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Abstract

This mixed-method study assessed the nature of language brokering and the relationship between language brokering and prosocial capacities in a sample of 139 college students from ethnically diverse immigrant families. The prosocial capacities of interest were empathic concern and two forms of perspective-taking: general perspective-taking (understanding the perspectives of others) and transcultural perspective-taking (understanding of divergent cultural values). As predicted, structural equation modeling identified a significant pathway from language brokering for parents to skill in transcultural perspective-taking. We illustrated this pathway with a qualitative case study. We also identified a significant bidirectional relationship between language brokering for others (e.g., other relatives, friends) and empathic concern. The experience of language brokering for others develops empathic concern; at the same time, those with higher levels of empathic concern broker more for people outside their immediate families.

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children of immigrants, language brokering, culture brokering, emerging adulthood, empathy, positive youth development

My entire childhood, I was translating simple things day to day, almost every day, and more intricate things like letters, bills, parent conferences every so often. I translated as I was asked. [It made me feel] empowered, proud, frustrated at times, [but] understanding of my parents' struggle.

Julio (age 19)

Julio's words, elicited in the present study, reveal how children of immigrants use their emerging bilingual competencies to help their families with everyday tasks. His reflections also suggest the potential effects of this form of family assistance on youth development, in terms of cultivating pride, a sense of empowerment, frustration, and, perhaps, empathy and understanding. As youth grow older, they may increase the circle of people for whom they broker language, extending their services outside of their immediate families and into their communities. Their active work as interpreters of others' experiences may enhance their opportunities to develop empathy for a variety of people and their experiences.

Considerable research suggests that family environments, processes, practices, and relationships influence children's emotional and prosocial development (e.g., Barnett, 1990; de Guzman & Carlo, 2004; Eisenberg & Mussen, 1989; Fabes et al., 1994; Fabes, Fultz, Eisenberg, May-Plumlee, & Christopher, 1989). In this work, much emphasis is given to parents' role in the development of children's social understanding, but few studies have examined how children's own activities within families may affect their socio-emotional development. In addition, little research has examined these processes within ethnically diverse and immigrant families (de Guzman & Carlo, 2004). Given the work that the children of immigrants do to provide assistance to their families, this seems an area ripe for examination.

The present study aims to fill this gap by exploring how children's language brokering (Shannon, 1987), their translation and interpretation work, affects their capacities to empathize with and understand others as emerging adults. Because language and culture are so intimately connected (Schieffelin & Ochs, 1986) and because much of interpreting language involves interpreting embedded cultural beliefs and practices, we additionally explore the relationship between language brokering and the ability to understand differing cultural values and perspectives. We use quantitative data to establish general

patterns and qualitative analyses to highlight what these trends may mean for emerging adults as they reflect on their lived experiences.

Children of Immigrants as Emerging Adult Language Brokers

It is estimated that children of immigrants make up 23% of children nationwide and 50% of children in California (Fortuny, Capps, Simms, & Chaudry, 2009). Research suggests that children of immigrants from Armenian, Asian, European, and Latin American backgrounds endorse higher levels of family obligation than do their third-generation counterparts (Fuligni, Tseng, & Lam, 1999; Ghazarian, Supple, & Plunkett, 2008; Phinney, Ong, & Madden, 2000). That is, first- and second-generation youth in the United States generally retain their parents' values of respect for elders and a sense of obligation to assist their families, especially if they come from cultures that emphasize interdependent values (Fuligni et al., 1999). The demands of new immigrant contexts may then shape how that sense of family obligation plays out, as children are recruited to provide care for siblings and other family members, participate in household tasks, and run errands. In doing these things, they often leverage their language skills, as they read and interpret things that arrive in the mail, make and answer telephone calls, and help their parents communicate at schools, clinics, and marketplaces (Fuligni et al., 1999; Orellana, 2009b).

While most research on immigrant language brokers highlights the work done by relatively young children or adolescents, a few studies of brokers' reflections of their lifetime and adult brokering experiences suggests that levels of brokering may decrease in the transition to young adulthood as parents' abilities to navigate their new environments increase (Bucaria & Rosato, 2010; Degener, 2010). In addition, levels may decrease as brokers move away from home, either for work or college. Indeed, this transitional period from adolescence to adulthood is often characterized in contemporary U.S. society as a period of growing independence from family and exploration of love and career usually away from home (Arnett, 2000). Yet, despite potential developmental shifts, studies on children of immigrants in college suggest that this work often continues into emerging adulthood (Sy, 2006; Weisskirch, 2006). Emerging adults may also be enlisted to assist their families in ways they had not been asked to during childhood as parents' recognition of their children's growing independence and competence grow (Fuligni & Pedersen, 2002). Given the widening of social networks away from home and the growth of cognitive capacities during this period, brokers may also extend

their help to a broader network of friends and relatives outside of their immediate family. The present study aims to capture changing trends in language brokering rates during this transitional period in comparison with lifetime rates and assess what it may mean to broker for parties outside of the immediate family in comparison with brokering for parents.

Translating Into Prosocial Development

The literature on the effects of language brokering has shown mixed results, with studies that suggest both potentially negative and positive effects on well-being and development. There is research that links the practice to internalizing and externalizing behaviors such as depressive symptoms and delinquent behaviors (Buriel, Love, & De Ment, 2006; Chao, 2006). It has also been viewed as possibly detrimental in terms of fueling family conflict, anxiety, increasing exposure to discrimination, and mistranslation (Hall & Sham, 2007; Jones & Trickett, 2005; Trickett & Jones, 2007). However, other work suggests that children's brokering not only has the potential to help family and community ecologies, it may also benefit brokers themselves. They may gain from these experiences in terms of language and literacy development, academic efficacy, and social efficacy (Acoach & Webb, 2004; Buriel, Perez, De Ment, Chavez, & Moran, 1998; Dorner, Orellana, & Li-Grining, 2007; Orellana, Reynolds, Dorner, & Meza, 2003). Brokering may enhance cognitive and social competencies as children use linguistic, social, and cultural skills to negotiate meaning and facilitate interactions, perhaps initially for close family members, and later expanding outward to others in their networks.

How to explain the difference in outcomes? In these studies, the only differentiating factor appears to be on the dependent variable side: family conflict, anxiety, experiencing discrimination, and the possibility of mistranslation are potential costs, whereas linguistic, academic, and social skill development are benefits of language brokering. In other words, language brokering experience yields both costs and benefits for adolescent brokers. In the present article, we attempt to extend exploration of the benefits to a new area. Up to now, an underexplored dimension of language brokering is its potential effect on prosocial development. Prosocial behavior has been defined as the intent to help or act in the benefit of others regardless of the reward gained (e.g., recognition, self-satisfaction, monetary compensation; Eisenberg & Mussen, 1989). This characterizes the way many language brokers step up and offer their services when they see that it is needed, especially as they get older (Orellana, 2009a, 2009b). The emotional response most associated with prosocial behavior is empathy. This has been conceptualized as a

multidimensional construct, with both cognitive (perspective-taking) and affective (empathic concern) components (Davis, 1980; Feshbach, 1975). Perspective-taking involves the ability to recognize and understand the feelings and perspectives of others, whereas empathic concern is the sympathy, compassion, and regard we feel for another (Davis, 1980). Throughout this article, we will refer to this more inclusive form of perspective-taking as “general perspective-taking” in order to discriminate it from the “transcultural perspective-taking,” which we further describe.

The idea that language brokering may facilitate the development of general perspective-taking and empathic concern has been suggested by qualitative research (Orellana, 2009a, 2009b). Children are socialized to notice when others need help and to offer their language skills. Although there is a growing literature on how within-family contexts and processes affect prosocial development, much of this work focuses on parental responsiveness and parenting practices (e.g., Barnett, 1990; Fabes et al., 1989; Valiente et al., 2004; Zhou et al., 2002). It emphasizes parents’ roles in teaching children to express distress freely and sympathize with those who express it (Barnett, 1990). This study examines how children’s practices of helping those within and outside of their family may influence their ability to understand and empathize with others.

Transcultural Perspective-Taking

The ability to understand cultural values and practices different from one’s own is another component of being able to understand others. Being positioned between cultures may give children of immigrants a kind of “meta-cultural” understanding that may facilitate the ability to understand how actions are shaped by different cultural norms. One significant cultural difference that has been documented by cross-cultural psychologists is that of interdependence versus dependence as developmental scripts (Greenfield, 1994). People immigrating from non-Western cultures or ecologies that are organized around agriculture and have low levels of technology and formal Western schooling may endorse familistic and interdependent values more than modern urban cultures do (Greenfield, 2009; Hofstede, 1980). Cultures that value interdependence prioritize the needs and expectations of the family and larger group over those of the individual (Hofstede, 1980; Markus & Kitayama, 1991).

In the course of mediating linguistic and cultural meanings for others, language brokers may develop what Orellana (2009a) refers to as transcultural perspective-taking. After all, brokers not only utilize their *linguistic* toolkits for language brokering, they also draw on their cultural knowledge as

they mediate between people from different backgrounds. Transcultural perspective-taking will be defined here as the ability to understand multiple cultural perspectives, especially those different from one's own. In other words, in addition to the capacity to recognize different points of view, there is an added component of awareness of the norms, values, and beliefs that can inform and motivate certain attitudes, feelings, and behaviors. Given the importance of transcultural skills in an increasingly globalized world and of empathy to the development of interpersonal and emotional competencies, there are compelling reasons to examine the relationship between the practice of informal translating and interpreting among immigrant youth to positive prosocial development.

This Study

To summarize, the present study examined (a) how brokering experiences during the transition to young adulthood differ from general lifetime experiences up to that point, (b) the relationship of lifetime brokering to empathic concern and general perspective-taking, and (c) the relationship of lifetime brokering to transcultural perspective-taking among a diverse group of emerging adults. We hypothesized that language brokering for parents and others would have a direct and positive effect on empathic concern, general perspective-taking and transcultural perspective-taking. We use qualitative analysis to interpret the results of the quantitative findings.

Method

Participants and Procedure

One-hundred thirty-nine undergraduate students ($M_{age} = 20.92$, $SD = 2.68$; 69.8% female) completed an online survey. All participants were recruited through the Psychology Subject Pool at a large public university in California where 34.8% of the undergraduate population identified as Asian/Pacific Islander, 27.8% as White, and 18% as Hispanic, 11.8% as international, 3.8% as African American, 0.06% as American Indian/Alaskan Native, and 3.4% as Other/unknown (Office of Analysis and Information Management, 2013). These demographics are reflected in our sample. The Psychology Subject Pool consists of undergraduate students ranging from freshmen to seniors, most of whom are taking an introductory psychology course. They enroll in the pool online in order to participate in research and thereby satisfy a course requirement; they receive no other compensation. Because Introductory Psychology is a very popular lower-division elective course as well as a

prerequisite for psychology-related majors, the pool is quite representative of the general student population.

Within the Subject Pool, participation was restricted to students who were immigrants (45.3% first generation and were born outside of the United States) or who had at least one immigrant parent (54.7% second generation with at least one parent born outside of the United States). Using participant responses to the ethnicity self-report item from the Multigroup Ethnic Identity Measure (MEIM; Phinney, 1992), participants were coded as Asian American (e.g., Chinese, Korean, Vietnamese; $N = 76$), Latino (e.g., Mexican, El Salvadoran, Guatemalan; $N = 27$), or non-Hispanic White (e.g., Persian, Armenian, Russian; $N = 36$). Approximately 54% of Asian American, 26% Latino, and 42% non-Hispanic White participants were born outside of the United States.

We chose to focus on young adult brokers in order to assess the developmental outcomes of childhood brokering, informed by their retrospective accounts of such experiences. Participants were told at the beginning of the survey that this was a study on “language brokering,” which was described as “translation and interpretation work.”

Survey Measures

Demographic. Participants answered demographic questions about their age, gender, country of origin, years in the United States, and college grade point average (GPA). They completed questions on parents’ countries of origin and educational background on a scale from 1 (*no formal education*) to 7 (*graduate/law/medical school*).

Language brokering. The scope of participants’ lifetime and most recent (within the last year) experiences of language brokering were then assessed with items adapted from Dorner et al. (2007). Separate items assessed how often (0 = *never*; 1 = *just sometimes*; 2 = *once a week*, 3 = *every day*) participants have brokered for particular social categories (*mother, father, older siblings, younger siblings, grandparents, other family, friends, teachers*) in their lives (lifetime) and in the last year (emerging adulthood). Cronbach’s alpha coefficient was calculated at .69 and .67 for lifetime and recent brokering, respectively. Revision of items and creation of language brokering factors are discussed in the model creation and revision sections below.

Empathic concern and general perspective-taking. The empathic concern and perspective-taking subscales were taken from the Interpersonal Reactivity Index (IRI; Davis, 1980), which assesses participants’ feelings of warmth,

compassion, concern for others (empathic concern), and the ability to take the perspectives of others (general perspective-taking). Seven items for each variable were rated on a 5-point scale (0 = *does not describe me well* to 4 = *describes me very well*). Sample empathic concern items were “I am often quite touched by things that I see happen,” “I would describe myself as a pretty soft-hearted person,” and “I often have tender, concerned feelings for people less fortunate than me.” Sample perspective-taking items were “I believe that there are two sides to every question and try to look at them both,” “When I’m upset at someone, I usually try to ‘put myself in his shoes’ for a while,” “Before criticizing somebody, I try to imagine how I would feel if I were in their place.” Cronbach’s alphas for the subscales were .78 and .74, respectively, suggesting acceptable internal consistency among items. The mean for empathic concern was 2.95, with a standard deviation of .64; the mean for general perspective-taking was 2.64, with a standard deviation of .64.

Qualitative Analysis

Transcultural perspective-taking. Transcultural perspective-taking was assessed using scenarios adapted from Raeff, Greenfield, and Quiroz (2000), Richland and Greenfield (in prep), & Manago (in press). These scenarios posed a conflict that could be resolved in one of two ways: (a) by prioritizing individual needs and rights or (b) by prioritizing group norms and obligation. These competing value orientations (independent and interdependent) have been identified as one important dimension of cultural difference (Hofstede, 1980, 2001; Markus & Kitayama, 1991). This independent-interdependent framework allowed us to establish different cultural perspectives in the scenarios. The following is an example of a conflict scenario:

Tony and Johnny are brothers. Johnny bought a new T-shirt. A week later, Tony wants to borrow the shirt. Johnny says, “This is my T-shirt, and I bought it with my own money.” Tony says, “But you’re not using it now.” (Raeff et al., 2000)

Participants were then asked which of two action resolutions they agreed with most:

Option 1: Johnny should share the T-shirt.

Option 2: Johnny should keep it because he bought it.

After endorsing one option, they were told people have different ideas about handling situations and asked explain why someone might choose each

of the two options (Richland & Greenfield, in preparation). This allowed us to assess their ability to understand the two cultural perspectives, especially the one they did not endorse.

Two coders independently coded responses for (a) cultural understanding and (b) enacted perspective-taking. For someone who endorsed Option 1, an example of a code of “0” for enacted perspective-taking would be a negative value judgment for the non-endorsed option (i.e., Option 2): “[He is] selfish and counting.” This person also scored a “0” in the cultural understanding component as there is no understanding or explicit mention of how some cultures might respect or emphasize personal property rights.

Here is an example of a participant who endorsed Option 1 and scored “1” for both enacted perspective-taking and “1” for cultural understanding:

[Someone might choose Option 1] because they believe in sharing and it is reasonable since Johnny isn't wearing it. [Someone might choose Option 2] because they believe strongly in personal ownership and that Johnny paid for it with his own money so he ultimately decides what he wants to do with it.

Presenting two viewpoints earned the credit for enacted perspective-taking; realizing that this was a belief earned credit for cultural understanding.

Coder reliability, measured through Cohen's kappa coefficient (Cohen, 1960), was calculated for 25 participants (approximately 18% of total data). The four scenarios used in the analysis all had kappas greater than .70; these kappas ranged from .72 to .91. Participants' scores for cultural understanding and enacted perspective-taking were summed across the four scenarios to create a 3-point transcultural perspective-taking scale of 0 to 2. The mean was 1.5, with a standard deviation of .37.

The quantitative coding of the scenario responses was utilized in the structural equation models presented in the “Results” section titled “Language Brokering and Prosocial Capacities.” Qualitative findings are presented in the section titled “The Voices of Language Brokers.”

Eliciting the voices of language brokers. In the same survey, participants were asked to write about a language brokering experience. They were given the following prompt: “Tell us about a challenging experience you've had language brokering for people from different cultures.” They were then asked the follow-up questions: “How did you handle it?” “What did you learn from it?” and “How did it make you feel?” After reviewing the responses, we coded the challenges discussed as linguistic or interpersonal in nature. We then examined participant responses about challenging language brokering experiences in conjunction with participant scores on the survey scales and

written responses to the transcultural perspective-taking scenarios to choose case studies that highlight associations found in the quantitative analysis. Names used in the case studies are pseudonyms.

Results

Group Differences

Gender. Preliminary analysis indicated females reported greater lifetime language brokering for grandparents, $t(127) = -2.09, p < .05$. Females also had higher lifetime and recent levels of brokering for other relatives, $ts(128, 125) = -2.09, -2.29, p < .05$, as well as empathic concern scores, $t(129) = -4.15, p < .001$.

Generational status. First generation participants reported greater lifetime language brokering for father, $t(134) = 2.38, p < .05$. They also reported lower lifetime as well as recent rates of brokering for grandparents, $ts(135, 131) = -2.50, -2.30, p < .05$. There were no generational status differences in reporting of parental education, GPA, or prosocial capacities.

Ethnicity. Latino participants reported significantly lower levels of mother and father education ($Ms = 2.74, 3.16; SDs = .94, 1.40$) than Asian American ($Ms = 4.75, 5.13; SDs = 1.71, 1.75$) and non-Hispanic White participants ($Ms = 5.36, 5.47; SDs = 1.40, 1.70$), $Fs(2, 133-135) = 25.18, 16.20, ps < .001$. Latino participants also reported higher lifetime levels of brokering for mother and teachers, $F(2, 135) = 5.62, 5.50, ps < .01$, and higher scores of empathic concern and perspective-taking, $F(2, 136) = 7.88, 5.59, ps < .01$, than Asian American and non-Hispanic White participants. Asian American participants reported higher rates of lifetime brokering for grandparents compared with non-Hispanic White participants, $F(2, 134) = 7.70, p < .001$. Last, Latino participants reported the lowest GPA ($M = 3.05; SD = .37$), followed by Asian American participants ($M = 3.27; SD = .35$), and non-Hispanic White participants had the highest GPA ($M = 3.48; SD = .38$), $F(2, 124) = 9.83, p < .001$. These differences were controlled for in all models with non-Hispanic White participants as the baseline group.

GPA. The relationship between GPA and all model variables were assessed and controlled for in subsequent models to account for how cognitive ability may affect rates of brokering as well as prosocial skills. Parent education was significantly correlated with GPA, $rs = .20, .28, ps < .05$. Brokering for older siblings and friends was associated with lower GPA, $rs = -.33, -.28, ps < .01$.

Table 1. Comparisons of Lifetime Versus Last-Year Language Brokering.

	In general	In last year	t
	M (SD)	M (SD)	
Mother	1.46 (.98)	1.32 (.94)	3.14**
Father	1.19 (.94)	1.11 (.92)	2.27*
Grandparents	1.00 (.94)	0.84 (.89)	3.32**
Other family	0.96 (.70)	0.74 (.70)	5.18***
Friends	0.82 (.66)	0.70 (.62)	2.97**
Teachers	0.38 (.57)	0.30 (.51)	2.33*
Younger siblings	0.24 (.54)	0.20 (.46)	1.68†
Older siblings	0.13 (.33)	0.13 (.34)	-0.38

† $p < .10$. * $p < .05$. ** $p < .01$. *** $p < .001$.

Lifetime Versus Emerging Adulthood Language Brokering

Participants reported brokering most often for parents, grandparents, friends, and other family members in general in their lifetime and within the last year during emerging adulthood (Table 1). However, paired t tests showed that the young adult rates of recent brokering were generally lower than their general lifetime rates, with the exception of brokering for younger and older siblings which remained relatively low and close to *never*.

Language Brokering and Prosocial Capacities

Structural equation modeling (SEM) was used to measure the links between language brokering and the aforementioned prosocial capacities. All analyses were performed using EQS version 6.1 for Windows. The fit of all models was assessed by comparing several indices: Model chi-square (χ^2), Comparative Fit Index (CFI), and Root Mean Square Error of Approximation (RMSEA). Mardia's coefficient ($g_{2,p}$) was used as an omnibus measure of multivariate normality and robust methods used when coefficient values greater than 1.96 indicated non-normality (Mardia, 1970). Missing data were deleted listwise.

First, latent variables were created to represent the factors of (a) parent education, (b) lifetime language brokering for parents consisting of brokering for mother and father, and (c) language brokering for others (grandparents, younger and older siblings, other family, teachers, and friends). The gender, generational status, academic performance and ethnic differences discussed above were controlled for in the model.

We developed a model to test the hypothesis that reported language brokering for parents and others would have a direct and positive effect on empathic concern, general perspective-taking and transcultural perspective-taking. The hypothesized full model had paths from all factors to all prosocial capacity variables. However, robust fit indicators indicated a poor fit, Satorra–Bentler scaled $\chi^2(116) = 149.57, p = .02$; CFI = .90; RMSEA = .06.

During model revisions, language brokering for grandparents, younger siblings, and older siblings variables were removed from the model as these did not significantly load onto the brokering-for-others factor. After assessment of the Wald test, which indicates how deletion of particular free parameters may increase model fit, the paths from brokering for parents to empathic concern and general perspective-taking as well as brokering for others to general and transcultural perspective-taking were not significant and dropped from the model. In addition, when parent education was accounted for in the model, aforementioned differences in brokering by gender and generational status were not significant and removed from the model. Finally, when ethnic differences in GPA were controlled for, the path from parent education to GPA was not significant and therefore dropped.

Figures 1a and 1b present the final models. Participants who reported having parents with lower education levels tended to report higher levels of brokering for parents. Brokering for parents had a direct positive effect on brokering for others. Confirming our hypothesis, brokering for parents had a direct positive effect on transcultural perspective-taking, though not general perspective-taking or empathic concern. Also in accord with our hypothesis, brokering for others (e.g., other relatives, friends—anyone other than parents, grandparents, or siblings) had a direct positive effect on empathic concern, though not transcultural or general perspective-taking (Figure 1a). Considering the possibility that more empathic students would broker more for others, we tested the same model but with the direction of that one link reversed (Figure 1b). This model provided evidence for bidirectional influence: We found a significant link from empathic concern to brokering for others. In fact, the causal link in this direction was stronger than the link from brokering for others to empathic concern ($b = .28$ vs. $b = .19$).

The Voices of Language Brokers

In this section, we bring in participants' responses to the open-ended questions and transcultural perspective-taking scenarios to illuminate potential processes that may underlie the effects of language brokering found in our quantitative analyses. We do this by examining their scores on the survey scales in conjunction with participants' written responses to the transcultural

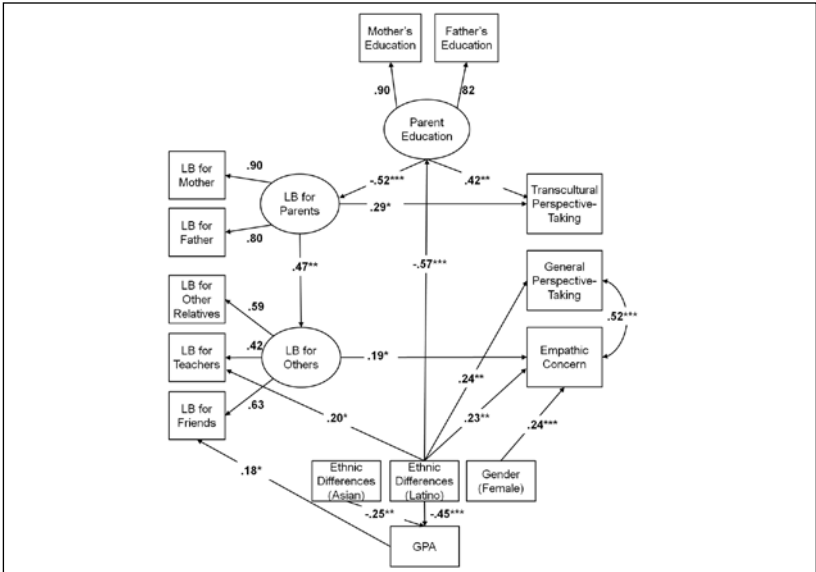


Figure 1. Final models with factor loadings and standardized path coefficients. * $p < .05$. ** $p < .01$.

Figure 1a: Satorra-Bentler Scaled $\chi^2(70) = 83.98$ $p = .12$; CFI = .96; RMSEA = .04.

Note. CFI = Comparative Fit Index; RMSEA = Root Mean Square Error of Approximation.

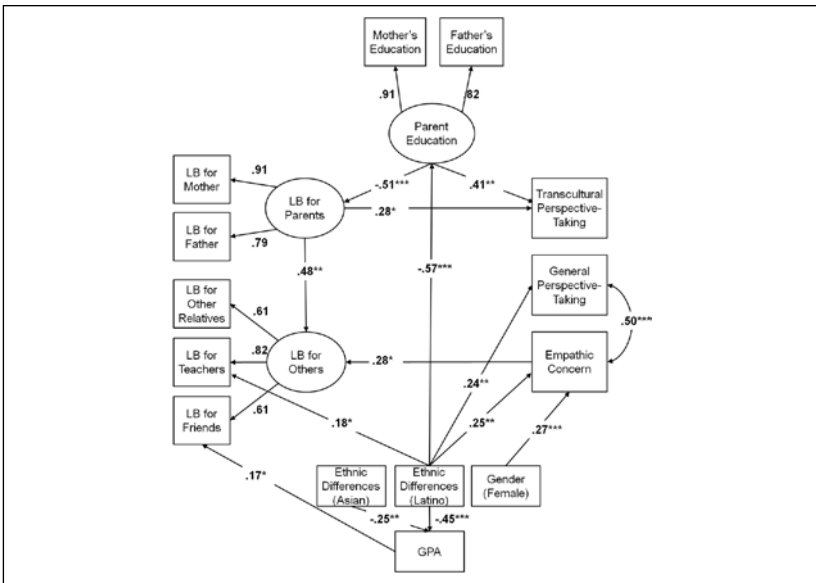


Figure 1b: Satorra-Bentler Scaled $\chi^2(70) = 81.78$ $p = .16$; CFI = .96; RMSEA = .04.

Note. CFI = Comparative Fit Index; RMSEA = Root Mean Square Error of Approximation.

perspective-taking scenarios and, where relevant, open-ended questions about challenging language brokering experiences. Specifically, we wanted to consider how more experience in language brokering for parents may have led to higher levels of transcultural perspective-taking and show how its absence can be associated with lower levels. But before the case studies, we provide a brief overview of the responses to the open-ended questions. We coded the responses into two categories: linguistic challenges and social/interpersonal challenges.

Our initial analyses of their responses revealed that about half of our participants (46%) focused on the linguistic challenges, such as how “certain languages place adjectives after the noun” or how difficult it was to “capture the meaning of some sayings.” They also reported brokering complex tasks (e.g., helping their families to buy a condominium, writing a speech for a visiting Korean mayor) and noted that it is sometimes difficult to translate domain-specific jargon (e.g., in real estate, banking regulations, job applications, medical terminology). They expressed a desire to increase their English, their native language skills, or their knowledge of idioms and slang. They discussed strategies such as assessing body language, using gestures, trying to find alternative phrases, repetition, referring to a dictionary or online resource, or asking parents and others.

The other half (54%) of respondents identified some social and interpersonal challenge of language brokering, such as handling people who may not understand the immigrant experience or cultural differences (e.g., “in Korean culture, it is rude to look straight into a teacher’s face . . . I also think American culture is more open sexually”), difficult personalities, or criticisms that they were “saying the wrong things.” They said they tried to remain calm or professional, be patient and understanding, or “laugh it off” even though they felt frustrated during the exchanges.

Transcultural Perspective-Taking: The Role of Brokering for Parents and Parental Education

The qualitative case studies below illustrate the two pathways to highly developed transcultural perspective-taking shown in the models in Figure 1. The first case, Hyori, illustrates the direct link between high parental education and high transcultural perspective-taking, as well as the link from language brokering to transcultural perspective-taking. The second case, Tony, illustrates how low parental education level leads to an even higher level of language brokering for parents (in his case, his mother), which leads in turn to highly developed transcultural perspective-taking. Both Hyori and Tony

scored above the sample average for transcultural perspective-taking and discussed the challenges of brokering for multiple family and cultural group members in the open-ended responses.

While both Tony and Hyori were above average for language brokering for their parents, there was a difference between the two. In line with the finding that less educated parents were provided with more language brokering by their children, Tony reported brokering every day for his mother, whereas Hyori reported brokering not more than once a week for either parent.

The subject of the third case study, Azarin, has highly educated parents but did minimal language brokering for her parents and scored low on transcultural perspective-taking. In her open-ended response, she focused on linguistic challenges (i.e., “there are no direct translations for words into English making it difficult to describe some things,” so she describes them “vaguely and probably using the word in its original language”). We use this case as a contrast to the first two, and to suggest how variations in the immigrant experience, both in terms of parental education and language brokering experiences, may lead to different outcomes for youth. It also illuminates that the mechanisms linking higher education to higher levels of perspective-taking are shaped by other experiences, such as language brokering.

Hyori. Hyori was the eldest of two children. She was born in Korea but grew up in Southern California. Her family moved to the United States after her father, who worked for a multinational electronic conglomerate, was transferred for work. Before the move, her mother was a secretary at a large computer company. At the time of the survey, her mother was a housewife and their family owned a small business. Her mother was a graduate of a four-year college, while her father had an advanced degree. Hyori spoke English and Korean very well and reported brokering “*once a week*” for both her mother and her father; this was above average for the sample as a whole. She was very aware of the need for transcultural perspective-taking in the language brokering process:

When I’m translating for my parents, sometimes it is hard for them to understand the culture of the States. It is challenging, because I am not only translating the language but it’s like I also have to translate the culture. I tried to speak on behalf of the American culture and help them understand that the two cultures are just different, not wrong. It is hard for my parents, who are so accustomed to one culture and one set of values, to understand others who are different from them. Sometimes it was frustrating because I understood both sides of cultures.

Here, Hyori articulates her awareness and acceptance of Korean and American culture, that both are “different, not wrong.” However, given her parents’ experiences and background, she feels the need to “translate” these cultural norms as well as language for her parents. Arguably, this kind of transcultural perspective-taking could be facilitated just by experience with her family and the larger culture, but the act of having to “translate the culture” (the work of language and culture brokering) may well have enhanced the development of these skills.

In the transcultural perspective-taking scenarios, on which she received an above-average score, Hyori again demonstrates her understanding of different cultural perspectives. In the School Conference scenario, participants are told that *Cathy is translating for her mother and teacher at parent-teacher conference. The teacher tells Cathy’s mother, “She does her work in class and turns in quality homework.” Cathy’s mother asks the teacher if Cathy behaves well in school. The teacher turns to Cathy and asks, “What do you think?”* Hyori endorsed Option 2, *Cathy should say “I’m not sure” and defer to her teacher’s opinion*, citing that it would be “embarrassing if Cathy’s opinion [was] different from the teacher’s.” However, when asked why someone might choose the non-endorsed option, *Cathy should give an honest assessment of her own behavior*, Hyori rationalized that it too may be meaningful “because that’s what is asked of Cathy” during the conference.

She received the maximum score of 2 for this response. With her above-average score on transcultural perspective-taking, Hyori’s case illustrates the links from parental education and language brokering for parents to transcultural perspective-taking.

Tony. Tony was a 19-year-old male born in Northern California. Both of his parents emigrated from rural towns in China with a secondary/high school education; they sought “better life opportunities.” At the time of the survey, Tony’s parents owned a restaurant and were making approximately US\$13,000 a year. Thus, Tony is an example of a participant from a low-socioeconomic status (SES) background. Tony reported brokering nearly every day for his mom and sometimes for his dad, other relatives, and friends throughout his life, as well as recently in the past year. Tony’s case illustrates the link between low parental education and high reported frequency of brokering for a parent.

In his responses to the transcultural perspective-taking scenarios, on which he received an above-average score, Tony highlights his capacity for understanding different cultural perspectives without judgment. In the Going Out Scenario, participants were told that *Maria, who is a high school student, had made a date to go out with her friends to the movies Saturday afternoon. Her*

parents decide to visit her grandmother at that same time and want her to come with them. Maria says that she already has a commitment to be with her friends. But her parents insist. Tony endorsed Option 1, *Maria should go to see her grandmother with her parents*, explaining that “family has higher priority than peers.” However, when asked why someone might choose Option 2, *Maria should go out with her friends as planned*, he was able to explain that “[Maria had] planned out the hang-out session first.” So he articulates two cultural views: family first versus prior commitment to peers. In the College or Family Business Scenario with Carlos, Tony endorsed going to college as well, stating that “expanding educational knowledge is key to a successful and bright future.” However, he understood that, in the second option, the “family is asking for help and trying to keep close ties.” Here he articulates the cultural value of family obligation as well as the value of personal achievement. He received the maximum score of 2 for this response.

With his above-average score on transcultural perspective-taking, Tony illustrates the direct link in the model (Figure 1) between a high level of language brokering experience and skill in transcultural perspective-taking. Tony’s case study also suggests that a high level of language brokering for a parent can be sufficient to develop transcultural perspective-taking skills, even without a high level of parental education.

Azarin. Azarin was a 20-year-old student from Pakistan; her mother has a university education and her father pursued a post-baccalaureate degree. She reported minimal language brokering for her parents, in line with the negative relationship between parental education and language brokering shown in Figure 1. Her responses to the transcultural perspective-taking scenarios consistently lacked references to cultural differences. In reference to the T-shirt Scenario, she endorsed sharing the shirt and said that brothers “should be able to share things.” In response to why someone might choose to endorse not sharing, she responded that “sibling rivalry can often be illogical, maybe it would create a fight between the two so it might be better to just leave it and not let Tony borrow the shirt.” In response to Carlos’s predicament regarding college or helping the family business, she recommended that Carlos should focus on going to college, stating that “the best thing any student can do is further their education.” When asked why someone might recommend foregoing college to help the family business, she rationalized that “it is possible that Carlos’ family has such financial burdens that they would not be able to function without additional help.” Her responses show that she is able to articulate and show deep consideration for different perspectives, potential dispositions and even to empathize with the unique circumstances of others. However, they do not display an awareness of cultural values that may drive

decisions. Thus, she receives a 1 for each scenario, receiving credit for perspective-taking, but not cultural understanding. Azarin does minimal language brokering for her highly educated parents. Her lack of transcultural perspective-taking illustrates that, while high parental education may provide a push toward transcultural perspective-taking in the sample as a whole, it is not always sufficient without language brokering for parents.

Summary. Hyori's case is one in which a high level of parental education and a meaningful level of language brokering for parents is associated with highly developed transcultural perspective-taking, illustrating two causal links in the quantitative model. Tony's case is one in which a low level of parental education is associated with a maximum frequency of reported language brokering for his mother; this high frequency of language brokering is, in turn, associated with highly developed transcultural perspective-taking. While both Tony and Hyori do engage in language brokering, Tony does so more frequently, in line with his parents' lower educational level. In Hyori's case, the response to the open-ended probe indicates an experiential link between brokering for parents and transcultural perspective-taking. In both cases, the qualitative examples from the scenarios provide concrete examples of transcultural perspective-taking.

Azarin's case, in contrast, illustrates the association between high parent education and low levels of language brokering for parents. Her responses to the scenarios provide concrete examples of general perspective-taking without any awareness of specific cultural perspectives. The fact that her parents are highly educated indicates that the positive link between parental education and transcultural perspective-taking shown in the quantitative model (Figure 1) is not always sufficient for the development of this prosocial skill; the direct influence of meaningful language brokering for one's parents may also be a necessary component of transcultural perspective-taking.

Discussion

The children of immigrants report a wide variety of language and culture brokering activities, continuing into emerging adulthood. The people that brokers reported brokering most frequently for often remained the same (parents, grandparents, other relatives, and friends). Our model also showed that reported brokering for parents was linked to reported brokering for others outside the family. And although the general frequency of brokering may decline during this transitional period, qualitative descriptions of the brokering experiences of the college-age participants in our study indicate that emerging adults may often be asked to complete complex tasks. This

complexity may reflect developmental changes, such as emerging adults' greater social and linguistic competencies, increasing individuation from families, and their movement away from home to college.

We also found that reported lifetime language brokering experiences were related to prosocial capacities. Specifically, reported brokering for parents had a direct effect on transcultural perspective-taking, the ability to understand different cultural perspectives. High parental education was also linked statistically to high transcultural perspective-taking, but we do not know the proximal process that provided the mechanism for this link between the two variables.

Reported brokering for others manifests a two-way relationship with empathic concern, the sympathy and compassion that is felt for others. The stronger link was from empathic concern to reported language brokering, showing that more empathic individuals tend to broker for people outside their immediate families more than do less empathic people. At the same time, modeling also revealed that language brokering for others develops empathic concern.

Communication, and especially communication that is facilitated through language brokering, involves multiple actors often situated within several different relationship systems. Our results suggest that these inherently social processes are linked to the development of social capacities in various ways. It may be that brokering can facilitate the development of these skills through heightening brokers' awareness of other people's backgrounds, perceptions, and values, especially because of the necessity of evaluating and explaining these differences. Brokering may place emerging adults in positions in which they can mediate for and help similar others, especially other immigrants experiencing language barriers. This is consistent with previous work suggesting that people are more likely to respond empathically to those who are more familiar or similar to them, either in characteristics or life experiences (Barnett, 1990). Also, it is possible that those who broker for others are more likely to feel that they are voluntarily helping rather than fulfilling an obligation to their families. If so, there may be a selection bias toward those who may be more empathic.

As can be expected, lower levels of parent education predicted higher levels of brokering for parents. Not surprisingly, frequency of brokering may depend on the English language abilities of brokers' parents. Parent education was not, however, predictive of brokering for others. Parent education is one indicator of socioeconomic class and may be more strongly related to English language ability than income (e.g., Kossoudji, 1988). However, given the diversity of our sample, it may be a more appropriate predictor of

brokering for parents than for people outside the immediate family, such as other relatives and friends.

While negative mental and academic outcomes have been associated with immigrant youth, the current study adds to the growing literature on immigrant practices that may have benefits for youth development and adds insight into how these benefits may accrue. The renegotiations of family relations and the parent–child script that occurs through immigrant processes like language brokering have often been cited as a source of family conflict and strain (Suárez-Orozco & Qin, 2006). However, the challenges of immigration may also bring families closer as they draw on each for support (Suárez-Orozco & Qin, 2006; Suárez-Orozco & Suárez-Orozco, 2001). Responsibilities at home may also increase children's sense of self-efficacy and interpersonal skills (Fuligni et al., 1999; Jurkovic, Kuperminc, Sarac, & Weisshaar, 2005). In the same way, these opportunities for children to provide support to their parents through translation and interpretation may, in turn, facilitate social and cultural competencies. By focusing on potential positive effects of language brokering, an important component of the immigrant experience for many children and adolescents, we respond to Garcia Coll and Magnuson's (1997) call to explain the relatively good adjustment and adaptation of immigrant children, thus avoiding the more frequent focus on the negative impacts of the migration experience.

Limitations

Our sample was recruited from a 4-year university. While a large proportion of high school graduates (70%) will likely enroll in college (U.S. National Center for Education Statistics, 2010), those who do continue their education may still represent a somewhat selective sample of brokers. For example, they may have received more of brokering's cognitive benefits and fewer of the emotional costs than an unselected sample of language brokers.

While recruiting participants from the Psychology Subject Pool was useful for obtaining a large number of language brokers from diverse backgrounds and brokering experiences, these students' interest in psychology could have some implications for the results. This group may be higher in measures of social cognition (the focus of this study) and the range of social cognition skills may be more limited in the general population of students. This situation could have produced an underestimation of relationships between language brokering and cognition in the present study.

There was both a benefit and a limitation to asking participants to retrospectively recall language brokering frequency and their feelings about particular brokering situations. While a retrospective account of brokering

frequency has its limitations in terms of accuracy, it is a good measure of the participants' views of their language brokering experience from their present perspective within emerging adulthood.

Future Directions

While our SEM results make a case for a causal hypothesis, the establishment of the associations found here would be strengthened by experimental or longitudinal designs. In addition, while the IRI has been commonly used to assess empathy, it focuses on feelings of empathy toward people in general rather than family. Conversely, our transcultural perspective-taking scenarios primarily tapped into family situations. Future studies should examine both kinds of targets of empathy and transcultural skills.

Conclusion

Our study adds to the growing literature on potentially beneficial effects of immigrant childhood practices not only on cognitive or linguistic development, but also socio-emotional development. It suggests there may be potential benefits to the often-overlooked work immigrant children do for their families and communities. Our results offer unique insights into how specific aspects of everyday helping practices may affect prosocial development.

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