropriateness of the parenting behavior measures. It should be noted that some of the items on the cognitive stimulation subscale might be less meaningful for immigrant families than for native-born families. The cognitive subscale does not capture interaction with siblings or extended-family which is associated with development (Bradley et al., 2001). It also does not include
activities such as storytelling in the home or library visits outside the home, which might be more consistent with the cultural context of immigrant families’ parenting practices (Baptiste, 1993; Ceballo, 2004; Fontes, 2002; Leyendecker & Lamb, 1999). In addition, adolescence is a transitional stage marked by family conflict and a decrease in parent-child attachment. The measures of emotional support for the Early Adolescent subscale consist of items that are more developmentally appropriate for younger children. Specifically, mothers’ responsiveness to adolescents, such as engaging in meaningful conversations, is less likely to occur during this developmental stage. Measures that focus on family processes or frequency of discussions regarding personal issues might be more effective in capturing the emotional support construct. The discipline measures (use of strict punishment and use of positive control) also have limitations, such as low levels of reliability, that need to be addressed with respect to their developmental appropriateness in future research.

Fourth, one likely methodological limitation of the study is the measurement of religious involvement. As previously noted, in this study, religious involvement was measured by a cumulative index, which included mothers’ responses to questions regarding their frequency of attendance at religious services since becoming legal permanent residents, their membership status, and their frequency of attendance at religious services with their children. The NIS-2003 did not include information about a time period, so mothers could have responded based on their activity in the past month, year, or some other time period. In addition, no information was solicited about mothers’ interactions with church, temple, synagogue, parish, or mosque members and leaders or their participation in the groups’ activities. Mothers’ level of engagement with,
interaction with, and feelings of acceptance by religious congregation members might be a better way to capture the influence of religious involvement.

Fifth, the lack of statistical support for the hypotheses predicting coresidence’s influence on parenting practices might be due to the statistical analysis used in this study and limitations noted in the dataset. For example, this study’s analysis relied on a linear statistical approach—multiple regression analyses. According to Ceballo and McLoyd (2002), single-level methods are not the most efficient techniques for capturing a “nested” data structure whereby several individuals live in the same environment. The analyses focused on the actual living arrangements of families, rather than the interaction patterns among extended family; therefore, it was not possible to clarify what takes place within extended-family households. Moreover, the dataset does not include measures of those aspects of extended-family coresidence that are most relevant to this unique group of mothers. It might be that the purpose and function of coresidents and the level and type of support provided by nonparental adults in the home are more important than the number of nonparental adults in the home.

Finally, the data set included predominantly Spanish-speaking Latino and Caribbean mothers; therefore, the findings may not be the same in an equivalent sample of Caribbean immigrant mothers from English-speaking countries, such as Jamaica, Barbados, and Trinidad and Tobago. Moreover, caution should be taken in generalizing the results of this study beyond this sample; additional research is needed to further substantiate the findings.
Programmatic and Policy Implications

Despite several limitations, the results of the current study have important implications for practitioners and policy makers. The findings of this exploratory study highlight the importance of placing immigrant parenting practices within a cultural-ecological framework to better understand why parents use certain strategies versus others. According to Roosa et al. (2002), by examining multiple influences on immigrant parenting, practitioners and researchers are less likely to use or recommend interventions designed to fit a stereotype based on single characteristics of the targeted group and are more likely to address the group’s needs. These findings are important given the many challenges that Latina and Caribbean immigrant mothers and children confront based on their ecological niches and historical experiences.

For practitioners, the findings reveal the protective role of religious involvement in the area of cognitive stimulation in the home environment, which indicates the need for interventions that involve not only schools and families, but also religious institutions. Increasing culturally specific programs that link home and school through collaboration with community organizations and religious networks is a crucial step for alleviating the isolation faced by many Latina and Caribbean new immigrant parents, and for enhancing the support systems needed to successfully adapt to their new environment (Garcia Coll & Szalacha, 2004).

In addition, in order to address some of the barriers associated with parental school involvement, school administrators and principals should expand teacher training and teacher time for planning of activities that promote parent participation for limited English speakers. However, this effort must build on a clear understanding of the
contextual factors that inhibit parental involvement. Some immigrant mothers might only want to be involved at superficial levels of school participation activities; however, others might need to see themselves as key partners in their children’s education. To increase parental involvement, school administrators and principals must begin by building trust, creating a welcoming environment, allocating funds for translators, increasing modalities for communicating key information to parents regarding participation, and developing multicultural parent coalitions that keep parents informed.

For policy makers, the findings revealed English proficiency to be a protective factor in the area of school involvement; however, the findings also suggest that the sociohistorical conditions that brought Latino and Caribbean immigrants to the U.S., as well as pre-adjustment immigration status (legal vs. illegal) might play a key role in Latina and Caribbean mothers’ parenting practices. These findings suggest that funding for non-English speaking populations that are most at risk might be better than investment in general parent involvement mandates. Parent education programs that combine instruction in English as a second language with information on school processes and expectations might improve parental involvement by low-participation immigrant groups (Garcia Coll & Szalacha, 2004).

Research Implications

Future research focusing on the relationship between ecological factors and parenting practices of Latina and Caribbean mothers should examine the differences between Latino families and Caribbean families from different cultural, ethnic, and racial backgrounds. Although the majority of Latinas in the current study were of Mexican origin, the parenting strategies of mothers from the Caribbean or Central and South
American countries might vary depending on the reasons for migration or other demographic variables not covered in this investigation. These within-group differences also might influence parenting behavior (Corona et al., 2005).

In addition, future research should explore the role of ecological factors not only as direct predictors of parenting behavior but also as potential moderators or mediators of psychological relationships (Ceballo & McLoyd, 2002). Additional knowledge gained from research on Latin American and Caribbean immigrant families will facilitate greater understanding of the issues specific to this population. Building on the findings of this study to develop a longitudinal study of new-arrival and adjustee immigrant mothers might lead to developing stronger theories and research on which to develop future studies and family interventions.

This study did not find a relationship between extended-family coresidence and parenting behavior. Findings suggest that the association between the presence of nonparental adults in the home and parenting practices is more complex than expected. Future research should continue to look at extended-family coresidence, parenting, and acculturation to better understand the protective and risk factors associated with the immigrant adaptation process. The acculturation proxies used in this study were hypothesized protective factors; yet, some findings were contrary to predictions, suggesting that acculturation mechanisms are complex. There are a number of other acculturation proxies that also need examination in future research such as acculturative stress, parent-child differentials in acculturation, parent-child serial migration, and other such proxies.
Finally, more qualitative research, such as ethnographic studies, should be conducted to better understand current parenting practices among immigrant Latino and Caribbean families. According to Yearwood (2001), qualitative research is both a process and a method of describing a culture in order to understand the people of that culture. Qualitative research, such as that related to ethnography, examines events that contribute to the meaning that people give their experiences, and meaning entails discovering the significance, purpose, and consequences of the event to the individual or group (Denzin, 1992). Before we can fully understand what determines parenting practices among Latina and Caribbean mothers of adolescents, we must first uncover the meaning of parenting practices to this unique group, which qualitative research allows us to explore.

Conclusion

This study used a cultural-ecological framework to explore the role of acculturation, extended-family coresidence, and religious involvement in predicting parenting practices of Latina and Caribbean mothers of adolescents. Overall, the findings support a cultural-ecological view of individual- and community-level influences on parenting practices. Moreover, the findings confirmed the importance of immigrant adjustment status in understanding the influence of multiple ecologies on parenting. At least for this group of Latina and Caribbean mothers, a combination of structural and cultural factors predicted their parenting practices. Culturally specific family interventions that take into account the adaptive cultures of Latin American and Caribbean immigrant families may ultimately increase optimum parenting and enhance child and family well-being.
APPENDIX A: IRB APPROVAL

UNIVERSITY OF MARYLAND
INSTITUTIONAL REVIEW BOARD

Notice: IRB Review Is Not Required Because Research Does Not Involve Human Subjects

Date: February 11, 2007
To: Suzanne M. Randolph, Ph.D.
    Yanique M. Edmond
    Department of Family Studies

From: Roslyn Edson, M.S. IRB Manager
    University of Maryland, College Park

Re: IRB Application #07-0047

Type of Application: Initial

The above-referenced Institutional Review Board (IRB) initial application does not include any activities that meet the Federal definition of research involving human subjects. Specifically, the analysis of data that does not contain individually identifiable information is not research involving human subjects. Individually identifiable data are data for which the identity of the subject is or may readily be ascertained by the investigator or associated with the information. Examples of individually identifiable data include information with a subject’s name and information with a code that links data to a subject’s identity. Since the data do not contain individually identifiable information, the IRB application does not need to be reviewed by the IRB under the requirements of the U. S. Department of Health and Human Services (HHS) regulations in 45 CRR Part 46 and the University’s Federal Wide Assurance. Therefore, the application was not reviewed under exempt, expedited or full Board review procedures. However, if you plan to modify your research to include any of the following activities, you are required to submit an IRB application and obtain prior IRB approval: obtaining data through intervention or interaction with human subjects; obtaining identifiable private information about living individuals; or analyzing identifiable private information about living individuals.

Please contact the IRB Office at 301-405-0678 if you have any IRB-related questions or concerns. Please include the above-cited IRB application number in any future communications with our office regarding this research.
APPENDIX B: NEW IMMIGRANT SURVEY – DEMOGRAPHICS

Cisadjust. **ADJUSTMENT.** Type of admission adjustment:

1. Adjustee immigrant
2. New-arrival immigrant

Statemo. **STATE.** State of Interview.

A6. **GENDER.** I need to ask these questions of everyone, are you male or female?

A7. **AGE.** In what year were you born?

A9a. **COUNTRY OF BIRTH.** In what country were you born?

A9c_X. What is your country of citizenship?

**TYPE OF HOUSEHOLD.** NOW I’D LIKE TO ASK YOU ABOUT THE OTHER PEOPLE IN YOUR HOUSEHOLD

A10. Are you currently living by yourself or with other people?

A11. Including yourself, how many people are currently living in your household?

A15. What is this person’s relationship to you?

A17. I can’t always tell from a name, is this person male or female?

A18_XX. In what year was this person born?

A20. **EDUCATION.** Now, I have a few questions about your education. How many years of schooling in total have you completed?

A52. **MARITAL STATUS.** Are you now?

1. Married
2. Living together in a marriage-like relationship but not Married
3. Separated
4. Divorced
5. Widowed
6. Never married, not living with someone in a marriage like Relationship

A147. In what year was your [husband/spouse] born?

A168_X. How many years of schooling in total did your [husband/wife] complete?
EMPLOYMENT STATUS. NOW, I'M GOING TO ASK YOU SOME QUESTIONS ABOUT YOUR CURRENT EMPLOYMENT SITUATION.

C1. Are you working now, temporarily laid off, unemployed and looking for work, disabled and unable to work, retired, a homemaker or what?

FAMILY INCOME. NOW, I WILL ASK ABOUT YOUR EARNINGS FROM SELF-EMPLOYMENT, WORK AND UNEMPLOYMENT THEN ABOUT YOUR SPOUSE'S OR PARTNER’S.

G5. Before taxes and other deductions, about how much did your self-employment income amount to in the last twelve months, including any profits left in the business?

G7. Before taxes and other deductions, about how much wage and salary income did you receive in the last twelve months?

G9. Before taxes and other deductions, about how much did you receive from a professional practice or trade in the last twelve months?

G11A. Before taxes and other deductions, about how much did your last twelve months of income from tips, bonuses, commission, and etc. amount to?

G14. Before taxes and other deductions, about how much did your spouse or partner’s self-employment income amount to in the last twelve months, including any profits left in the business?

G16. Before taxes and other deductions, about how much wage and salary income did your spouse or partner receive in the last twelve months?

G18. Before taxes and other deductions, about how much did your spouse or partner receive from a professional practice or trade in the last twelve months?

G19. Before taxes and other deductions, about how much did your spouse or partner’s last twelve months of income from tips, bonuses, commission, etc. amount to?

G23. Before taxes and other deductions, about how much did you receive from Unemployment Compensation in the last twelve months?

G28. Before taxes and other deductions, about how much did your spouse or partner receive from Unemployment Compensation in the last twelve months?

G35. Before taxes and other deductions, about how much did you receive from a workman’s compensation program in the last twelve months?

G40. Before taxes and other deductions, about how much did your spouse or partner receive from a workman’s compensation program in the last twelve months?
CULTURAL GROUP AND RACIAL BACKGROUND

K35. Do you consider yourself to be Hispanic or Latino?
   1. Yes
   2. No
   3. Don’t Know
   4. Refused

K36. What race do you consider yourself to be?
   1. Amerindian
   2. Asian
   3. Black, Negro or African American
   4. Native Hawaiian or other Pacific Islander
   5. White
   6. Don’t know
   7. Refused

TARGET CHILD

Mchage1. Child’s age?

APPENDIX C: NEW IMMIGRANT SURVEY – MEASURES

Acculturation

*English Proficiency*

1. J13. How well would you say you understand English when someone is speaking to you?
   
   - Very Well……………………………….………….1
   - Well………………………………………………...2
   - Not Well……………………………………………3
   - Not at All…………………………………………...4

2. J14. How well would you say you speak English?
   
   - Very Well……………………………….………….1
   - Well………………………………………………...2
   - Not Well……………………………………………3
   - Not at All…………………………………………...4

*Length of Residence in U.S.*

1. K3_1R. In what year did you leave your Country of Birth? ____________

2. K6_1. To what country did you move at that time? ________________

*Extended-family coresidence*

1. A11. How many people live in the household? _____

2. A15_X. What is this person’s relationship to you?
APPENDIX C: NEW IMMIGRANT SURVEY – MEASURES
CON’T

Religious Involvement

1. J38o. Since becoming a permanent residence how many times have you attended religious services? _____

2. J39. Do presently consider yourself to be a member of a specific church, parish, temple, synagogue, or mosque in the United States?
   Yes…………………………………………………1
   No………………………………………………...2

3. J55a. Do your children attend the same church, parish, temple, synagogue, or mosque as you do?
   Yes…………………………………………………1
   No………………………………………………...2

Parent Involvement

1. L291. Since the beginning of the school year, have you [or your spouse/partner] attended a school meeting?
   Yes…………………………………………………1
   No………………………………………………...2

2. L292. Since the beginning of the school year, have you [or your spouse/partner] phone or spoken to a teacher or counselor?
   Yes…………………………………………………1
   No………………………………………………...2

3. L293. Since the beginning of the school year, have you [or your spouse/partner] visited your child’s classes?
   Yes…………………………………………………1
   No………………………………………………...2

4. L294. Since the beginning of the school year, have you [or your spouse/partner] volunteered to help at child’s school?
   Yes…………………………………………………1
   No………………………………………………...2
APPENDIX D: NEW IMMIGRANT SURVEY – HOME-SF

Section M: Home Observation for Measurement of the Environment (HOME) – Short Form

From the NLSY79 – 1998, Round 18

PART D: FOR CHILDREN WHO ARE 10 YEARS AND OLDER

MD1. About how many books does [child name] have?
   1. None
   2. 1 to 9
   3. 10 to 19
   4. 20 or more

MD2a. How often is [child name] expected to do each of the following?

   Make (his/her) own bed?
   1. Almost never
   2. Less than half the time
   3. Half the time
   4. More than half the time
   5. Almost always

MD2b. (How often is [child name] expected to do each of the following?)

   Clean (his/her) own room?
   1. Almost never
   2. Less than half the time
   3. Half the time
   4. More than half the time
   5. Almost always

MD2c. (How often is [child name] expected to do each of the following?)

   Pick up after (himself/herself)?
   1. Almost never
   2. Less than half the time
   3. Half the time
   4. More than half the time
   5. Almost always
MD2d. (How often is [child name] expected to do each of the following?)

**Help keep shared living areas clean and straight?**
1. Almost never
2. Less than half the time
3. Half the time
4. More than half the time
5. Almost always

MD2e. (How often is [child name] expected to do each of the following?)

**Do routine chores such as mow the lawn, help with dinner, wash dishes, etc.?**
1. Almost never
2. Less than half the time
3. Half the time
4. More than half the time
5. Almost always

MD2f. (How often is [child name] expected to do each of the following?)

**Help manage (his/her) own time (get up on time, be ready for school, etc.)?**
1. Almost never
2. Less than half the time
3. Half the time
4. More than half the time
5. Almost always

MD3. Is there a musical instrument (for example, piano, drum, guitar, etc.) that [child name] can use here at home?
1. Yes
2. No

MD4. Does your family get a daily newspaper?
1. Yes
2. No

MD5. About how often does [child name] read for enjoyment?
1. Every day
2. Several times a week
3. Several times a month
4. Several times a year
5. Never
6. Don’t know
MD6. Does your family encourage [child name] to start and keep doing hobbies?
   1. Yes
   2. No

MD7. Does [child name] get special lessons or belong to any organization that encourages activities such as sports, music, art, dance, drama, etc.?
   1. Yes
   2. No

MD8. How often has any family member taken or arranged to take [child name] to any type of museum (children’s, scientific, art, historical, etc.) within the past year?
   1. Never
   2. Once or twice
   3. Several times
   4. About once a month
   5. About once a week or more often

MD9. How often has a family member taken or arranged to take [child name] to any type of musical or theatrical performance within the past year?
   1. Never
   2. Once or twice
   3. Several times
   4. About once a month
   5. About once a week or more

MD10. About how often does your whole family get together with relatives or friends?
   1. Once a year or less
   2. A few times a year
   3. About once a month
   4. Two or three times a month
   5. About once a week or more

MD16. About how often does [child name] spend time with (his/her) father, stepfather, or father-figure?
   1. Once a day or more often
   2. At least 4 times a week
   3. About once a week
   4. About once a month
   5. A few times a year or less
   6. Never
   7. No father, stepfather, or father-figure
MD17. About how often does [child name] spend time with (his/her) father, stepfather, or father-figure in outdoor activities?
   1. Once a day or more often
   2. At least 4 times a week
   3. About once a week
   4. About once a month
   5. A few times a year or less
   6. Never
   7. No Father, Stepfather, Or Father-Figure
   8. Don’t Know

MD18. How often does [child name] eat a meal with both mother and father?
   1. More than once a day
   2. Once a day
   3. Several times a week
   4. About once a week
   5. About once a month
   6. Never
   7. No Father, Stepfather, Or Father-Figure

MD19. When your family watches TV together, do you or [child name]'s father (or stepfather or father-figure) discuss TV programs with (him/her)?
   1. Yes
   2. No
   3. Do Not Have A TV

MD21. Sometimes children get so angry at their parents that they say things like "I hate you" or swear in a temper tantrum. Please choose which action(s) you would take if this happened.
   a. Grounding
   b. Spanking
   c. Talk with child
   d. Give him or her household chore
   e. Ignore it
   f. Send to room for more than 1 hour
   g. Take away his/her allowance
   h. Take away TV, phone, or other privileges
   i. Put child in a short "time out"
   j. Is there some other way?
MD22a. If [child name] brought home a report card with grades lower than expected, how likely would you be to contact (his/her) teacher or principal?
   1. Very likely
   2. Somewhat likely
   3. Not sure how likely
   4. Somewhat unlikely
   5. Not at all likely

MD22b. If [child name] brought home a report card with grades lower than expected, how likely would you be to lecture the child?
   1. Very likely
   2. Somewhat likely
   3. Not sure how likely
   4. Somewhat unlikely
   5. Not at all likely

MD22c. If [child name] brought home a report card with grades lower than expected, how likely would you be to keep a closer eye on child's activities?
   1. Very likely
   2. Somewhat likely
   3. Not sure how likely
   4. Somewhat unlikely
   5. Not at all likely

MD22e. If [child name] brought home a report card with grades lower than expected, how likely would you be to talk with the child?
   1. Very likely
   2. Somewhat likely
   3. Not sure how likely
   4. Somewhat unlikely
   5. Not at all likely

MD22g. If [child name] brought home a report card with grades lower than expected, how likely would you be to tell child to spend more time on schoolwork?
   1. Very likely
   2. Somewhat likely
   3. Not sure how likely
   4. Somewhat unlikely
   5. Not at all likely
MD22h. If [child name] brought home a report card with grades lower than expected, how likely would you be to spend more time helping child with schoolwork?
   1. Very likely
   2. Somewhat likely
   3. Not sure how likely
   4. Somewhat unlikely
   5. Not at all likely

MD22i. If [child name] brought home a report card with grades lower than expected, how likely would you be to limit or reduce child's non-school activities (play, sports, clubs, etc.)?
   1. Very likely
   2. Somewhat likely
   3. Not sure how likely
   4. Somewhat unlikely
   5. Not at all likely

Interviewer Observations of Home Environment

All Ages: From Birth to 14 Years

HOME Observations - Part C: 6 Years and Over

CSOB-2C
INTERVIEWER: MOTHER/GUARDIAN) ENCOURAGED CHILD NAME TO CONTRIBUTE TO THE CONVERSATION.
1 YES
0 NO

CSOB-5C
INTERVIEWER: (MOTHER/GUARDIAN) INTRODUCED INTERVIEWER TO CHILD BY NAME.
1 YES
0 NO

CSOB-6C
INTERVIEWER: (MOTHER/GUARDIAN)'S VOICE CONVEYED POSITIVE FEELING ABOUT CHILD NAME.
1 YES
0 NO
## Cognitive Stimulation Subscale

<table>
<thead>
<tr>
<th>NIS QUESTIONS</th>
<th>NIS Question #</th>
<th>Recode</th>
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</thead>
<tbody>
<tr>
<td>HOW MANY BOOKS</td>
<td>MD1</td>
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</tr>
<tr>
<td>MUSICAL INSTRUMENT CHILD CAN USE</td>
<td>MD3</td>
<td>1</td>
</tr>
<tr>
<td>FAMILY GET DAILY NEWSPAPER</td>
<td>MD4</td>
<td>1</td>
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<tr>
<td>HOW OFTEN CHILD READ FOR ENJOYMENT</td>
<td>MD5</td>
<td>1,2</td>
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<tr>
<td>FAMILY ENCOURAGE CHILD START HOBBIES</td>
<td>MD6</td>
<td>1</td>
</tr>
<tr>
<td>CHILD GET SPECIAL LESSONS</td>
<td>MD7</td>
<td>1</td>
</tr>
<tr>
<td>HOW OFTEN FAMILY TAKE CHILD TO MUSEUM</td>
<td>MD8</td>
<td>2-5</td>
</tr>
<tr>
<td>HOW OFTEN FAMILY TAKE TO PERFORMANCE</td>
<td>MD9</td>
<td>2-5</td>
</tr>
<tr>
<td>DISCUSS TV PROGRAM WITH CHILD</td>
<td>MD19</td>
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### Emotional Support Subscale

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<th>Recode</th>
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<th>0 = NO</th>
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<tr>
<td>HOW OFTEN CHILD EXPECTED MAKE BED</td>
<td>MD2A</td>
<td>2-5</td>
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<tr>
<td>HOW OFTEN CHILD EXPECTED CLEAN ROOM</td>
<td>MD2B</td>
<td>2-5</td>
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<tr>
<td>HOW OFTEN CHILD PICK UP AFTER SELF</td>
<td>MD2C</td>
<td>2-5</td>
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<tr>
<td>HOW OFTEN CHILD KEEP AREAS CLEAN</td>
<td>MD2D</td>
<td>2-5</td>
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<tr>
<td>HOW OFTEN CHILD DO ROUTINE CHORES</td>
<td>MD2E</td>
<td>2-5</td>
<td>1</td>
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<tr>
<td>HOW OFTEN CHILD HELP MANAGE TIME</td>
<td>MD2F</td>
<td>2-5</td>
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<tr>
<td>HOW OFTEN CHILD SPEND TIME FATHER</td>
<td>MD16</td>
<td>1,2</td>
<td>3-7</td>
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<tr>
<td>HOW OFTEN OUTDOOR ACTIVITIES FATHER</td>
<td>MD17</td>
<td>1-3</td>
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<td>HOW OFTEN CHILD EAT WITH BOTH PARENT</td>
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<td>MOTHER ENCOURAGED CONVERSATION</td>
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<td>MOTHER VOICE CONVEYED POSITIVE</td>
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## Discipline Subscale: Strict Punishment

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<td>GROUNDING FOR TEMPER TANTRUM</td>
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<td>SPANKING FOR TEMPER TANTRUM</td>
<td>MD21B</td>
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<tr>
<td>HOUSEHOLD CHORES FOR TEMPER TANTRUM</td>
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<td>SEND TO ROOM FOR MORE THAN 1 HR FOR TEMPER TANTRUM</td>
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<td>1 0</td>
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<td>TAKE AWAY ALLOWANCE FOR TEMPER TANTRUM</td>
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<td>1 0</td>
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<tr>
<td>TAKE AWAY TV OR PRIVILEGES FOR TEMPER TANTRUM</td>
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<td>1 0</td>
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<tr>
<td>SHORT TIME OUT FOR TEMPER TANTRUM</td>
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<td>1 0</td>
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<td>Recode</td>
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<td>LOW GRADE - CONTACT TEACHER</td>
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<td>LOW GRADE - LECTURE CHILD</td>
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<tr>
<td>LOW GRADE – KEEP CLOSER EYE ON CHILD</td>
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<tr>
<td>LOW GRADE – TALK TO CHILD</td>
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<td>LOW GRADE – TELL CHILD SPEND MORE TIME ON HOMEWORK</td>
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<td>LOW GRADE – LIMIT NONSCHOOL ACTIVITIES</td>
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REFERENCES


