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**BEST FRIENDS' CULTURAL ORIENTATION AS A MEDIATOR BETWEEN  
FAMILIAL ETHNIC SOCIALIZATION AND ETHNIC IDENTITY  
AMONG MEXICAN-ORIGIN ADOLESCENT GIRLS**

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## ABSTRACT

Research indicates that ethnic identity (EI) protects minority youth on various indicators of adjustment, but with the exception of studies on familial ethnic socialization (FES) there is a dearth of research pertaining to contextual influences on EI development. Using a sample of Mexican-origin adolescent girls, the current study examined best friends' Mexican cultural orientation as a mediator between FES and EI using a three-wave longitudinal design. Moreover, age and generational differences in this mediation were explored. Analyses revealed that FES promoted adolescent EI 3.5 years later, but that this effect was mediated by best friends' Mexican cultural orientation. In addition, no significant group differences were found across age or generational status groups, which suggests that the mediational process holds across adolescence and generational statuses. This study highlights the contribution of peer context to EI development and its role in the process by which FES influences EI development during adolescence.

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## INTRODUCTION

The American youth population is undergoing a major change. Minorities already constituted 32% of the U.S. population under the age of 20 by 1990. Current population estimates suggest that this number has now grown close to 50% (Johnson, Schaefer, Lichter, & Rogers, 2014). As the nation's youth continues to diversify, the role of race and ethnicity on development has become an important area of study not only for understanding normative development among minority youth, but also for predicting the future trajectory of the U.S. population. One of the important mechanisms through which race and ethnicity have been theorized to affect minority youth development is *Ethnic identity*, or an individual's sense of belonging to one's ethnic group. A large body of research indicates that ethnic identity has the potential to protect minority youth from the various chronic social stressors they face in society. Ethnic identity has been linked to higher self-esteem (Umaña-Taylor, Diversi, & Fine, 2002), higher academic achievement (Smith, Walker, Fields, Brookins, & Seay, 1999), stronger anti-drug norms (Marsiglia, Kulis, Hecht, & Sills, 2004), and lower levels of depression (Wong, Eccles, & Sameroff, 2003).

Despite all the work on the salubrious effects of ethnic identity, we know surprisingly little about how ethnic identity develops, and even less of the contextual factors that may influence ethnic identity development (Umaña-Taylor & Fine, 2004). Studies that exist tend to focus primarily on the role that ethnic socialization within family (i.e., how family environment passes on values and perspectives about ethnicity and race to children) has on ethnic identity (Umaña-Taylor & Fine, 2004). Although important, this research direction contrasts with what theorists have proposed on the development of ethnic identity: mainly that ethnic identity is derivative of multiple contextual factors in which individuals' lives are embedded, including

peers, school, and community (García Coll et al., 1996; Knight, Bernal, Garza, Cota, & Ocampo, 1993). Of these factors, the omission of peers is particularly glaring, given that identity formation is a task of adolescence (Erikson, 1968), a period in life when peer context becomes increasingly important (Collins & Laursen, 2004). Moreover, because of the interrelations between family and peer systems (Parke & Ladd, 1992), the peer context may serve as a bridge between familial influences and ethnic identity development. This may be particularly true for girls, as research indicates that girls exhibit more affiliative needs than boys (Cyranowski et al., 2000; Nolen-Hoeksema & Girgus, 1994; Rudolph, 2002), and this stronger relation-orientation could make peer influence particularly salient for girls' ethnic identity development.

The present study aims to move our understanding of ethnic identity development forward by examining how the peer context may inform the association between familial ethnic socialization and ethnic identity development. Using a sample of Mexican-origin adolescent girls, this study focused on whether the peer context mediated the relationship between familial ethnic socialization and ethnic identity development. In addition, it examined whether these associations varied as a function of age and nativity status of participants.

### **Latino Youth of Mexican-Origin**

Among the U.S. ethnic minority youth population, Latinos are the largest and the fastest growing segment, constituting approximately 60% of those under the age of 20 and accounting for nearly 75% of its growth between 2000 and 2012 (Johnson, Schaefer, Lichter, & Rogers, 2014). Given this share of growth, it is not surprising that Latino scholarship stands at the forefront of the ethnic identity literature. However, a more important reason to study a potential resilience factor like ethnic identity among Latino youth may be the various risk factors that they face. Compared to non-Latino whites, Latino youth engage in considerably more health risk

behaviors, such as unprotected sex (42%, a rate 26% higher than non-Latino Whites), lifetime cocaine use (11%, a rate 600% higher than non-Latino Whites), and attempted suicide (10%, a rate 86% higher than non-Latino Whites) (Kuperminc, Wilkins, Roche, & Alvarez-Jimenez, 2009). Latino youth are also beset by a number of sociological challenges, such as disproportionate rates of poverty and high reports of discrimination. More Latino children live in poverty than children of any other racial or ethnic group in America (Lopez & Velasco, 2011). A substantial number of Latinos (30-31%) experience discrimination (Brodie, Steffenson, Valdez, Levin, & Suro, 2002; Pérez, Fortuna, & Alegria, 2008), and recent reports suggest that these rates are only increasing (Torres, Yznaga, & Moore, 2011).

The current study focused on Latino youth of Mexican-origin. As past scholars have noted, Latino subpopulations are highly heterogeneous and studies are frequently conducted by identifying subgroups according to demographic characteristics such as country of origin (Quintana & Scull, 2009). Mexican-origin individuals accounted for nearly two-thirds (64%) of the U.S. Latino population in 2012 (Gonzalez-Barrera & Lopez, 2013). Furthermore, due to the younger median age of Mexican immigrants and their significantly higher birth rates, the U.S. Mexican-origin population is younger than the combined Latino population, constituting approximately 70% of Latinos under the age of 18 (*ibid.*).

Mexican-origin youth are also exposed to a number of risk factors that are disproportionate even when compared to the rest of the U.S. Latino population. Mexican-origin youth are more disadvantaged than other Latino youth, with a higher rate of poverty (27% vs 25% of all Latinos) (Gonzalez-Barrera, & Lopez, 2013) and the highest high school dropout rates (Frase, 1989). Mexican-origin youth also exhibit higher rates of certain risky behaviors, such as early initiation of sexual intercourse and teenage pregnancy (Cepeda & Valdez, 2003).

In short, Mexican-origin youth are a largely represented segment of what is already the fastest-growing ethnic minority group in the United States, and their less than optimistic prospects warrant a close examination of potential resilience factors like ethnic identity.

### **Ethnic Identity and Its Connection to Resilience**

*Ethnic identity* is a multi-dimensional construct that includes both the process and affect of an ethnic group membership. The concept of process is derived from Erikson's (1968) theory of ego identity development, which posited that identity develops through a process of *exploration* and *resolution* that appears in one's life as a series of crises. Under the Eriksonian framework, ethnic identity theorists contend that individuals also develop their sense of ethnic group membership through a similar process of exploration and resolution. The concept of affect, on the other hand, is derived from Tajfel's (1981) social identity theory (SIT), which described the psychological sequelae of identifying with a social group. The theory proposed that being a member of a group is an important facet of identity for individuals, and that in order to increase self-esteem individuals enhance the status of the group to which they belong. This affective component of group membership is distinguishable from the process of identity development, as it pertains to the degree to which individuals attach positive or negative feelings toward their group. Therefore, ethnic identity *affirmation* is studied as a separate dimension in the construct of ethnic identity (Phinney, 1992).

A strong sense of ethnic identity is theorized to protect minority youth by providing them access to social and psychological resources associated with an ethnic group membership (Altschul, Oyserman, & Bybee, 2006; Bracey, Bámaca, & Umaña-Taylor, 2004). Some scholars also suggest that a strong ethnic identity may be particularly beneficial to stigmatized groups like Latinos, because SIT posits that in the face of adversity, individuals undergo a psychological

transformation to enhance their self-esteem by raising the group's social standing (Quintana & Scull, 2009). Indeed, empirical studies have demonstrated that ethnic identity among U.S. Latino adolescents is linked with higher self-esteem (Bracey et al., 2004; Cavazos-Rehg & DeLucia-Waack, 2009), better coping skills (Umaña-Taylor, Vargas-Chanes, Garcia, & Gonzales-Backen, 2008), and a sense of mastery and optimism (Roberts et al., 1999). Moreover, in the face of discrimination, high ethnic affirmation appeared to neutralize discrimination's negative impact on self-esteem for Latino youth (Romero & Roberts, 2003), and ethnic identity resolution predicted proactive coping against discrimination (Umaña-Taylor et al., 2008). In addition to protecting adolescents against ethnic-related stresses, ethnic regard (similar to ethnic identity affirmation) was also shown to buffer daily stressors' impact on adolescents' happiness, above and beyond the influence of self-esteem (Kiang, Yip, Gonzales-Backen, Witkow, & Fuligni, 2006).

### **Ethnic Identity Development and Early Influences of Family**

Scholars contend that ethnic identity exists only in rudimentary form during early childhood, as a self-label along with attitudes derived largely from one's parents (Knight et al., 1993). As "children's first and primary teachers" (Hughes, 2003, p. 15), parents play a vital role in ethnic identity development of their children, and studies consistently find that cultural socialization is a key aspect of child rearing among ethnic minority families. Ethnographic research has documented that both immigrant and U.S.-born Asian and Latino families regularly transmit their cultural values, beliefs, and practices to their children through daily routines, use of native language, and observance of cultural traditions (Hughes et al., 2006).

In empirical research, the mechanism by which information regarding race or ethnicity is transmitted from adults to children is referred to as *ethnic socialization* (Hughes et al., 2006).

There is not one agreed upon operationalization of the ethnic socialization construct that is universally used (Hughes and colleagues identify four emergent themes; see Hughes et al., 2006 for a discussion), but the current study utilized Umaña-Taylor and Fine's (2004) operationalization of the construct, which identifies two approaches by which families ethnically socialize their children. *Overt familial ethnic socialization* refers to direct attempts, such as talking about heritage values and beliefs; *covert familial ethnic socialization* refers to indirect attempts, such as celebrating ethnic holidays or decorating homes with objects from the native country (Umaña-Taylor & Fine, 2004).

In early and middle childhood, ethnic socialization has been associated with children's knowledge about their ethnicity and in-group attitudes. An investigation that examined ethnic socialization as a mediator between family background (acculturation/enculturation and nativity) and children's ethnic identity (an earlier conceptualization which included five separate indices) found that parental transmissions of ethnic pride and cultural knowledge were significantly associated with children's knowledge of Mexican culture and their preference for Mexican behaviors (Knight et al., 1993). Similarly, Quintana and Vera (1999) found that parental levels of acculturation predicted the extent to which they ethnically socialized their children, which in turn was associated with children's ethnic knowledge and their manifestation of behaviors that were reflective of Mexican culture.

### **Ethnic Identity Development During Adolescence**

Although ethnic identity is believed to have its beginnings in early childhood, many theorists believe that it is not formally conceptualized in individuals until adolescence (Phinney, 1993). According to Quintana and Scull's (2009) review of the ontological development of ethnic identity using the theory of ethnic perspective-taking ability (EPTA, Quintana, 1994,

1999), children's understanding of ethnic identity develops in tandem with their social cognition; and it is not until late childhood to early adolescence that children attain the cognitive and social maturity to consider abstract concepts such as race and ethnicity, and to weigh competing sets of values and ideals that differentiate ethnic groups (Marcia, 1994; Phinney, 1992; Umaña-Taylor & Fine, 2004). With this new level of maturity, Quintana contends that adolescents attain the *group perspective of ethnicity*, by which they come to understand that individual events of discrimination and abstract concepts like societal attitude are inseparable (Quintana, 1994, 1999).

While research clearly identifies adolescence as the life stage when significant development of ethnic identity take place (Altschul, Oyserman, & Bybee, 2006; Pahl & Way, 2006; Whitesell, Mitchell, Kaufman & Spicer, 2006), findings are mixed when it comes to the factors that contribute to ethnic identity development past childhood. Although some studies (e.g., Phinney & Chavira, 1995; Umaña-Taylor & Fine, 2004) have found associations between familial ethnic socialization and indicators of ethnic identity among adolescents that were similar to those found in studies during childhood, there is evidence which suggests that the influence of family may wane as children grow older. A study that examined the use of Spanish in family along with indicators of ethnic identity among college students found that the association did not exist (Ontai-Grzebik & Raffaelli, 2004). Other evidence suggests that familial influence on ethnic identity development may not be waning, but is merely channeled through a less familiar path. For instance, a study that examined parental cultural maintenance and ethnic identity development among adolescents found that cultural maintenance contributed indirectly to adolescents' ethnic identity development by increasing their native language proficiency (Phinney, Romero, Nava, & Huang, 2001).

Another way in which families may indirectly influence adolescents' ethnic identity is

through their influence over adolescents' peer relationships. Friends are an importance agent of socialization for children as they enter adolescence. During these formative years, friends not only shape children's values and beliefs but also influence them on a wide range of developmental domains, including social identity and competence (Brown & Larson, 2009). If indeed families impact youth ethnic identity development through their influence over peer relationships, the fading association between familial ethnic socialization and ethnic identity development during adolescence may have another explanation. It may be that what is observed is not the reducing influence of families but the growing influence of mediating factors such as peers.

### **Familial Influence on Cultural Orientation of Peers**

Whereas theories on ethnic identity development do recognize the importance of peers, empirical evidence of their influence is scarce. This may be partly due to a lack of constructs or operationalizations that legitimize the role of peer as an ethnic identity socialization agent, in a manner similar to what familial ethnic socialization does for the role of family. In absence of a validated peer ethnic socialization construct, this study utilizes the cultural orientation of peers as a proxy for peer ethnic socialization influence. This approach is in line with earlier ethnic identity literature, which used parental enculturation as a proxy for ethnic socialization of children (Quintana & Vera, 1999).

Theoretical literature identifies two mechanisms by which families may influence the cultural orientation of peers, which in turn may contribute to adolescent ethnic identity development. The first mechanism is through peer selection. Parke and colleagues' (1994) Tripartite Model of Family-Peer Relationships posits that parenting influences the formation and maintenance of peer relationships directly through instructional activities (e.g., giving advice)

and provision of opportunities (e.g., monitoring of social activities, interacting with their children and peers), and indirectly through attachment (Cohn, Patterson, & Christopoulos, 1991), parenting style (Putallaz & Heflin, 1990), and parental encouragement (Brown, Mounts, Lamborn, & Steinberg, 1993). Ethnic minority family members—especially parents—may manage children’s friendship by placing rules and limitations on who their children hangs out with (Brown, Alvarez, & Quijada, 1999). Empirical evidence of ethnic parents’ management of peer ethnicity and culture is existent but scarce. One study found that African-American and Latino parents actively encouraged their children to have same-ethnic friendships and cautioned them against cross-ethnic romantic relationships (Brown, Hamm, & Meyerson, 1996). Although another study found that African-American parents did not discourage their children from cross-ethnic friendship, they still expressed more concerns than white parents and prepared their children to cope with potential discrimination in cross-ethnic contacts (Hamm, 2001). Finally, a study on peer cultural orientation found that Mexican American parents showed more support for children’s friendships when youth perceived their friends to have stronger ties to Mexican culture (Updegraff, Kim, Killoren, & Thayer, 2010).

In addition to influencing children’s choice of friends, Mexican-origin families may also influence the cultural orientation of peers directly through a process akin to ethnic socialization of their children. Since Mexican culture places a great value on family cohesiveness (Cauce & Domenech-Rodríguez, 2002), Mexican-origin parents are likely to get involved in children’s friendships, especially by inviting their friends to join in on family activities. Qualitative research showed that Mexican American parents expected youth to bring close friends home to meet the family and to participate in family activities, as a way of showing support for the friendship (Brown et al., 1999). By exposing youth’s peers to family activities, it is possible that

Mexican-origin families increase peers' knowledge of Mexican culture and as a consequence foster them to embrace it.

### **Peer Influence on Ethnic Identity Development**

Both theory and empirical studies demonstrate that socially interacting with peers from the same ethnic group has a positive influence on ethnic identity (Phinney, Romero, Nava, & Huang, 2001). This may be because social interactions can provide a means by which ethnicity is experienced and expressed (Alba, 1990). Moreover, same-ethnic peers may be likely to speak the ethnic language and thereby raise ethnic language proficiency, which may in turn promote ethnic identity development. Interaction with same-ethnic peers may include: ethnic exploration of activities such as learning histories, engaging in cultural activities, and talking about issues related to one's racial/ethnic group—all of which resemble familial ethnic socialization practices documented in extant literature. A recent study examined the specific activities in which adolescents explored their ethnic identity with peers, using a diverse sample of Latino, Asian American, and European American young adults (Kiang & Fuligni, 2009). The study found that whereas all racial/ethnic groups reported engaging in racial/ethnic exploration at least once in a while with both same-race and cross-race friends, it occurred more frequently with their same-race friends compared with their cross-race friends.

Despite the evidence on the positive influence that same-ethnic friendship has on ethnic identity development, there has been no investigation on a similar influence that peer cultural orientation may have on ethnic identity development. This is unfortunate because ethnicity of a peer may not necessarily be the best predictor of cultural domains. Same-ethnic peers may be more or less oriented toward Mexican culture, as peers of other ethnicities may have varying levels of attitudes and affects toward Mexican culture.

Ting-Toomey (1981) summarized two psychological mechanisms that are helpful in understanding how peer cultural orientation may influence ethnic identity development. The first mechanism is Berger and Calabrese's (1975) uncertainty reduction theory, which proposed that in relationships, communication functions to reduce uncertainty between people and to create more similarity between them, which in turn increases intimacy. It is conceivable, therefore, that communicating with friends high on Mexican cultural orientation may foster or reinforce the same orientation in the adolescent and facilitate their ethnic identity development. The second mechanism is the social validation of self through close relationships (Wright, 1978; Bailey, Finney, & Helm, 1975; Chambliss, 1965). Ting-Toomey argued that socializing with friends with the same cultural orientation may offer adolescents a positive appraisal of their ethnic membership and culture, which in turn could validate their ethnic identity.

### **Sociocultural Factors on Ethnic Identity Development**

The current study examined the role of age and generational status as potential moderators of the associations among familial ethnic socialization (FES), best friends' Mexican cultural orientation, and ethnic identity (EI). In review of the finding of decreased association between FES and EI during adolescence (Ontai-Grzebek & Raffaelli, 2004) and of the literature on the salience of peer relationships during adolescence (Laursen & Bukowski, 1997), it is conceivable that the effect of FES on EI will be weaker and the effect of best friend's Mexican culture orientation on EI will be stronger as adolescents age. Moreover, because of the increasing distance between the peer context and family context as adolescents grow older, the effect of FES on best friend's cultural orientation may be stronger for younger than older adolescents.

So far, there have been inconsistent findings on whether ethnic identity development

varies by generational status (Supple, Ghazarian, Frabutt, Plunkett, & Sands, 2006; Umaña-Taylor, Alfaro, Bámaca, & Guimond, 2009). This inconsistency may be the result of a methodological limitation—of using mean value comparison of ethnic identity rather than comparing true developmental differences using a longitudinal sample. According to the ecological theory (Bronfenbrenner, 1992), distal family characteristics such as generational status will influence adolescent development through more proximal processes such as familial ethnic socialization (Umaña-Taylor et al., 2009). In addition, because first-generation Mexican-origin youth are likely to have a “dual frame of reference,” meaning that they may have first-hand knowledge about life in both U.S. and Mexico (Suárez-Orozco & Suárez-Orozco, 2001), they may feel more intrinsically attached to Mexican culture than U.S.-born youth. Therefore, socializing agents such as FES and best friends’ cultural orientation may carry more significance for the ethnic identity formation of U.S.-born youth. To that end, the current study explored whether the contribution of FES and best friend’s cultural orientation on Mexican-origin youth’s ethnic identity development differed as a function of generational status.

### **Current Study**

The primary goal of this study was to investigate how the socializing agents of family and peers influence ethnic identity development among Mexican-origin female adolescents, by examining the influences of familial ethnic socialization (FES) and best friend’s orientation toward Mexican culture on ethnic identity (EI). These associations were investigated by using a 3-wave longitudinal design, with prior levels of ethnic identity controlled at Wave 1 in order to avoid spuriously inflated estimates of the causal paths. The three dimensions of ethnic identity—exploration, resolution, and affirmation—were investigated independently, as they represent distinguishable aspects of EI development and affect. Potential moderating effects of

age and generational status were also examined. The sample comprised of two age groups (the younger group which was first assessed at 7<sup>th</sup> grade, and the older, at 10<sup>th</sup> grade) and two generational status groups. The following hypotheses were developed:

H1: FES at Wave 1 and best friend's Mexican cultural orientation at Wave 2 would predict EI exploration, resolution, and affirmation at Wave 3.

H2: Best friend's Mexican cultural orientation at Wave 2 would mediate the association between FES at Wave 1 and the three components of EI at Wave 3, such that the link between FES at Wave 1 and EI at Wave 3 would be no longer significant.

H3: The strength of the associations in the mediational model would differ for younger and older adolescent groups. Specifically, FES's associations with best friend's cultural orientation and with EI would become weaker, whereas the association between best friend's cultural orientation and ethnic identity would become stronger among the older adolescent group compared to the younger adolescent group.

H4: The strength of the associations in the mediational model would differ across generational statuses. Specifically, the association between FES and EI and the association between best friend's cultural orientation and EI would be stronger for later generations.

## **METHODS**

### **Participants and Procedure**

Data were drawn from a longitudinal study on cultural and developmental processes and psychological well-being of Mexican-origin female adolescents. The larger project recruited female participants (and their mothers) because of its main focus on depressive symptomatology, which has traditionally been higher for females in the general population as well as in the Mexican-origin youth population (Bámaca-Colbert, Umaña-Taylor, & Gayles, 2012). A total of

338 adolescent girls were recruited from 10 public schools (4 middle schools and 6 high schools) with high concentrations of Latino students (i.e., 67% to 88% of total student population) in a large Southwestern city in the United States. For the current study, only data from participants who completed at least 2 waves of data collection were included to address the issue of missing data. The final sample consisted of 279 participants, whose sample descriptives were as follows.

At Wave 1, participants were either in 7th grade with a range in age from 12 to 14 years ( $n = 143$ ;  $M = 12.25$ ,  $SD = .45$ ) or 10th grade with a range in age from 14 to 16 years ( $n = 136$ ;  $M = 15.21$ ,  $SD = .43$ ). In total, 64.3% of 7th and 61.3% of 10th graders reported living with both parents, which mirrors the national average of Latino children in two-parent households (i.e., 61%; Kreider, 2008). For the current study, the participants who were in 7th grade at Wave 1 are referred to as the younger adolescent group, and the participants who were in 10th grade at Wave 1 are referred to as the older adolescent group.

The original study plan included three generational statuses—first generation (parents and children born in Mexico), second generation (children born in the United States with at least one foreign-born parent), and the third plus (children who were born in the United States with both parents native born)—but given the small sample size of the 3<sup>rd</sup>+ generation group, it was combined with the 2<sup>nd</sup> generation group for the purposes of this study. Among the younger adolescent group, 27% were 1<sup>st</sup> generation, 62% were 2<sup>nd</sup> generation, and 8% were 3<sup>rd</sup> generation. Among the older adolescent group, these numbers slightly varied as 31% were 1<sup>st</sup> generation, 57% were 2<sup>nd</sup> generation, and 11% were 3<sup>rd</sup> generation. Overall, 71.3% of the participants reported being U.S.-born.

To be eligible to participate, both mothers and adolescents had to be of Mexican descent. The original data collection procedure for the adolescents consisted of a self-administered survey

in school at Wave 1, followed by two more assessments that were mailed to the participants' homes. The interval between Wave 1 and Wave 2 was approximately 2 ½ years; the interval between Wave 2 and Wave 3 was approximately 1 year. Thus, in subsequent waves, participants were in middle or late adolescence.

## Measures

Adolescents completed a revised version of the 12-item familial ethnic socialization measure (FES; Umaña-Taylor, Yazedjian, & Bámaca-Góme, 2004) at Wave 1, which assessed the degree to which participants perceived their families to socialize them on their families' heritage culture. Items were rated on a 5-point Likert scale ranging from not at all (1) to very much (5), with higher scores indicating higher levels of FES. The items assessed both overt and covert approaches to ethnic socialization, using statements such as "My family teaches me about my ethnic/cultural background" (overt) and "My family celebrates holidays that are specific to my ethnic/cultural background" (covert). Past studies that have utilized the measure on Latino adolescent samples reported strong Cronbach's alphas of .90 or higher (Supple et al., 2006; Umaña-Taylor et al., 2009). With the current sample, the Cronbach's alphas for the younger adolescent group was .92, and for the older adolescent group was .91.

Participants reported their best friends' orientation toward Mexican culture (Updegraff, McHale, Whiteman, Thayer, & Delgado, 2005) with 5 items at Wave 2, using a 5-point Likert scale ranging from not at all (1) to very much (5). The original measure included 6 items, but one item (i.e., "How often do you join your best friend's family celebrations and traditions?") seemed to reflect the participant's cultural orientation, not the best friend's, so it was dropped for the purpose of this study. The rest of the items included statements such as "How familiar is your best friend with Mexican culture and traditions?" and "Does your best friend speak

Spanish?” For the current sample, the Cronbach’s alphas for the younger adolescent group was .68, and for the older adolescent group was .84.

The ethnic identity scale (EI; Umaña-Taylor et al., 2004) was used to assess the multidimensional construct of ethnic identity: exploration (e.g., “I have experienced things that reflect my ethnicity, such as eating food, listening to music, and watching movies”), resolution (e.g., “I know what my ethnicity means to me”), and affirmation (e.g., “If I could choose, I would prefer to be of a different ethnicity”). Items for all subscales were rated on a 4-point Likert scale ranging from does not describe me at all (1) to describe me very well (4). Supple and colleagues (2006) reported adequate reliability for a sample of Latino adolescents (.77, .79 and .80 for exploration, affirmation and resolution subscales respectively). The Cronbach’s alphas obtained with the current sample for the younger adolescent group were .87 for exploration, .88 for resolution, and .43 for affirmation subscales, and for the older adolescent group were .83, .91, and .83, respectively. Although the reliability of Wave 3 affirmation for the younger adolescent group was notably low, this measure was incorporated in the analysis because of its unique theoretical contribution to the overall construct of ethnic identity (Phinney, 1992). To improve reliability, two items (“adolescent's feeling about ethnicity is mostly negative” and “adolescent is not happy with ethnicity”) were dropped from the affirmation measure. The reliability of the revised affirmation measure was .62 for the younger adolescent group and .79 for the older adolescent group. This version of affirmation measure was used for subsequent analysis, although the results were compared with those produced using the original affirmation measure to ensure that dropping the items did not yield different results.

### **Data Analytic Plan**

Structural equation modeling was carried out with AMOS 20, using Full Information

Maximum Likelihood (FIML) to account for missing data in parameter estimation (Arbuckle, 2011). Patterns in missing data were assessed by Little's MCAR (Missing Completely At Random) test in the Missing Values Analysis module of SPSS 20. For the main analyses, FES, EI, and best friend's orientation toward Mexican culture were entered into the models as manifest variables (for the conceptual model, see Figure 1). Both FES and the three components of EI have been well established in extant literature (Umaña-Taylor & Fine, 2004; Umaña-Taylor et al., 2009), and the association between FES and EI is well supported (Hughes, 2003; Umaña-Taylor, Bhanot, & Shin, 2006).

To test the hypothesized model that best friend's Mexican cultural orientation at Wave 2 mediated the association between FES at Wave 1 and the three dimensions of ethnic identity at Wave 3, the overall model fit was examined using the chi-square ( $\chi^2$ ), as well as three alternative fit indices: the Nonnormed Fit Index (NNFI, also known as RHO; Tucker & Lewis, 1973), the Comparative Fit Index (CFI, also known as RNI; Bentler, 1990), and the Root Mean Square Error of Approximation (RMSEA; Browne & Cudeck, 1993). Values of .95 or higher for NNFI and CFI as well as .06 or lower for RMSEA indicate that the model is a good fit to the data (Hu & Bentler, 1999). The overall model included Wave 1 ethnic identity components, age group, and generational status as control variables. First, a model was estimated to examine the direct effects of FES at Wave 1 on ethnic identity at Wave 3. Next, a second model was estimated to examine the association between FES at Wave 1 and best friend's orientation to Mexican culture at Wave 2, as well as the association between best friend's orientation to Mexican culture at Wave 2 and ethnic identity at Wave 3. Best friend's Mexican cultural orientation could not be controlled at Wave 1 because measures on peers were not assessed until Wave 2. This restricted the inference on the causal relationship between FES and best friend's Mexican cultural

orientation, a limitation which will be discussed later. Finally, a joint significant test (Cohen & Cohen, 1983, p. 366) was conducted to ascertain a significant mediating relationship (MacKinnon, Lockwood, Hoffman, West, & Sheets, 2002). The joint significance test has been shown to have the best balance between statistical power and Type I error among 14 mediation testing methods (MacKinnon et al., 2002), and is as trustworthy as a bootstrap test (Hayes & Scharkow, 2013). The confidence intervals of mediated effects were calculated using the distribution-of-the-product method, which has more power and accurate Type I error rates than most methods (MacKinnon et al., 2002; MacKinnon, Lockwood, & Williams, 2004). This calculation was implemented using the RMediation package (Tofighi & MacKinnon, 2011).

In order to test the hypothesis that the strength of the associations in the mediational model was moderated by age or generational status, multigroup SEM moderated mediation analyses were performed. First, a fully unconstrained model, in which all the parameters were allowed to be freely estimated across groups, was compared to a fully constrained model, in which direct-effect paths and covariances were set to be equal across groups. The  $\chi^2$  difference tests, along with the relative fit indices, were utilized to determine which model fit the data better. An insignificant change in  $\chi^2$  indicated that the constrained model was a better fit, while a significant change in  $\chi^2$  suggested that the unconstrained model was a better fit, meaning that all paths could not be constrained equal across the two age groups (Kline, 2010, p. 215). In the latter case, in order to identify whether each path was equal or different across the groups, the paths in the fully unconstrained model were constrained to be equal one at a time, and the fit of the partially constrained model was compared with the fully unconstrained model using  $\chi^2$  difference test. If constraining a path to be equal across groups significantly improved the model fit, this path was deemed equal across groups, and vice versa. Results of these tests guided the

specification of equality constraints in the final multigroup model.

A second moderated mediation model was performed to test the hypothesis that the strength of the associations in the mediational model differed across generational status groups. Model comparisons for generational status group differences (the 1<sup>st</sup> generation group vs. the combined 2<sup>nd</sup> and 3<sup>rd</sup>+ generation group) followed the same procedure as the age group comparison, as stated above.

## RESULTS

Descriptive values and correlations of variables for the total sample ( $n = 279$ ), across age groups, and across generational statuses, are listed in Tables 1 through 3, respectively.

Preliminary analyses using paired samples *t*-tests showed that the levels of ethnic identity exploration, resolution, and affirmation increased from Wave 1 to Wave 3 ( $t = -4.97, p < .001$ ;  $t = -4.01, p < .001$ ;  $t = -4.24, p < .001$ ). This indicated that the Mexican-origin female adolescents in the sample explored more about, became more resolved with, and felt more positive toward their ethnic identity across assessments. Bivariate correlations revealed that ethnic identity exploration and resolution, but not affirmation, showed modest but significant stability over time ( $r = .22, p < .01$ ;  $r = .18, p < .05$ , see Table 1). Age groups and generational statuses positively correlated with some components of ethnic identity at Wave 1 among the total sample and for certain age or generational status groups (see Tables 1 through 3). Therefore, ethnic identity components at Wave 1, as well as age groups and generational statuses, when not used as moderators, were used as control variables in the models.

According to the results of Little's MCAR (Missing Completely At Random) test, the current data was considered MCAR ( $(\chi^2(59) = 70.62, p = .14)$ ), meaning that there was no systemic pattern in missing data in the present study (Acock, 2005).

### Test of the Overall Mediation Model

Structural equation modeling was used to test whether best friend's Mexican cultural orientation at Wave 2 mediated the longitudinal association between FES at Wave 1 and the three dimensions of ethnic identity at Wave 3. The three components of ethnic identity at Wave 1 were entered in the model so that the mediational model predicted individual differences in ethnic identity developmental changes, above and beyond the group-average trend of EI development which was accounted for by Wave 1 EI. Age and generational status were included as controls. Important to note is that the current results were compared with the results using the original affirmation scale and they were found to be almost identical. Therefore, results produced with the revised affirmation measure are reported.

First, a direct-effect model in which FES at Wave 1 predicted ethnic identity at Wave 3 was estimated, with age, generational status, and EI components at Wave 1 entered as control variables. This model displayed a good fit for the data ( $\chi^2(13) = 16.17, p = .24, CFI = .99, NNFI = .96, RMSEA = .030$ ). The only two significant paths in this model showed that higher levels of FES at Wave 1 predicted higher levels of ethnic identity exploration ( $\beta = .20, p < .05$ ) and resolution ( $\beta = .16, p < .05$ ) at Wave 3. Next, best friend's Mexican cultural orientation at Wave 2 was entered into the model, and paths were added from FES to best friend's Mexican cultural orientation and from best friend's Mexican cultural orientation to ethnic identity at Wave 3. Results indicated that the model was a good fit for the data ( $\chi^2(15) = 17.96, p = .26, CFI = .99, NNFI = .96, RMSEA = .027$ , see Model 0 in Table 4). The model (see Figure 2 for path coefficients) revealed that FES at Wave 1 positively predicted best friend's Mexican cultural orientation at Wave 2, which in turn positively predicted Wave 3 ethnic identity exploration and resolution, but not affirmation. In other words, higher levels of familial ethnic socialization

reported by adolescents were associated with a stronger Mexican cultural orientation of best friend, which was related to higher levels of ethnic identity exploration and resolution for adolescents. The associations between FES at Wave 1 and ethnic identity components at Wave 3 became non-significant, indicating that best friend's Mexican cultural orientation completely mediated the effects of FES on the development of ethnic identity exploration and resolution. According to joint significance test (Cohen & Cohen, 1983, p. 366), which requires that the path from the independent variable to the mediator and the path from the mediator to the dependent variable be significant, these mediational effects were significant. By using the distribution-of-the-product method, the confidence interval for the mediated effect predicting ethnic identity exploration (indirect effect = .05, 95% CI [.01, .10]) and the confidence interval for the mediated effect predicting resolution (indirect effect = .05, 95% CI [.01, .11]) indicated that these mediated effects were significantly different from zero. Overall, 31% [ $22 * .27 / ((22 * .27) + .13) = .31$ ] (see MacKinnon and Dwyer (1993) for the calculation method) of the effect of FES on ethnic identity exploration and 52% [ $.22 * .27 / ((.22 * .27) + .055) = .52$ ] of the effect of FES on ethnic identity resolution were mediated by best friend's Mexican cultural orientation. Since best friend's Mexican cultural orientation did not significantly predict ethnic identity affirmation, the mediational model did not hold for affirmation.

Altogether, the proposed mediational model (controlling for W1 ethnic identity domains, age, and generational statuses) explained 14% of the variance in Wave 3 ethnic identity exploration and 11% of the variance in ethnic identity resolution, but only 1% of the variance in affirmation.

### **Multigroup Analyses for the Moderating Effects of Age and Generational Status**

Moderated-mediation multigroup SEM analyses were conducted to determine whether the proposed mediational model varied as a function of age (i.e., younger vs. older adolescents). Generational status was entered as a control variable. First, the mediational model was applied to both groups, with variances, covariances, and all the structural paths freely estimated for each group. This fully unconstrained model (Model 1) had a good fit (see Table 4). Second, a fully constrained model in which all the covariances and paths were set to be equal across age groups was estimated (Model 2), and it also showed a good fit (see Table 4). The  $\chi^2$  difference test revealed that the fully constrained model (Model 2) did not fit the data significantly worse than the fully unconstrained model (Model 1),  $\Delta\chi^2(23) = 29.86, p = .15$ . Since the fully constrained model was more parsimonious, it was considered a better model for the data. This indicated that the same mediational process held across the younger and the older adolescent groups (see Figure 3 for path coefficients of Model 2, the fully constrained model). The confidence interval for the mediated effect predicting ethnic identity exploration (indirect effect = .05, 95% CI [.01, .10]) and the confidence interval for the mediated effect predicting resolution (indirect effect = .05, 95% CI [.01, .11]), along with joint significance tests, demonstrated that these mediated effects were significant. Overall, 32%  $[\frac{.21 * .22}{(.21 * .22) + .10} = .32]$  of FES's effect on ethnic identity exploration and 51%  $[\frac{.21 * .24}{(.21 * .24) + .0487} = .51]$  of FES's effect on resolution were mediated by best friend's Mexican cultural orientation, which were equivalent across age groups.

Similarly, multigroup SEM analysis was used to determine whether the mediational model differed between generational status groups. Adolescent age group was entered as a control variable. The fully unconstrained model (Model 3) which freely estimated the paths for

each group had a somewhat acceptable fit ( $\chi^2(26) = 39.30, p = .05, CFI = .95, NNFI = .84, RMSEA = .043$ , see Table 4), but its NNFI was below the cutoff value of .95. Since NNFI penalizes for model complexity, this relatively low NNFI value probably implied that there were too many parameters in the model, and constraining the paths to be equal across groups might thus improve NNFI. A fully constrained model in which all the covariances and paths were set to be equal across generational status groups was imposed on the data (Model 4), and it displayed a good fit (see Table 4). The  $\chi^2$  difference test revealed that the fully constrained model (Model 4) did not fit the data significantly worse than the fully unconstrained model (Model 3),  $\Delta\chi^2(23) = 24.91, p = .35$ . In addition, it had similar or better relative fit indices (CFI = .95, NNFI = .90, RMSEA = .034) in comparison with the fully unconstrained model. Therefore the fully constrained model (Model 4) was preferred, which indicated that the same mediational process applied to both the 1<sup>st</sup> generation group and the combined 2<sup>nd</sup> and 3<sup>rd</sup>+ generation group (see Figure 4 for path coefficients of Model 4). The confidence interval for the mediated effect predicting ethnic identity exploration (indirect effect = .05, 95% CI [.01, .10]) and the confidence interval for the mediated effect predicting resolution (indirect effect = .05, 95% CI [.01, .11]), along with joint significance tests, proved that the mediations were significant. Across generational status groups, 31% [ $.20 \cdot .22 / ((.20 \cdot .22) + .10) = .31$ ] of FES's effect on ethnic identity exploration and 63% [ $.20 \cdot .25 / ((.20 \cdot .25) + .03) = .63$ ] of FES's effect on resolution were mediated by best friend's Mexican cultural orientation. The mediation effects estimated in multigroup analyses (either by age groups or by generational status groups) largely resembled those in the model for the total sample.

## DISCUSSION

Drawing from the framework that ethnic identity derives from multiple contextual factors (García Coll et al., 1996; Knight et al., 1993), the present study explored how the socializing contexts of family and peers influenced the three dimensions of ethnic identity among our sample of Mexican-origin female adolescents. Although prior studies on ethnic identity development have examined the influence of family and peers separately, few have examined them in tandem, and even fewer have investigated how these two systems may be interrelated. This contrasts with Tripartite Model of Family-Peer Relationships (Parke et al., 1994), which suggests that parenting may influence peer relationships, and with Bronfenbrenner's (1992) mesosystem concept, which represents the interconnections between microsystems (such as family or peers). This study examined whether best friend's cultural orientation as a dimension of peer context mediated the association between family ethnic socialization and adolescent ethnic identity development. Results underscore the importance of the peer context, as it explained a substantial portion of FES's influence on the development of ethnic identity exploration and resolution. Furthermore, this process was invariant across age and generational status groups.

### **FES and Best Friend's Mexican Cultural Orientation Predicting Ethnic Identity**

#### **Development**

Before best friend's Mexican cultural orientation was entered into the model, FES had a positive direct influence on the developmental changes of ethnic identity exploration and resolution, but not affirmation, across the span of three and a half years during middle to late adolescence. This finding replicates previous literature demonstrating the importance of FES on ethnic identity development during adolescence (Phinney & Chavira, 1995; Umaña-Taylor &

Fine, 2004; Umaña-Taylor et al., 2004), and suggests that FES encouraged Mexican-origin female adolescents' exploration of ethnic identity and fostered their ethnic identity resolution. Meanwhile, the insignificant association between FES and ethnic identity affirmation suggests that there may be other factors from which adolescents derived their affect toward ethnic membership (e.g., discrimination), which were not accounted for in the study. This result echoes a prior non-significant finding on the association between FES and ethnic identity affirmation (Umaña-Taylor et al., 2004). However, it is noteworthy that, due to the low reliability of ethnic identity affirmation, two items were dropped from the measure, which may have affected the validity of the measure. Furthermore, the reliability of the affirmation measure for the younger adolescent group remained relatively low ( $\alpha = .62$ ) even after dropping the two items. Although the results obtained using the original affirmation scale and the revised affirmation scale were almost identical, the reliability issue may still qualify further interpretation of the results about ethnic identity affirmation in the current study.

To the author's best knowledge, this study was the first to uncover a positive impact of best friend's Mexican cultural orientation on Mexican-origin adolescents' ethnic identity development. There is a dearth of research that looks at peer influence on ethnic identity development, partly due to a lack of established measures on the role of peer as an ethnic identity socialization agent. The most frequently studied dimension of peer context in relation to ethnic identity is peer ethnicity (Kiang & Fuligni, 2009; Phinney et al., 2001), which may not be identical to the cultural orientation of peers, as it is possible for peers of the same ethnicity to have varying degrees of Mexican cultural orientation. According to the finding, the more their best friends were oriented toward Mexican culture, the more likely the participants were to explore or feel resolved about their ethnic identity. This association may be explained by the

social validation function of close friendships (Wright, 1978; Bailey, Finney, & Helm, 1975; Chambliss, 1965). In other words, best friend's orientation toward Mexican culture may offer a positive appraisal of Mexican-origin adolescents' ethnic culture, which in turn helps to validate their ethnic identity (Ting-Toomey, 1981).

### **Best Friend's Mexican Cultural Orientation Mediating the Link Between FES and Ethnic Identity Development**

FES at Wave 1 was found to positively predict best friend's Mexican cultural orientation at Wave 2. This finding supports the notion of interconnectedness between family and peers in Tripartite Model of Family-Peer Relationships (Parke et al., 1994), as well as the mesosystem concept of Bronfenbrenner's (1992) ecological systems theory. However, the results of our study does not elucidate the specific mechanism by which familial ethnic socialization influenced best friend's Mexican cultural orientation. For instance, familial ethnic socialization could have influenced best friend's Mexican cultural orientation through peer selection (Parke et al., 1994), or by involving adolescents' friends in family cultural activities (Brown et al., 1999). These specific mechanisms through which parenting influences best friend's Mexican cultural orientation are worth further investigation.

Results also highlight the mediating role of best friend's Mexican cultural orientation in the link between FES at W1 and ethnic identity development from W1 to W3. After accounting for the mediation of best friend's Mexican cultural orientation, the direct effect from FES to ethnic identity became non-significant. Best friend's Mexican cultural orientation was found to mediate almost a third of the effect of FES on ethnic identity exploration and over half of the effect of FES on ethnic identity resolution. This finding suggests that, while FES profoundly influenced adolescents' ethnic identity development, a substantial part of its impact resulted from

indirectly influencing other social contexts, such as best friend's Mexican cultural orientation. The remarkable role of best friend's Mexican cultural orientation in the FES-ethnic identity link resonates with what other scholars have iterated about the salience of peer influence on adolescent development (Brown & Larson, 2009; Collins & Laursen, 2004) and on ethnic identity development (Alba, 1990; Kiang & Fuligni, 2009; Phinney et al., 2001). It also broadens our dialogue by moving the focus from race/ethnicity of peers (Kiang & Fuligni, 2009; Phinney et al., 2001) to cultural interactions that may occur within friendships (Ting-Toomey, 1981).

### **Examining the Mediation Across Age and Generational Status Groups**

The current study demonstrated that the same mediational model held across younger and older adolescent groups and across generational statuses. This indicates that best friend's Mexican cultural orientation substantially mediated the impact of FES on ethnic identity exploration and resolution for both Mexican-origin adolescents during middle (younger group was assessed from about 12 to 15.5 years old) and late adolescence (older group was assessed from about 15 to 18.5 years old), and regardless of generational status. This finding did not support the hypothesis that FES's effect on ethnic identity would decrease and the effect of best friend's Mexican cultural orientation would increase for older adolescents and for U.S.-born adolescents. However, these results should be interpreted with caution.

It should be noted that the size of the current sample may have limited the power of using multigroup SEM to detect group differences in path strength. For instance, the sample size was especially small for the 1<sup>st</sup> generation group (n = 80). When the mediational model was freely estimated for each age or generational status group, there emerged some group differences in the path significance levels that were in the same direction as hypothesized. These differences,

though apparently not large enough to be confirmed by the multigroup analysis, might nonetheless imply potential group differences in path strengths that warrant further scrutiny with a larger sample. For example, it was found in the fully unconstrained model for age groups (Model 1) that FES significantly and positively predicted best friend's Mexican cultural orientation for the younger adolescent group ( $\beta = .29, p = .009$ ) but not for the older group ( $\beta = .19, p = .09$ ). In addition, in the fully unconstrained model for generational status groups (Model 3), best friend's Mexican cultural orientation did not significantly predict ethnic identity exploration for the 1<sup>st</sup> generation group ( $\beta = .24, p = .15$ ), but did for the combined 2<sup>nd</sup> and 3<sup>rd</sup>+ generation group ( $\beta = .30, p = .003$ ). However, contrary to the hypothesis, it was also found in Model 1 that best friend's Mexican cultural orientation predicted ethnic identity exploration for the younger adolescent group ( $\beta = .32, p = .006$ ) but not for the older adolescent group ( $\beta = .21, p = .09$ ). Testing these interesting trends of group differences would require a study design with more power than the present one.

### **Limitations and Directions for Future Research**

Several limitations of the current study should be noted. First, best friend's Mexican cultural orientation is a useful but an imperfect proxy for peer ethnic socialization. Although as mentioned in the introduction the practice of using enculturation as a proxy for ethnic socialization has empirical precedence, best friend's cultural orientation reflects the friend's cultural profile, not the process by which the best friend acts as an ethnic socializing agent for the adolescent (e.g., celebrating Mexican holidays or discussing Mexican traditions with the adolescent). Additionally, best friend's cultural orientation may not fully represent the cultural profile of the adolescent's overall peer network, even if it represents an important component of it. Future studies would benefit by including cultural influence of peers other than the best

friend. The present study took an important step in assessing the peers' cultural orientation by utilizing the measure of best friend's cultural orientation, but this measure was chosen partly due to a lack of available operationalizations of peer as an ethnic socialization agent. Future work may benefit from developing a measure that better captures the peer ethnic socializing process, as well as employing innovative methods such as social network analysis to obtain a more accurate representation of the peer influence.

Second, even though the study found that best friend's Mexican cultural orientation mediated a considerable portion of FES's influence on ethnic identity development over time, it remains unknown whether best friend's Mexican cultural orientation was more influential than best friend's ethnicity—which prior studies have established to be important for ethnic identity development (Phinney et al., 2001; Kiang & Fuligni, 2009). Unfortunately, the majority (96%) of best friends' ethnicity in our sample was reported to be either Mexican-American or Latino, which did not provide enough variance for a meaningful comparison between the effects of ethnicity and cultural orientation. However, it should be noted that in our ethnically homogenous sample, Mexican cultural orientation of best friends still predicted adolescents' ethnic identity development, which underscores the importance of examining cultural variation even among same-ethnic friends. It may be of interest for future studies to test whether the impact of cultural orientation of friends on ethnic identity development coexists with or suppresses the influence of friends' ethnicity, using a sample of Mexican-origin adolescents with both same-ethnicity and other-ethnicity friends.

Lastly, generalizability of these findings is unclear. Our sample consisted of only female participants, and it remains unknown whether best friend's cultural orientation or FES would influence adolescent boys in the same way. It is possible that peer influence on ethnic identity

may be less salient for adolescent boys, since they are less relation-orientated than their female counterparts (Cyranowski et al., 2000; Nolen-Hoeksema & Girgus, 1994; Rudolph, 2002). On the other hand, FES may be equally or even more important for ethnic identity development among adolescent boys than girls, because a prior study found that the link between FES and ethnic identity resolution was stronger for boys (Umaña-Taylor et al., 2009). In addition, our participants were recruited from a geographical area with a substantial Latino population of Mexican origin. It is possible that for Latino adolescents in mixed race neighborhoods, peer influence would be more salient because adolescents would have peers with more varied ethnicities and cultures. Therefore, it is necessary to expand the current research framework to include Mexican-origin adolescent boys and to assess neighborhoods with varying concentrations of Latino population.

Despite these limitations, the current study advanced our understanding of the contextual influences on ethnic identity development during adolescence in a number of important ways. It examined not only the effects of both family and peer contexts on ethnic identity development but also their interrelations; and to the author's best knowledge, this is the first study to reveal that FES may foster minority youth's ethnic identity development by positively influencing their best friend's cultural orientation. This approach is congruent with theories that posit transactions between family and peer contexts (Bronfenbrenner, 1992; Parke et al., 1994), which contrasts with how scholars have generally studied these contexts—as sole or independent. Finally, the current study examined the developmental changes of each ethnic identity component separately, and identified different patterns of influence from family and peer contexts. The current findings on developmental contexts of ethnic identity may provide important directions for future research.

**APPENDIX:**  
**Tables and Figures**

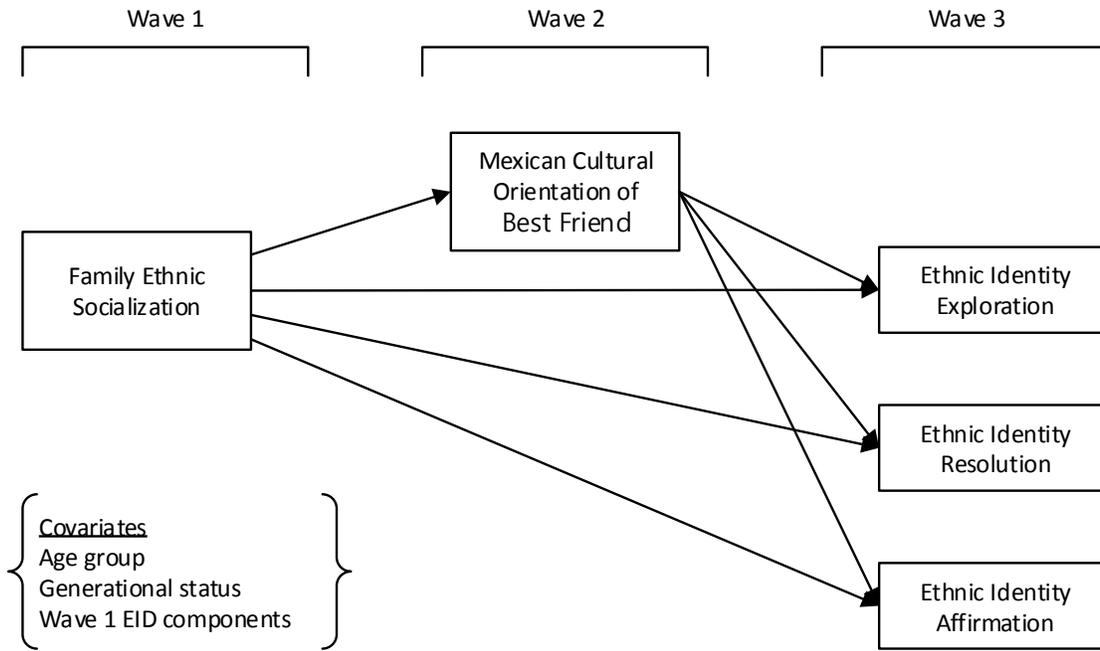


Figure 1. Conceptual Model With Best Friend's Mexican Cultural Orientation as a Mediator Between Family Ethnic Socialization and Ethnic Identity Components.

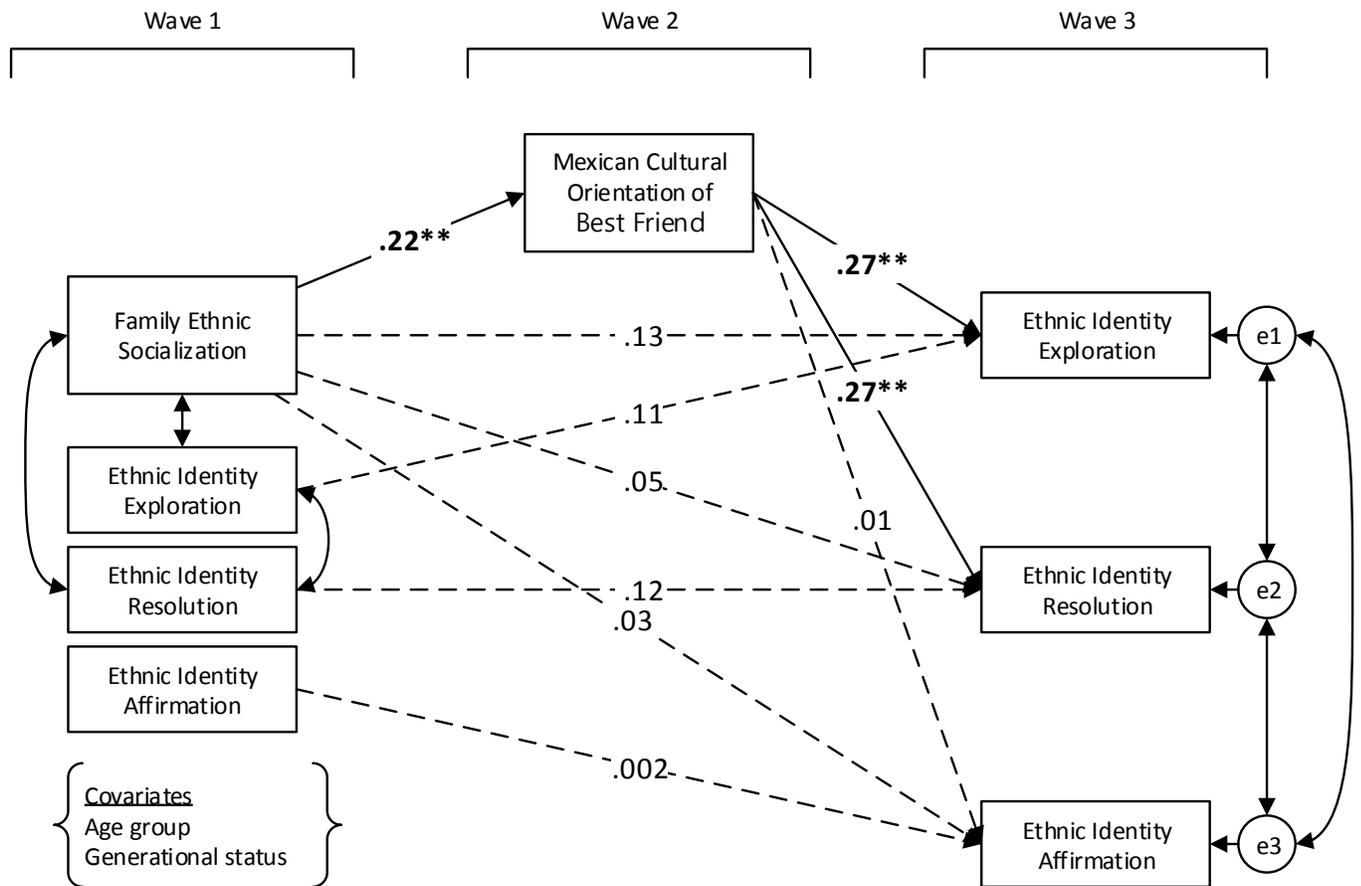


Figure 2. Mediation Model for the Total Sample (Standardized Estimates).

Note. \*  $p < .05$ . \*\*  $p < .01$ .

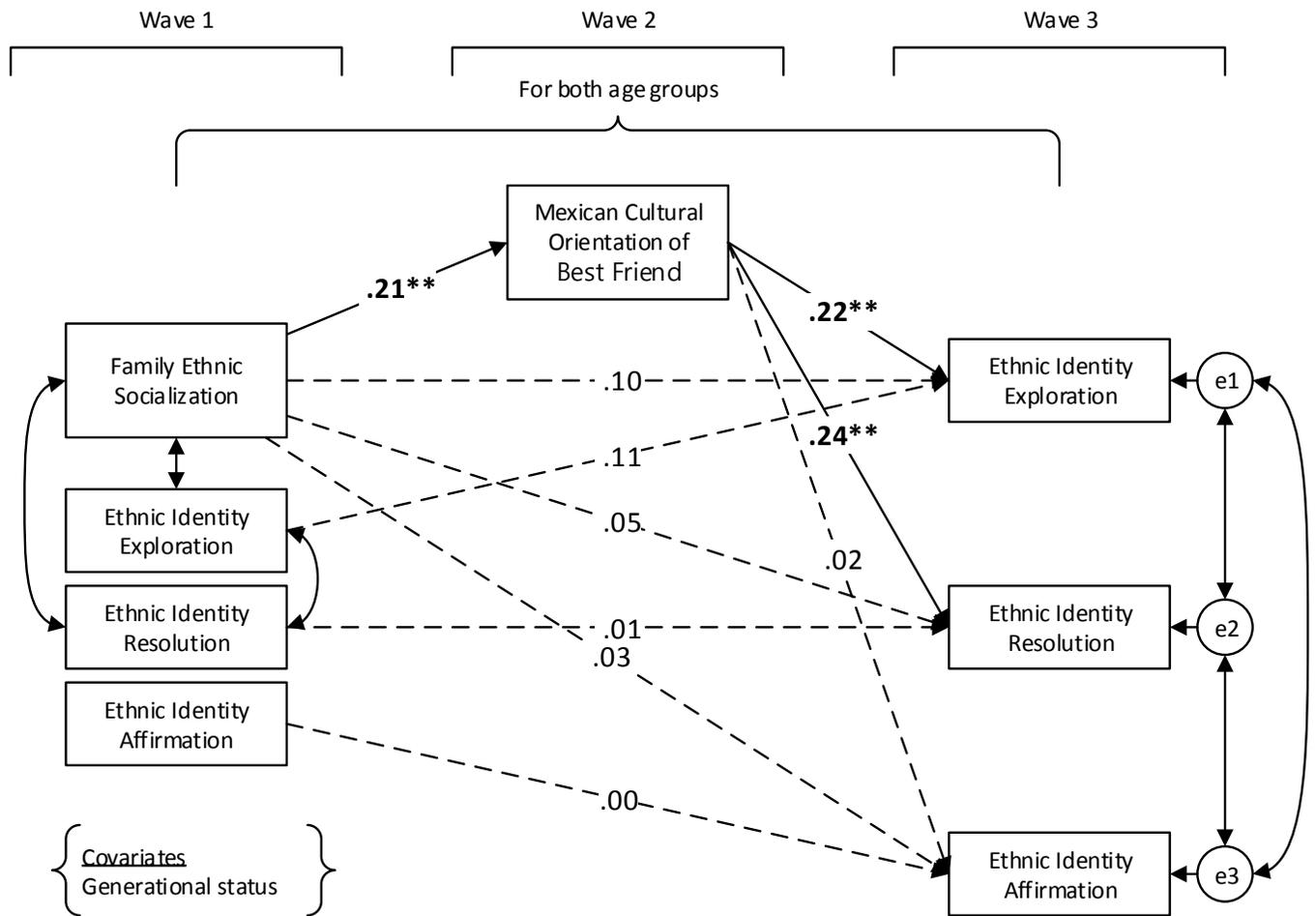


Figure 3. Fully Constrained Structural Model for the Younger and the Older Adolescent Groups (Unstandardized Estimates).

Note. \*  $p < .05$ . \*\*  $p < .01$ .

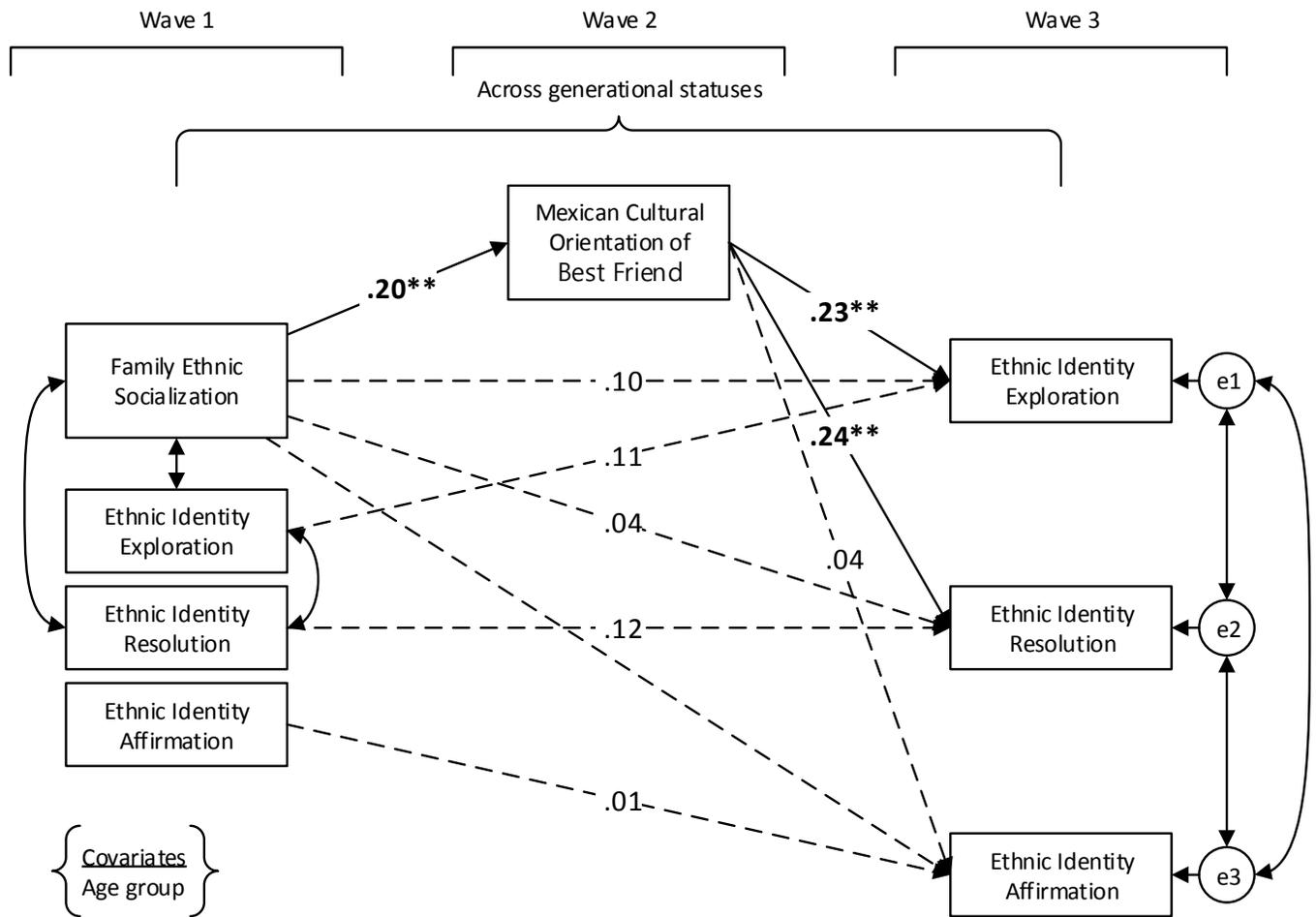


Figure 4. Fully Constrained Structural Model for the 1<sup>st</sup> and the 2<sup>nd</sup>+ Generational Status Groups (Unstandardized Estimates).

Note. \*  $p < .05$ . \*\*  $p < .01$ .

Table 1

*Descriptives and Correlations for the Total Sample (n = 279)*

Variables	1	2	3	4	5	6	7	8	9	<i>M</i>	<i>SD</i>
1. W1 EI exploration										2.68	0.67
2. W1 EI resolution	.59**									2.98	0.80
3. W1 EI affirmation	-.05	-.02								3.62	0.71
4. W3 EI exploration	.22**	.10	.00							2.96	0.67
5. W3 EI resolution	.17*	.18*	.18*	.47**						3.36	0.72
6. W3 EI affirmation	.05	.16 <sup>†</sup>	.05	.14 <sup>†</sup>	.30**					3.87	0.31
7. W1 FES	.53**	.42**	-.07	.25**	.16 <sup>†</sup>	.05				3.63	0.84
8. W2 BFMCO	.08	-.00	-.11	.28**	.24**	.08	.20*			3.87	0.79
9. Age group	.15*	.08	.14*	.06	.10	-.01	.06	-.05			
10. Generational status	-.10	-.13*	.12 <sup>†</sup>	-.02	-.05	.02	-.12 <sup>†</sup>	-.06	-.04		

Note. <sup>†</sup> $p < .10$ . \*  $p < .05$ . \*\*  $p < .01$ .

FES = Familial ethnic socialization. BFMCO = best friend's Mexican cultural orientation. EI = Ethnic Identity. W1, W2, W3 = Wave 1, Wave 2, Wave 3. For age group, 1 = the younger adolescent group, 2 = the older adolescent group. For generational status, 1 = 1<sup>st</sup> generation, 2 = 2<sup>nd</sup> and 3<sup>rd</sup> plus generation.

Table 2

*Descriptives and Correlations for the Younger (n = 143) and the Older Adolescent Group (n = 136)*

Variables	1	2	3	4	5	6	7	8	9	Younger group's	
										<i>M</i>	<i>SD</i>
1. W1 EI exploration		.63**	-.13	.22 <sup>†</sup>	.12	.23*	.63**	.18	-.15 <sup>†</sup>	2.58	0.70
2. W1 EI resolution	.52**		-.08	.21 <sup>†</sup>	.14	.29**	.43**	.11	-.11	2.92	0.86
3. W1 EI affirmation	.02	.04		-.08	.09	-.01	-.11	-.07	.23**	3.53	0.78
4. W3 EI exploration	.21 <sup>†</sup>	-.05	.11		.47**	.07	.26*	.37**	.00	2.93	0.69
5. W3 EI resolution	.21 <sup>†</sup>	.22 <sup>†</sup>	.28*	.47**		.37**	.17	.33**	-.04	3.29	0.74
6. W3 EI affirmation	-.12	.04	.11	.20 <sup>†</sup>	.25*		.18	.05	-.12	3.87	0.26
7. W1 FES	.41**	.42**	-.02	.24*	.14	-.09		.28*	-.07	3.59	0.90
8. W2 BFMCO	.01	-.09	-.16	.21	.17	.10	.15		.01	3.90	0.66
9. Generational status	-.03	-.15 <sup>†</sup>	-.01	-.04	-.06	.14	-.18*	-.11			
Older group's <i>M</i>	2.79	3.05	3.72	3.00	3.44	3.87	3.68	3.83			
Older group's <i>SD</i>	.63	.74	.61	.66	.70	.35	.78	.90			

*Note.* <sup>†</sup> $p < .10$ . \* $p < .05$ . \*\* $p < .01$ .

Correlations for the younger adolescent group are above the diagonal, and for the older adolescent group, below the diagonal.

FES = Familial ethnic socialization. BFMCO = best friend's Mexican cultural orientation. EI = Ethnic Identity. For generational status, 1 = 1<sup>st</sup> generation, 2 = 2<sup>nd</sup> and 3<sup>rd</sup> plus generation.

Table 3

*Descriptives and Correlations for the 1<sup>st</sup> Generation Group (n = 80) and the 2<sup>nd</sup>+ Generation Group (n = 193)*

Variables	1	2	3	4	5	6	7	8	9	1 <sup>st</sup> generation's	
										<i>M</i>	<i>SD</i>
1. W1 EI exploration		.62**	-.16	.17	.32*	-.04	.49*	.21	.05	2.79	.66
2. W1 EI resolution	.58**		-.16	.07	.10	.12	.55**	-.04	.11	3.15	.66
3. W1 EI affirmation	.04	.05		-.16	-.07	-.19	-.25*	-.24	.28*	3.51	.84
4. W3 EI exploration	.24*	.12	.09		.52**	.00	.19	.24	.10	2.97	.61
5. W3 EI resolution	.10	.22*	.31**	.46**		-.04	.19	.31 <sup>†</sup>	.12	3.41	.69
6. W3 EI affirmation	.08	.16	.15	.18 <sup>†</sup>	.41**		.05	-.10	-.23	3.86	.28
7. W1 FES	.55**	.39**	.05	.27**	.15	.06		.26 <sup>†</sup>	.13	3.79	.80
8. W2 BFMCO	.01	-.01	-.02	.31**	.22 <sup>†</sup>	.15	.16		.04	3.94	.84
9. Age group	.20**	.07	.04	.04	.10	.08	.03	-.10			
2 <sup>nd</sup> and 3 <sup>rd</sup> + generation's <i>M</i>	2.64	2.92	3.69	2.95	3.34	3.87	3.57	3.83			
2 <sup>nd</sup> and 3 <sup>rd</sup> + generation's <i>SD</i>	.68	.85	.63	.70	.75	.32	.86	.78			

*Note.* <sup>†</sup> $p < .10$ . \*  $p < .05$ . \*\*  $p < .01$ .

Correlations for the 1<sup>st</sup> generation group are above the diagonal, and for the 2<sup>nd</sup> and 3<sup>rd</sup> plus generation group, below the diagonal.

FES = Familial ethnic socialization. BFMCO = best friend's Mexican cultural orientation. EI = Ethnic Identity. For age group, 1 = the younger adolescent group, 2 = the older adolescent group.

Table 4

*Fit Indices for Model Comparison in Multigroup Analyses for Age Groups and for Generational Status Groups*

	$\chi^2$	df	p	$\Delta\chi^2/\Delta df$	$\Delta p$	CFI	NNFI	RMSEA
Model 0. Model for the total sample	17.96	15	.26	—	—	.99	.96	.027
Multigroup models for age groups (controlling for generational status)								
Model 1. Fully unconstrained model for age groups	28.44	26	.34	—	—	.99	.97	.018
Model 2. Fully constrained model for age groups	58.30	49	.17	29.86/23	.15	.97	.94	.026
Multigroup models for generational status groups (controlling for age group)								
Model 3. Fully unconstrained model for generational status groups	39.30	26	.05	—	—	.95	.84	.043
Model 4. Fully constrained model for generational status groups	64.21	49	.07	24.91/23	.35	.95	.90	.034

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