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YOUNG CHILDREN IN IMMIGRANT FAMILIES FACE HIGHER RISK OF FOOD INSECURITY

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OVERVIEW

Children in immigrant families are more likely than children in native-born families to face a number of risk factors for poor developmental outcomes, including higher poverty rates, lower household incomes, and linguistic isolation, (for example, when older children and adults in a household have difficulty speaking English).¹⁻³ Previous research suggests that food insecurity is significantly higher among children of immigrants than among children of native-born parents,⁵ even after taking into account parental work status and family income.¹ Research also suggests that food insecurity is higher among less acculturated immigrants—those who have limited English proficiency (LEP), are noncitizens, or have more recently arrived in the United States.⁶

New analyses presented in this research brief indicate that levels of food insecurity are higher among infants and toddlers with immigrant parents than among those with native-born parents. Among these young children, food insecurity is more likely when immigrant parents are less acculturated, for instance when they are noncitizens, arrived more recently, or have limited English skills. When multiple background characteristics are considered simultaneously, parental citizenship in particular is strongly associated with food security—i.e., infants whose immigrant parents are citizens are more likely to be food secure than infants whose parents are not citizens. This research provides new insights into the prevalence and factors associated with food insecurity among households with young children of immigrants.

This research brief draws on recently released data from the 9-month wave of the Early Child Longitudinal Study – Birth Cohort (ECLS-B) to present a portrait of food insecurity among young children (infants and toddlers) with foreign-born parents. This brief also examines factors associated with food insecurity among young children in immigrant households.

DEFINING FOOD INSECURITY AND VERY LOW FOOD SECURITY

The U.S. Department of Agriculture defines food insecurity as “the limited or uncertain availability of nutritionally adequate and safe foods or limited or uncertain ability to acquire food in socially acceptable ways.”⁷ Household food security is categorized in three ranges:

1. *High/marginal food security* exists when there are no indications or minimal indications of changes in diet or food intake.⁸

2. *Low food security* exists when there are reports of reduced quality, variety, or desirability of diet, but there is little or no indication of reduced food intake.⁸

3. *Very low food security* exists when there are reports of multiple indications of disrupted eating patterns and reduced food intake.⁸

Food security is measured at the household level, and in this brief, food insecure children are defined as those living in households with low or very low food security (the second and third categories listed

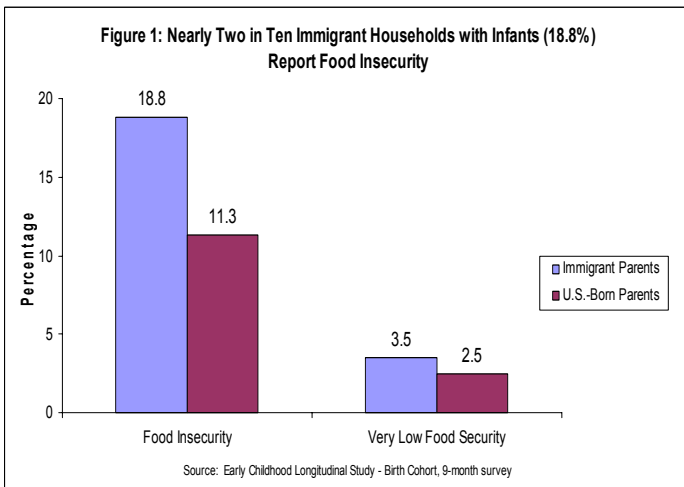
above). In other research, the term *food insufficiency* is used to identify households without this same level of food insecurity. It refers to households that report sometimes or often not getting enough to eat.⁹

PREVALENCE OF FOOD INSECURITY AND VERY LOW FOOD SECURITY AMONG YOUNG CHILDREN OF IMMIGRANTS

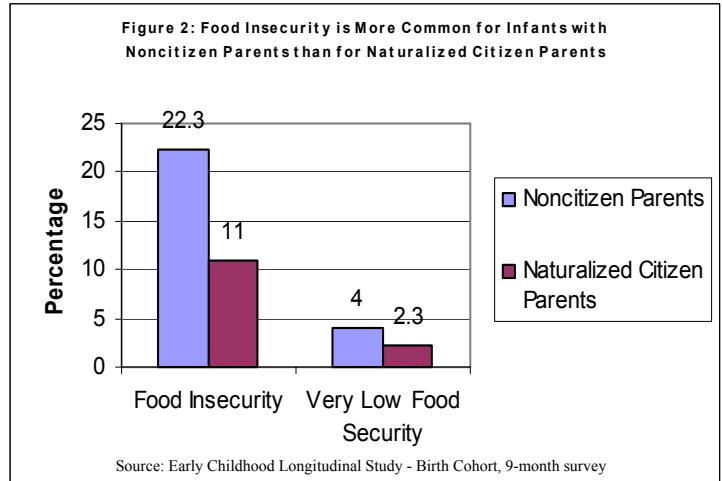
Our analyses confirm previous research that suggests that food insecurity may be more prevalent among children with immigrant parents than children with U.S.-born parents. Figure 1 shows the prevalence of households with food insecurity and very low food security for a sample of young children of immigrants, compared with a sample of young children of U.S.-born parents.

Nearly two in ten infants with immigrant parents (18.8 percent), but just over one in ten infants with native born parents (11.3 percent) lived in food insecure households in 2001-02, while 3.5 percent of infants with immigrant parents lived in households with very low food security (compared with 2.5 percent of infants in native-born families).

The following section is a more in-depth examination of the prevalence of food insecurity among young children of immigrants only (i.e., with two foreign-born parents or a single foreign-born parent). We first look at markers of acculturation, asking whether each of these separately predict low and very low food security. We then



consider multiple demographic characteristics simultaneously to determine which characteristics continue to influence food insecurity after accounting for all other demographic factors.



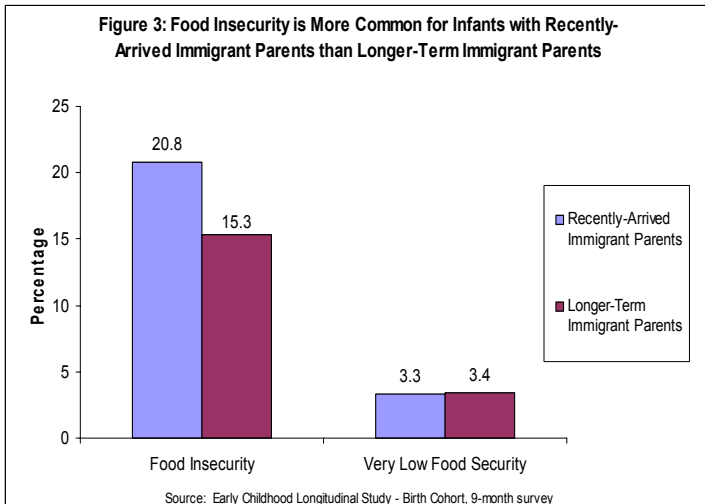
WHEN CONSIDERED INDIVIDUALLY, WHAT MARKERS OF ACCULTURATION ARE ASSOCIATED WITH FOOD INSECURITY?

Children with noncitizen parents were twice as likely to experience food insecurity than those with naturalized citizen parents. Figure 2 shows the prevalence of household food insecurity and very low food security among infants with immigrant parents who have become naturalized citizens compared to those infants with immigrant parents who are not U.S. citizens.

- 22.3 percent of infants with noncitizen parents experienced *food insecurity*, compared with 11 percent of infants with naturalized parents.
- 4 percent of infants of noncitizen parents experienced *very low food security*, compared with 2.3 percent of infants with citizen parents.

Infants with immigrant parents who were recent arrivals to the United States were more likely to live in food insecure households than infants with parents who had lived in the country longer. Figure 3 shows the prevalence of household food insecurity and very low food security for infants with recently-arrived immigrant parents (those who have been in the United States for less than 12 years) and among infants with longer-term immigrant parents (those in the U.S. for 12 or more years). Twelve years was the average length of U.S. residency for immigrant parents in the sample.

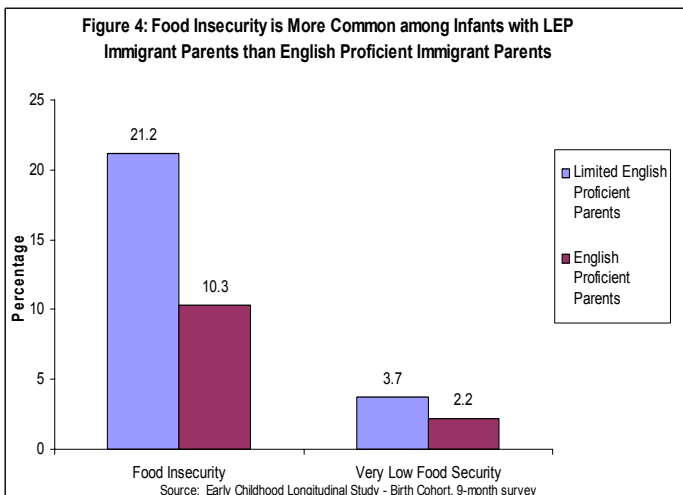
- 20.8 percent of infants with recently-arrived parents lived in *food insecure* households, compared with 15.3 percent of infants with longer-term immigrant parents.



- However, similar low proportions of infants with recently-arrived and longer-term immigrant parents lived in households with *very low food security* (3.3 percent and 3.4 percent, respectively).

Among children of immigrants, infants with Limited English Proficient (LEP) parents (those who do not speak English very well) were twice as likely to live in food insecure households than infants with English proficient parents. Figure 4 shows the prevalence of household food insecurity among young children of immigrants according to parental English proficiency.

- 21.2 percent of infants with LEP parents lived



in *food insecure* households, compared with 10.3 percent of infants with English proficient parents.

- While 3.7 percent of infants with LEP parents lived in households with *very low food security*, only 2.2 percent of infants with English proficient parents lived in such households.

WHAT FACTORS ARE ASSOCIATED WITH FOOD INSECURITY AMONG YOUNG CHILDREN OF IMMIGRANTS WHEN MULTIPLE PARENTAL AND FAMILY CHARACTERISTICS ARE CONSIDERED SIMULTANEOUSLY?

In the previous section, we examined the prevalence of food insecurity among infants and found relatively high rates overall, especially among infants whose parents were less acculturated. We considered these three markers of acculturation separately. It is possible that some markers of acculturation, along with other key background characteristics, are correlated, and that when considered at the same time, not all would continue to be associated with food insecurity. In this section, we discuss analyses that more fully isolate the factors associated with food insecurity among infants in immigrant households by considering a set of predictors simultaneously. While the previous analyses focused on indicators of acculturation among immigrant parents, here we extend the focus to include other demographic factors, such as parental education, age and employment.

- **Parental Citizenship.** Looking only at infants with immigrant parents, food insecurity and very low food security are less common when parents are citizens than when parents are not citizens. Infants whose parents have become naturalized citizens are about half as likely to live in food insecure households as those whose parents have not become citizens. This means that lack of parental citizenship is a risk factor for food insecurity in infants in immigrant households, even with other background characteristics taken into account.
- **Parental Education.** Lower parental educational attainment is also associated with higher likelihood of food insecurity, even with other background characteristics taken into account. Infants whose parents have less than a

high school education or who have completed high school but not college have a higher likelihood of living in food insecure households than do infants whose parents have completed college.

- **Maternal Age.** Infants with younger mothers have higher odds of living in a food insecure household than those with older mothers, even with other background characteristics taken into account.
- **Parental Employment.** Infants whose resident fathers are employed full-time are less likely to live in a food insecure household than infants whose resident fathers are not working, even when other background characteristics are taken into account.
- **Public Benefit Receipt.** Infants in households that have received food stamps have higher odds of food insecurity than those in households in which no one has received food stamps.
- **Length of Time in the U.S. and English Proficiency.** We also considered the influence of parents' length of U.S. residency and English proficiency as potential influences on infants' food security. However, we found no significant associations between these parental characteristics and household food insecurity among infants when taking into account other factors. Length of residency is closely tied with citizenship (because legal immigrants usually cannot become citizens until five years after they enter the country), so that once parents' citizenship was accounted for, the length of time they had been in the country no longer had a significant association with household food insecurity. Differences in levels of education among parents that are English proficient and those with LEP similarly explain much of the association between English proficiency and household food insecurity (i.e., less educated parents are generally LEP).

DISCUSSION

Because children in immigrant families are a growing share of children born in the United States,⁹⁻¹⁰

and because these children have unique experiences stemming from the immigrant experiences of their parents, it is important to understand both the prevalence of food insecurity and the factors that may influence its occurrence in immigrant families. Our analyses show that:

- *Household food insecurity is higher for infants with immigrant parents than for infants with native-born parents.* Food insecurity represents one of several risk factors that children in immigrant families face, and has negative implications for child outcomes such as school achievement and psychological well-being.^{4, 16} Thus our findings suggest that very young children in immigrant families are highly economically vulnerable.
- *Household food insecurity is also higher for infants with less acculturated parents than those with more highly acculturated immigrant parents.* Food insecurity and very low food security are higher for infants with less acculturated parents on all three markers of acculturation analyzed: citizenship, length of U.S. residency, and English proficiency. In fact, infants with parents who are naturalized citizens and English proficient have household food insecurity rates (10-12 percent) comparable to the rate for infants with native-born parents, while the rate for infants whose parents are longer-term immigrants (in the country for more than 12 years) is slightly higher (15 percent). Economic hardship for households with young children may be much more closely related to factors such as citizenship and English proficiency than to their nativity *per se*, since these factors can influence parents' performance in the labor market, their level of social acculturation, and their legal standing in U.S. society. Lack of citizenship and limited English skills are amenable to policy interventions. For instance, lack of citizenship can be addressed by easier pathways to citizenship and legal residence, and resources for those immigrants who are eligible to naturalize. Parental English proficiency can be improved through English language instruction in the workplace, schools, child care facilities, and other locations.

- *When multiple background characteristics are taken into account, parental citizenship continues to predict food security among households with infants.* Even after controlling for parental education, parental work, maternal age, and food stamp receipt, infants with non-citizen parents are more likely to live in food insecure households than those with native-born or naturalized citizen parents. Parental citizenship is an important factor—perhaps more important than length of U.S. residency or even English proficiency—in determining the economic well-being of immigrant households with very young children.
- *Higher parental education is associated with food security among infants with foreign-born parents.* Infants with parents who lack a high school education, or who have a high school education but not a college degree, are less likely to live in food secure households than infants whose parents have at least a college education. Previous research suggests that food insecurity is lower in households where adults are better educated^{4,19} and our results provide additional support for this association when focusing specifically on immigrant households with infants. Thus, investment in immigrant parents' education might yield better labor market outcomes as well as better knowledge of more cost-efficient food sources and better dietary practices for their children.

The federal Food Stamp Program provides important assistance to families experiencing food insecurity. But many households headed by noncitizens are ineligible for food stamps, including all of those who are unauthorized and most legal noncitizens with less than five years of U.S. residency. While their U.S.-born children remain eligible for food stamps, the fact that these noncitizen parents are ineligible leads to lower benefits for these households.²² Yet, our analysis suggests that households with recently-arrived noncitizen parents need food assistance the most, especially households with infants, whose physical and cognitive development are highly dependent on regular and sufficient nutrition.

CONCLUSION

Overall, the findings presented in this research brief demonstrate higher levels of household food insecurity among infants whose parents are immigrants than native born. Further, while certain demographic characteristics appear to be related to food insecurity among immigrant households in a way that previous research suggests function in the population as a whole (such as parental education, maternal age, and father's employment), there are factors specific to immigrant households that suggest those with more acculturated parents experience lower levels of food insecurity. The factor that emerged as the most consistent predictor was citizenship, with those households with non-citizen parents experiencing the highest level of food insecurity.

A significant body of research demonstrates the importance of food security to positive child development, especially in the earliest years. It is, therefore, important to identify ways to support food security among immigrant families with infants, with special consideration given to families in which parents are not citizens. The infants in the national sample used for this analysis are all U.S.-born citizens with the same rights and entitlements as other U.S.-born children; they also represent an important component of the future U.S. workforce. The findings presented in this brief should be seriously considered in federal and state policy deliberations related to food and nutrition, early childhood development, health care reform, and immigration reform.

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ABOUT THE DATA AND METHODS USED FOR THIS BRIEF

Data: All data reported in this brief were taken from the Early Childhood Longitudinal Study – Birth Cohort (ECLS-B) 9-month data collection wave. The ECLS-B is the first longitudinal study conducted in the United States to track a nationally representative sample of children from infancy until the time that they enter school. The study oversamples important populations, such as Asians and Native Americans, twins, and low to moderately low birthweight infants. Data collection is occurring in five waves: at approximately 9 months, at 24 months, at 48 months, at entrance to kindergarten, and at entrance to first grade. The primary modes of data collection are in-person interviews, direct child assessments, and videotaping of mother-child interactions, all occurring during in-home visits. Information on children is also drawn from birth certificates.

The ECLS-B offers several advantages for examining food insecurity and outcomes for infants and toddlers. First, the study includes the USDA Household Food Security Scale.²¹ The ECLS-B asks a series of questions about food insecurity in the household in the 12 months prior to the survey. As a result, researchers can determine whether households were food insecure at any time in the past year and, if so, the severity of the food insecurity. Second, because the same children are followed over a period of years, analyses that look at effects over time can be conducted. Third, as part of the ECLS-B in-home interviews, health and anthropometric indicators – such as the child’s height, weight, and middle upper arm circumference – and developmental indicators – such as mental proficiency – are collected. Collecting data on these indicators enables researchers to create variables that assess a range of outcomes. Fourth, the sample includes large numbers of young children with foreign-born parents. Approximately half of the sample of children with foreign-born parents is Hispanic and the other half is Asian.

Methods: For our analyses, we used Ordinal Logistic regression models. All data were weighted to adjust for the complex sample design of the ECLS-B.

Measures:

Household food security was measured at nine months using the USDA Household Food Security Scale.⁷ An ordinal variable was created based on parent responses to 18 questions regarding a variety of food insecurity issues (e.g., experiencing hunger, skipping meals, and running out of food) over the past 12 months. This variable was coded to identify the child’s household as either (0) *having high or marginal food security*, (1) *having low food security*, or (2) *having very low food security*.

Citizenship status was measured as a dichotomous variable. If both parents were not U.S. citizens, parents’ citizenship status was coded as noncitizen; alternatively, if one or both parents were naturalized U.S. citizens, citizenship status was coded as naturalized citizen.

Parental education indicates the highest level of education attained by either residential parent or education level of the only residential parent at 9 months. It was coded as four dichotomous variables: less than high school, high school degree/equivalent, vocational school/some college, and bachelor’s degree or higher, with bachelor’s degree or higher serving as the reference category.

Maternal employment was measured at 9 months with dichotomous variables indicating whether the mother had full-time employment (35 hours or more a week), part-time employment (less than 35 hours a week), or was not working (either unemployed or not in the labor force), with “not working” serving as the reference category.

Receipt of benefits was measured using a dichotomous variable for receipt of food stamps (whether anyone in the household received food stamps since the birth of the child).

Maternal age is a continuous variable based on the child’s birth certificate.

Length of U.S. residency was determined based on parents’ report of how long, at the time of the 9-month survey, they had been living in the United States. If neither parent had been in the United States for more than 12 years, parents were treated as recently-arrived immigrants and coded as (0). If one or both parents had been in the U.S. for more than 12 years, parents were treated as longer-term immigrants and coded as (1). Twelve years was the average for immigrant parents in the sample.

English proficiency was measured based on parents’ responses, at the time of the 9-month survey, to four questions about how well they could read, speak, understand and write English. Parents were considered English proficient if they indicated they could do at least three of these things “pretty well” or “very well.” If both parents were English proficient they were coded as (0). Families where at least one parent was limited English proficient (LEP) were coded as (1).

Note: Household poverty was not included as a control factor in the analysis because of its very high correlation with food insecurity. Including both variables in regression models resulted in unreliable and insignificant results.

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