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#### ENFORCEMENT AND IMMIGRANT LOCATION CHOICE

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#### **ABSTRACT**

This paper investigates the effect of local immigration enforcement regimes on the migration decisions of the foreign born. Specifically, the analysis uses individual level American Community Survey data to examine the effect of recent 287(g) agreements which allow state and local law enforcement agencies to enforce Federal immigration law. The results suggest that one type of 287(g) agreement – the controversial local "task force" model emphasizing street enforcement – nearly doubles the propensity for the foreign-born to relocate within the United States. The largest effects are observed among non-citizens with college education, suggesting that aggressive enforcement policies may be missing their intended targets. No similar effect is found for the native born. After the extreme case of Maricopa County is excluded, there is no evidence that local enforcement causes the foreign-born to exit the United States or deters their entry from abroad. Rather, 287(g) task force agreements encourage the foreign born to move to a new Census division or region within the United States.

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#### I. Introduction

The recent recession stemmed the tide of immigration into the United States, but the estimated number of foreign born is around 38 million, representing more than 12% of the population. Approximately 11 million immigrants are undocumented (Hoefer, Rytina, and Baker, 2012). Policy-makers have wrestled with the issue of undocumented immigration, and policy responses have varied substantially across time and across local areas within the United States. In the past decade, there has been a marked devolution of immigration enforcement to local governments, further exacerbating local differences in policy regimes. Nevertheless, little is known about how immigrants respond to local enforcement policies.

A key impetus for aggressive immigration enforcement is to reduce the number of undocumented immigrants in a local area; conversely, localities opting for less aggressive enforcement often do so in part to attract and retain the foreign born. Much of the existing work on immigrant location choice focuses on immigrant ethnic networks (for example, Bauer, Epstein, and Gang, 2005) and local economic conditions (for example, Borjas, 2001, and Cadena and Kovak, 2013). While these factors are important determinants of immigrant location, they do not speak to the impact of enforcement policy on location decisions of the foreign born. Empirical evidence on the degree to which immigrant location decisions respond to the policy climate is limited.

Understanding immigrant location choice is of broader interest as well. Immigrants play an important role in local labor markets, both because they constitute a substantial portion of the workforce (15.8 percent in 2010)<sup>2</sup> and because they are a key driver of workforce growth. Furthermore, location decisions of immigrants respond more to local labor market conditions than those of native born workers and help to equilibrate differences across labor markets within the United States (Borjas, 2001).

<sup>&</sup>lt;sup>1</sup> For example, see Preston, Julia, "Ailing Midwest Cities Extend a Welcoming Hand to Immigrants," *New York Times*, October 7, 2013, http://nyti.ms/15QzhvV.

<sup>&</sup>lt;sup>2</sup> http://www.bls.gov/news.release/forbrn.nr0.htm

The analysis presented here focuses on the understudied role of local immigration enforcement policy in determining the location choice of immigrants. In particular, the analysis explores the recent devolution of enforcement to local law enforcement that has occurred through section 287(g) of the 1996 Immigration and Nationality Act. Since 2002, almost eighty state and local law enforcement agencies have signed 287(g) agreements with the Federal government, which allow these agencies to enforce Federal immigration law. Because enforcement decisions are made at a local level, they may influence immigrant decisions of where to settle in the United States.

As the nation debates immigration policy, understanding the impacts of enforcement on immigrants' behavior is critically important. The effect of immigration-related policies on residential choice is of particular interest to local policy-makers. If regions seek to boost labor force growth or change the local skill mix by changing the foreign-born population, it is important to understand what policies facilitate or discourage immigrant inflows. Conversely, as states and local law enforcement agencies consider adopting immigration-related policies, it is important to know what implications these policies have for the composition of the local labor force. Enforcement activity in other parts of the country may also have direct implications for projected foreign-born inflows to areas with less aggressive enforcement activity. These impacts will be of particular interest to employers who rely on foreign-born labor.

This paper uses data from the American Community Survey to examine migration responses to local enforcement agreements. First, an aggregate analysis offers a bird's eye view of migration. One can estimate cross-national inflows to and outflows from an area and outflows from the United States by comparing numbers of immigrants in a local area in a given year, the number of immigrants remaining in the United States in the following year who indicate that they lived in the local area in the previous year, and the number of immigrants in the local area who said they lived abroad in the previous year. The results suggest that - once the extreme case of Maricopa County is excluded - cross-border migration flows are not affected by local enforcement.

Data analyzed at the individual level offer more detail and elucidate four patterns that would not otherwise be evident. First, immigrant migration decisions respond only to the (recently ended) task force model of 287(g) enforcement. Second, in most circumstances, immigrants responding to local enforcement relocate within the United States rather than leaving the country. The impact of full task force coverage on internal migration is similar to that of a fifteen percent decline in predicted employment demand. Third, local enforcement affects the decision to leave an area but does not deter foreign-born inflows, either from abroad or other parts of the United States. Fourth, college educated non-citizens are more responsive to task force enforcement, suggesting that aggressive enforcement policies may be missing their intended targets.

The results have policy implications at both the local and Federal levels. The Obama administration ended all task force agreements at the end of 2012 and is developing alternative models of enforcement. These include the Secure Communities program, which more closely resembles the jail enforcement 287(g) model, and the Criminal Alien Program, which has a mission that partially overlaps that of the task force model. These programs are on track to achieve near universal adoption across the country, but their exact form is still evolving. Furthermore, local governments will continue to have discretion in their implementation of these Federal policies. Understanding how enforcement decisions are likely to affect immigrant location choices is a key input into developing effective policy.

#### **II. Previous Literature**

There is a rich literature examining immigrant location choice within the United States. Analysts are particularly interested in location choice because it is central to understanding how immigration affects the labor market outcomes of the native-born within the U.S. A number of papers have exploited the geographic distribution of immigrants over time to identify wage impacts, for example. Because immigrants seek destinations with good labor market

conditions, the analyses typically exploit exogenous variation in the geographic distribution. For example, many previous papers have used variations of the supply-push instrument pioneered by Card (2001) which uses the interaction of initial country-of-origin shares in a local area and national trends in immigrant inflows from those countries-of-origin. Borjas (2006) has argued that immigrant inflows lead to native outflows from a local area, so that the wage impacts of immigration are diffused across the country. While a full discussion of the debate is beyond the scope of this paper, understanding internal migration decisions of immigrants is a key input to the understanding of the national impacts of immigration.

Immigrant location decisions are also of interest in their own right. For example, immigrant location choices are believed to equilibrate wages across local labor markets within the U.S. (Borjas 2001, and Cadena and Kovak, 2013). Immigrant location decisions affect a wide range of other outcomes such as native residential location decisions (Wozniak and Murray, 2012), local rents (Saiz, 2003, Saiz, 2007), native female labor supply (Cortes and Tesada, 2011), firm production decisions (Lewis, 2005), and school segregation (Cascio and Lewis, 2012). A number of previous papers have examined the impacts of immigrant concentration in particular areas (Bertrand *et al.*, 2003, Funkhouser, 2000, Jaeger, 2007, and Edin *et al.*, 2003). Researchers have also explored the impact of the safety net on immigrant location choice (Borjas and Hilton, 1996, Borjas, 1999, Dodson, 2001, and Buckley, 1996).

In contrast, the literature on the impacts of immigration enforcement is relatively new. At the national level, Ortega and Peri (2013) show that immigration restrictions do affect cross-country migration flows whereas Orrenius and Zavodny (2003) find no evidence that the 1986 amnesty for undocumented immigrants affected long run migration flows. There are also several papers exploring the impacts of local enforcement on immigrant labor market outcomes. For example, see Davila and Pagan (1997), Bansak (2005), and Orrenius and

Zavodny (2009).<sup>3</sup> Watson (2010) documents impacts of enforcement on Medicaid participation among children of non-citizens.

Several recent papers have examined effects of local enforcement on migration using aggregate data. Bohn, Lofstrom, and Raphael (forthcoming) document declines in the foreign-born population in Arizona following restrictive state legislation. Kostandini, Mykerezi, and Escalante (2012) focus on the agricultural sector and find that local 287(g) enforcement reduces immigrant population, changed farm inputs, and reduced farm profits in affected counties. O'Neil (2013) finds no systematic relationship between 287(g) implementation and Hispanic or foreign born population growth. The current analysis builds on existing studies by considering individual level migration decisions, allowing for a more nuanced understanding of the relationship between enforcement policy and immigrant location choice.

#### **III. Recent Enforcement Policy**

Internal Federal immigration enforcement has declined markedly over the past several years. This shift reflects both a decline in undocumented immigrants residing in the United States (there has been an estimated 8% decline in the unauthorized population since 2007)<sup>4</sup> and a policy shift away from non-criminal apprehensions.

Despite declines in Federal enforcement, there has been a recent increase in enforcement of immigration law by *local* entities. Section 287(g) of the 1996 Illegal Immigration Reform and Immigrant Responsibility Act offered the opportunity for local law enforcement officers to enforce Federal immigration law after receiving training from U.S Immigration and Customs Enforcement (ICE); prior to the Act local law enforcement did not have jurisdiction over

6

<sup>&</sup>lt;sup>3</sup> Davila and Pagan (1997) find evidence that monitoring of selected firms had impacts on employment, wages, and industry choice of immigrants. Bansak (2005) also finds that the 1986 Immigration Reform and Control Act adversely affected wages and employment for Mexican workers, and Orrenius and Zavodny (2009) find similar impacts as the result of recent enforcement policies.

<sup>4</sup> http://www.pewhispanic.org/2011/02/01/ii-current-estimates-and-trends/

immigration-related matters.<sup>5</sup> The 287 provision was largely ignored until the events of September 11<sup>th</sup> 2001 refocused national attention on immigration policy (Lacayo, 2010), and starting in 2002 states and localities began to pursue 287(g) agreements. It took some time for the practice to become widespread, but as of 2011 (the end of the sample period for this analysis), there were 68 local law enforcement agencies in 23 states that were currently in one or more agreements with ICE to enable local enforcement. Most of 287(g) agreements were initiated in 2007 or later, as shown in Figure 1. A primary determinant of applying to the 287(g) program is short-term growth in the local foreign-born population (Shahani and Greene, 2009), whereas a substantial long-standing foreign born population promotes integrative or inclusive policies (Boushey and Luedtke, 2011).

The 287(g) program is controversial because it allows state and local law enforcement entities to apply to the Federal government to play a role in enforcement of immigration law, which has traditionally been the purview of Federal officers. Agencies in the 287(g) program receive Federal training and are then allowed to perform enforcement functions. In areas with local "task force" 287(g) agreements, officers are permitted to investigate immigration violations in the field and to ask individuals on the street for proof of legal presence if they have reasonable cause to suspect a violation. Other areas have "jail enforcement" agreements which facilitate the investigation of legal status of those arrested for other crimes. Some agencies have combined task force and jail agreements; in those cases they are typically implemented at the same time. The resulting correlation between types of agreements is around 0.1.

Detractors argue that 287(g) encourages street harassment of minorities, while proponents view it as an effective tool in enforcing immigration law and encouraging "self-deportation." The Obama administration ended all task force agreements associated with the 287(g) program at the end of 2012, so these programs are no longer in effect. Other ICE programs enabling local enforcement such as the Secure Communities Program and the Criminal Alien Program are

<sup>&</sup>lt;sup>5</sup> More generally, the 200-page 1996 Act expanded resources for enforcement, changed deportation procedures, revamped employer sanctions, and made a variety of changes to the legal immigration process.

poised to take their place. Understanding how immigrants respond to different enforcement regimes is an important input into the effective design of new policies.

Despite the decline of 287(g), there has been a recent wave of state and local legislation targeting immigrants, most prominently illustrated by the far-reaching Arizona legislation (known as SB 1070) passed in April 2010. In 2012, the U.S. Supreme Court upheld one key portion of the law allowing police to check the immigration status of those they detain. "Copycat" state legislative activity has been reported in 26 states (<a href="http://www.nilc.org/state-immenfleg-2012.html">http://www.nilc.org/state-immenfleg-2012.html</a>) and five states passed similar legislation in 2011. There are also numerous anti-immigrant bills at the local levels. Though the effects of the recent state legislation are not yet observable, the 287(g) program offers some insight into the likely effects of these aggressive sub-national enforcement regimes.

More generally, states and localities make many policy decisions related to immigrants. States differ on the extent to which they offer safety net benefits to undocumented and legal immigrants. For example, about half of states exclude legal immigrants from welfare and Medicaid benefits for their first five years in the United States. Active policy discussions at the state level include whether undocumented students should pay in-state college tuition rates, whether undocumented immigrants should be allowed to obtain driver's licenses, and whether employers need to use electronic immigration status verification systems (E-Verify). On the other hand, many localities have issued policy statements that they will not pursue enforcement actions under certain conditions; these jurisdictions have been informally dubbed "sanctuary cities." There is little evidence on how immigrants weigh the complex local policy environment in their location decisions.

<sup>&</sup>lt;sup>6</sup> Alabama, Georgia, Indiana, South Carolina, and Utah passed similar laws in 2011. According to the national conference of state legislatures, "[t]he laws typically include provisions that require law enforcement to attempt to determine the immigration status of a person involved in a lawful stop; allow state residents to sue state and local agencies for noncompliance with immigration enforcement; require E-Verify; and make it a state violation for failure to carry an alien registration document" (<a href="http://www.ncsl.org/issues-research/immig/omnibus-immigration-legislation.aspx">http://www.ncsl.org/issues-research/immig/omnibus-immigration-legislation.aspx</a>). The laws have been wholly or partly enjoined pending legal challenges.

<sup>&</sup>lt;sup>7</sup> The designation "sanctuary city" is unofficial and there is disagreement over what types of policy regimes should qualify.

In sum, relatively little attention has been paid to the local enforcement regime and how it affects where the foreign-born live. As noted above, recent papers on the subject (Kostandini et al., 2012, and O'Neil, 2013) have mixed findings. This paper uses individual level data to analyze how the 287(g) program affects year-to-year migration flows within the United States.

#### IV. Data and Methods

The primary data source used in the analysis is the American Community Survey (ACS) for years 2005-2011 provided by the Integrated Public Use Microdata Series (Ruggles *et al.,* 2010). The ACS is a large, nationally representative survey run by the Census Bureau. Importantly, the ACS collects information on birthplace, citizenship, and residence in the year prior to the survey. Thus, it is possible to construct one-year migration estimates for six cohorts (2005-2010) and to observe detailed migration decisions for immigrants living in the United States for two consecutive years. Because the ACS is relatively new, it has not been used very often to examine sub-state migration patterns.

The publicly available Census/ACS provides 543 geographic units which are consistently identified over time and cover the entire United States. In cases where there are multiple such units within a metropolitan area (defined according to 2000 boundaries) and state I combine areas; this sometimes requires joining metropolitan areas or a metropolitan area and a rural area into a single geographic region. The end result is 338 local geographic areas used for analysis. The local areas are defined such that they do not cross state lines. These areas are shown in Figure 2, with task force agreement areas outlined in red.

9

<sup>&</sup>lt;sup>8</sup> "Immigrant" as defined here includes all those born outside the 50 United States and Washington, D.C. who were not a citizen at birth. "Native" includes all those born within the 50 United States and Washington, D.C. Individuals with citizenship at birth born in outlying areas (including Puerto Rico) are excluded. The results are not sensitive to their classification.

<sup>&</sup>lt;sup>9</sup> Wozniak and Murray (2012) were among the first to use it for this purpose.

287(g) agreement data is collected by examining current and historical agreements posted on the ICE website, <sup>10</sup> screenshots of the website from earlier periods, published reports including Lacayo (2010) and Vaughan and Edwards (2009), and news reports. These sources were used to construct start and end dates for all 287(g) agreements that existed at any time; in six cases end dates were not known to the exact month and were approximated based on available information. All task force agreements were ended at the end of 2012, but this date does not overlap with my sample period.

Enforcement agreements can cover local police jurisdictions or states. Given that Kostandini *et al.* find differential effects of local versus state agreements, I separate them in the analysis. Furthermore, local task force agreements and local jail enforcement agreements are analyzed separately because they have different features (as described above) and may generate differing migration responses.

To create an index of local 287(g) agreement intensity, the average number of local agreements faced by a given resident of a local area is calculated. In many cases an agreement might cover only a portion of a local geographic area, so the value of the index for the local area would reflect an average of values of one for the covered population and values of zero for the non-covered population. Furthermore, individuals might be covered by two local agreements if their county police force and their city police force each have an agreement, for example. If an agreement was not in effect for the full year, the value of the index is the fraction of covered months over the year. For example, if all local task force agreements in local area a in year b are indexed by b, all local jail agreements in local area b in year b are indexed by b, all statewide agreements are indexed by b, and individuals living in the local area are indexed by b:

$$TaskForceIndex_{at} = 1/n \sum_{i=1}^{n} \sum_{f=1}^{F} \frac{1}{12} MonthsCoveredByTaskForceAgreement_{iaft}$$

<sup>&</sup>lt;sup>10</sup> http://www.ice.gov/287(g)/ contains a list of current agreements and some historical documents.

<sup>&</sup>lt;sup>11</sup> Local areas are combinations of Census public use microdata areas and may include several cities or counties. Local law enforcement agencies typically operate at the County, City, or Town level and are fully enclosed within a single local area. For example, if 25% of the overall population in a local area resides in City X, and City X is the only part of the local area that has an agreement, then local area coverage is 0.25.

$$JailEnforcementIndex_{at} = 1/n \sum_{i=1}^{n} \sum_{j=1}^{J} \frac{1}{12} MonthsCoveredByJailEnfAgreement_{iajt}$$

The statewide agreement index variable is similar in that it reflects the average number of statewide agreements faced by a given resident of a local area. This variable takes a value of zero or one except when the agreement is in effect for only part of the year:

$$StatewideIndex_{at} = 1/n \sum_{i=1}^{n} \sum_{s=1}^{S} \frac{1}{12} MonthsCoveredByStatewideAgreement_{iast}$$

The analysis is composed of three parts. First, I aggregate ACS data by year and initial local area, and estimate migration decisions for the population initially residing in the area. By comparing the population in the ACS who report the local area as their place of residence in the prior year to the population residing there in the prior ACS year, it is possible to construct exit rates from the United States and migration to an area from abroad. Because the ACS is a sample, it is possible to estimate negative migration rates – i.e. in some cases there are more people in year t reporting that they lived in a given area in t-t than there are people counted in the area in t-t. These are entered into the analysis without adjustment. Death is indistinguishable from exiting the United States in the data; I restrict the sample to those ages t to 65 to minimize the impact of death on the estimates. In addition, the first year of data is excluded due to incomplete counting of residents of group quarters in the 2005 ACS, making the computation of an accurate denominator difficult.

The aggregate part of the analysis also uses aggregated individual-level year-to-year migration flows to construct internal migration statistics. For example, one can observe the fraction of individuals living in area a in time t who subsequently move to a different local area, state, Census division, or Census region by time t+1 as a function of local characteristics in time t.

11

<sup>&</sup>lt;sup>12</sup> For example, one might estimate that there are 10,000 immigrants in Local Area X in 2006 using 2006 ACS data. Using 2007 ACS data, one can then estimate the number of people living in the United States in 2007 who report having lived in Local Area X in 2006. If that number is 9900, the estimated out-migration rate from the United States would be 1 percent.

<sup>&</sup>lt;sup>13</sup> Lleras-Muney (2005) faces a similar issue in the context of synthetic cohort mortality rates. She notes that using the estimated rates does not affect the consistency of the estimates.

<sup>&</sup>lt;sup>14</sup> The results are not substantively affected by excluding the first year.

The denominator here can be the local area population estimated using the year *t* ACS data or the local area population estimated using migration history in the year *t+1* ACS data. The latter increases precision and is used to estimate internal migration conditional on remaining in the United States.

The empirical model is as follows:

$$FractionMoved_{at} = B1TaskForceIndex_{at} + B2JailEnforcementIndex_{at} +$$
 
$$B3StatewideIndex_{at} + X_{at} \propto + \partial_t + \varphi_a + e_{at}$$

The key coefficients indicate the effect of enforcement on the fraction of the population in local area a in year t that moved by the following year. A vector of controls includes a Bartik-style shift-share index for local labor demand generally and a second Bartik index for immigrant specific labor demand. These are important controls because the sample time frame coincides with the great recession. Predicted immigrant population is a supply-push-style index based on national country-of-origin trends interacted with initial country-of-origin shares. I also control for the fraction of the population arriving in the last five years because this may affect migration patterns.

Regressions include year dummies to account for national migration trends and local area dummies to account for permanent characteristics of locations that may affect migration. As an additional outcome, I also examine new migrant inflows divided by the initial foreign born population. Regressions are weighted by 2005 immigrant population and standard errors are clustered at the local area level to account for serially correlated local shocks.

Panel A of Table 1 reports summary statistics for the 2028 local area-years in the aggregate analysis. For some constructed variables the first year of the analysis is excluded and the

<sup>16</sup> Initial shares are calculated using 2000 data. The Census 2000 rather than ACS 2005 dataset is used because the larger sample size allows for a more accurate assessment of immigrant populations across groups.

12

<sup>&</sup>lt;sup>15</sup> Specifically, for each local area the initial (year 2005) employment share in each of 15 industry groups is determined. These shares are then interacted with the difference between log employment in the industry in the reference year and log employment in the industry in the initial year. These interactions of these shares\*shifts are aggregated to generate an index of predicted labor demand in each local area relative to 2005. In the immigrant-specific index, the initial share weights are determined by the industry distribution of the initial immigrant

number of local area-year observations is reduced to 1690.<sup>17</sup> The average out-migration from the United States is about two percent and the migration rate across local areas is about three percent conditional on staying in the United States. The average task force coverage is two percent, suggesting a low rate of exposure to the policy.

The second part of the analysis exploits the individual level micro-data which allows one to observe migration decisions for individuals who were living within the United States for two consecutive years. This part of the analysis examines determinants of migration for foreign-born residents staying in the United States for two consecutive years. The sample is restricted to non-institutionalized adults ages 18 to 49 to focus on the individual level migration decision among those most likely to be making such a decision. Children and older adults are excluded from this part of the analysis. The empirical model is similar to that above except that the analysis is at the individual level and allows for individual level controls:

$$Moved_{iat} = B1TaskForceIndex_{at} + B2JailEnforcementIndex_{at} +$$
 
$$B3StatewideIndex_{at} + X_{iat} \propto + \partial_t + \varphi_a + e_{iat}$$

The summary statistics for the individual level data are shown in Table 1b. The individual level analysis controls for whether the immigrant arrived in the last five years, gender, marital status, presence of own school age children in the household, educational attainment in four categories (less than high school, high school, some college, college grad or more), age in two categories (18-29 or 30-49) and country of birth in 22 categories.

<sup>&</sup>lt;sup>17</sup> Year 2005 ACS data do not cover institutionalized population, so constructed variables that rely on prior year estimated population in the denominator are measured incorrectly.

#### V. Results

#### A. Aggregate Analysis

Table 2 shows the results of the aggregate analysis of cross-border migration for the years 2006-2011. The unit of observation is the local area-year, where local areas are defined as described above. The advantages of the aggregate analyses are that (1) they most closely follow previous work and (2) they allow for estimation of exits from the United States in a way that is not possible in the individual-level migration data. Because the results are sensitive to the inclusion of Maricopa County, Arizona – a local area with extreme levels of enforcement in some years – estimates are shown with and without this area included.

Three types of 287(g) agreements (local task force, local jail enforcement, and statewide) are considered. Column I suggests that full coverage of a local area with a task force agreement affects exits from the United States. Full coverage appears to increase the fraction of the initial population that exits the United States in the subsequent year by 8.7 percentage points, a dramatic increase over the mean of 1.7 percent. However, the relationship between enforcement and exits is driven entirely by the inclusion of Maricopa County. Maricopa County (which includes Phoenix and surrounding areas) is known for intensive and often controversial enforcement tactics under the leadership of Sheriff Joe Arpaio. Thus, the intensity of enforcement in this area is unusual. Furthermore, because the area is a short distance from the Mexican border, out-migration may be a more attractive response in Maricopa than it would be elsewhere. Excluding Maricopa, there is no evidence that 287(g) enforcement drives out-migration from the United States, as shown in column II of Table 2.<sup>18</sup>

Table 2 also shows the impact of 287(g) enforcement on inflows from abroad to a particular local area. In the full sample, it does appear that enforcement reduces inflows from abroad. Full local task force coverage yields a reduction of inflows by 1.3 percentage points on a base of 3.1 percent. Again, these results are sensitive to the inclusion of Maricopa County. Outside of

<sup>&</sup>lt;sup>18</sup> Further analysis indicates that eliminating just one year of data for Maricopa County (the migration decision between 2009 and 2010) eliminates the significant relationship between 287(g) task force agreements and cross-border migration.

Maricopa, there is no statistically significant impact of enforcement on inflows from abroad to a local area. Jail enforcement agreements and statewide enforcement have no measurable impact on cross-border out-migration or inflows.

Table 3 investigates the effect of enforcement on internal migration (conditional on staying in the United States) and inflows from other parts of the United States. Panels A and B show results for immigrants with and without Maricopa County included. In both cases, local task force agreements increase the probability of relocation within the United States. For example, the fraction of immigrants moving out of state increases 0.99 to 1.38 percentage points (45 to 63 percent increase over baseline), out of the Census division increases 0.83 to 1.58 percentage points (52 to 99 percent increase over baseline), and out of the Census region increases 0.54 to 0.96 percentage points (45 to 80 percent over baseline).

Interestingly, task force agreements do not appear to affect inflows from other parts of the United States, as shown in the final column of Table 3. This result suggests that task force agreements act as a "push" to prompt relocations from an area but do not affect "pull" by deterring new arrivals. Furthermore, there is little evidence that the jail enforcement or statewide agreements affect internal migration decisions.

An obvious concern is that unobserved economic factors that coincide with task force policies are driving immigrants away from task force areas. The sample period of one of economic volatility, and the year fixed effects incorporated in the model do not control for differences in the magnitude of economic shocks. One way to examine this possibility is to investigate the effect of enforcement on the native born as a placebo test. Panels C and D reject the notion that 287(g) agreements drive native migration across divisions or regions, or affect native inflows. Therefore it seems likely that the migration of immigrants is due to policy changes of particular relevance to immigrants rather than unobserved economic conditions. Further investigation of individual-level responses by both immigrants and natives is presented below.

15

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<sup>&</sup>lt;sup>19</sup> It is important to keep in mind that the foreign-born may respond differently than natives to economic conditions, as suggested by Cadena and Kovak (2013). This possibility is considered in the fully interacted models

In sum, the aggregate analysis suggests that task force 287(g) agreements encourage immigrants to leave a local area and relocate to other parts of the United States. Outside of the extreme example of Maricopa County, there is no evidence that 287(g) agreements affect international flows.

#### **B. Individual Analysis**

Analysis of the individual migration decision for foreign-born individuals who remain in the United States for two consecutive years is shown in Table 4. The analysis is restricted to the non-institutionalized population ages 18 to 49, and results are shown with and without Maricopa County.<sup>20</sup>

The results suggest that implementation of task force agreements increase the probability of a foreign-born adult moving out of the local area, state, division, and region, conditional on remaining in the United States. For example, estimates from the full sample imply that full task force coverage increases the probability that an immigrant will choose to exit the state by 1.1 percentage points, the Census division by 1.0 percentage points, and the Census region by 0.8 percentage points. Results excluding Maricopa County are larger in magnitude – 1.4 percentage points, 1.9 percentage points, and 1.2 percentage points, respectively. These figures are similar to what was estimated in the aggregate analysis and represent a 57 percent to a 97 percent increase over baseline migration levels. The results imply that those who are induced to leave their local area typically leave the Census division and often the Census region. As in the aggregate analysis, there is no evidence that jail enforcement or statewide agreements cause migration out of a local area.

The coefficients on the controls offer further insight into migration behavior of the foreign born. Immigrants are more likely to leave an area if employment demand for their skills is weak, if there is a decline in the predicted immigrant population in their area (based on

in Tables 5 and 6. In Table A1, unemployment rates rather than Bartik instruments are used as an alternative control for local economic conditions. The results are not sensitive to this change.

<sup>&</sup>lt;sup>20</sup> Enforcement has a positive but statistically insignificant effect on institutionalization. Results with the institutionalized population included in the sample are shown in the appendix.

national trends interacted with initial country-of-origin shares), if they arrived to the United States within the last five years, if they are male, if they do not have school age children at home, if they are more educated, or if they are younger adults Migration rates are not statistically different across years after controlling for other factors (results not shown), but year dummies are included in all models. For purposes of comparison, column VIII suggests that full local task force coverage has the same impact as a 10-15 percent decrease in immigrant-specific labor demand.

As in the aggregate analysis, it is important to consider the possibility that unobserved economic factors that are driving migration away from an area. The regressions include two Bartik-style controls for employment demand, but these may not fully capture local economic shocks. <sup>21</sup> I consider two versions of a placebo test using the native born. One simply repeats the analysis with a native born sample. The second reweights the native sample so that its characteristics more closely approximate the immigrant sample, where cells are determined by initial local area, sex, age category (18-29 or 30-49), and education category (no high school degree, high school degree exactly, some college, college graduate or more). The results of the exercise are shown in Table 5. Panel A shows estimates for immigrants, Panel B shows estimates for natives, and Panel C shows the estimates for natives reweighted as described above. Maricopa County is excluded, but the results (not shown) are qualitatively similar when it is included.

Regardless of re-weighting, results for natives are uniformly negative and mostly insignificant. That is, natives do not exit local areas with aggressive immigration enforcement in the way that immigrants do. The difference between immigrants and natives in a fully interacted model is shown in Panel D of Table 5. There differences between immigrants and natives are statistically significant; immigrants are 1.7 to 2.3 percentage points more likely than natives to move out of an area under a full task force enforcement regime.

<sup>&</sup>lt;sup>21</sup> Controlling for the unemployment rate is inappropriate because it is directly affected by out-migration. Nevertheless, results are similar if unemployment rather than Bartik demand measures are used, as shown in Appendix Table 1.

Table 6 shows the divisional response by education level. Among the foreign born in general and non-citizens in particular, the effects of task force enforcement are monotonically increasing in educational attainment. This may be because more educated immigrants (like more educated natives) are more mobile and better able to respond to policy changes.<sup>22</sup> Nevertheless, it is surprising because undocumented immigrants often have low levels of educational attainment.

It is also apparent from Table 6 that there are differences between immigrants and natives even within education groups. Panel C shows results for natives and Panel D shows the difference between immigrants and natives. The differential response is statistically significant among those with some college or a college degree. There is some evidence that the least educated natives are *less* likely to move under an aggressive enforcement regime.

The education results suggest that aggressive enforcement policies may be missing their intended targets. Highly educated immigrants may be exiting local areas not because they fear deportation but because they are averse to the policy climate associated with a strict enforcement regime. Undocumented immigrants directly targeted by enforcement may not have the knowledge or wherewithal to move to a safer environment, though the analysis cannot provide any direct evidence on this question.

#### C. Robustness

The robustness of the relationship between enforcement and immigrant migration is examined in Appendix Table 1.<sup>23</sup> Baseline results for individual cross-divisional moves are shown in column I. Column II shows results without demographic controls; results are largely unchanged. Column III evaluates the impact of local task force agreements without controlling for the other types of agreements. The measured effect remains positive and significant.

<sup>22</sup> This pattern does not hold for naturalized citizens. Less educated naturalized citizens do move in response to task force enforcement (results not shown).

<sup>&</sup>lt;sup>23</sup> All models in Appendix Tables 1,2, and 3 omit Maricopa County.

Column IV shows the effect of using unemployment rates rather than Bartik instruments to model the economic climate. Unemployment rates are advantageous in that they capture idiosyncratic shocks in a way that the Bartik measures do not. However, they also respond directly to the migration rate and therefore are not a preferred measure of economic conditions. Nevertheless, results are similar to the baseline when the unemployment rate is used as an alternative to the Bartik measure.

Column V addresses the possibility that alternative immigrant-specific policies affect migration and confound the estimated effects of 287(g). For example, a control is included for whether the state allows the undocumented residents to receive in-state tuition benefits. Though this policy arena has been active very recently, there were only three state changes between 2005 and 2010. The model also includes a dummy indicating whether any electronic employment verification (E-Verify) was mandated at the time in the state. During the study period, most of the e-verify laws in effect only applied to a small portion of employers in the state. The analysis lacks the statistical power to evaluate the effects of these state policies, but the controls do not affect the main results.

There may be additional unobserved state-level policies that affect the foreign born. For example, Bohn, Loftstrom, and Raphael (forthcoming) find a migration response associated with a 2007 Arizona law. To address the possibility that idiosyncratic state laws are driving the results, columns VI repeats the exercise using state\*year fixed effects. These models rely solely on within-state variation over time to identify the effects of 287(g). Controlling for state\*year effects reduces the magnitude of the estimated impact of task force agreements, but the effect is still positive and significant.

Column VII of Appendix Table 1 controls for individual industry of employment in fifteen categories. Because the industry is measured after the potential move it may be endogenous to the migration decision. Nevertheless, inclusion of the industry controls does not substantively change the main result.

Column VIII includes the institutionalized population in the analysis. The magnitude of the coefficient is somewhat smaller and marginally significant. One would not expect the

institutionalized population to migrate in response to immigration enforcement, so it is not surprising that the estimated effect is weaker.

Finally, using a logit model rather than a linear probability model yields positive and statistically significant effects for task force enforcement. Column IX reports odds ratios from a logit model. The coefficients imply that the odds of migrating are more than doubled under full task force coverage. As in baseline the linear probability model, there is no significant impact for jail enforcement or statewide enforcement.

Appendix Table 2 repeats the robustness checks in Appendix Table 1 with regional moves as the outcome of interest. The results are significant and of similar magnitude across most specifications. When the institutionalized are included, the effect of task force agreements on regional moves is smaller but retains significance at the 10 percent level. The logit model results suggest that task force agreements more than double the odds of a regional move.

Appendix Table 3 examines the results conditioned on industry of employment, where industry is collapsed into seven categories. This exercise shows that the results are robust to within-industry comparisons between immigrants and natives. It also demonstrates that those who migrate in response to enforcement are disproportionately represented in the professional services/FIRE as well as in business and personal services. It is important to keep in mind that industry is observed after the potential move, so it may be endogenous to the migration decision itself. Nevertheless, these results highlight the relationship between enforcement and the location of skilled professionals, which may have implications for local growth and development.

#### VI. Magnitude of the Impacts

Task force agreements have not been implemented widely across the United States, so their current impacts are not expected to be very large. At the peak of the agreements, only 3.5 percent of the U.S. immigrant population was exposed. The implied partial equilibrium impact of these agreements can be determined using the estimated regional migration coefficient, the

baseline immigrant population, and the task force coverage across local areas. This exercise suggests that there were an extra 15,000 relocations of 18-to-49 year-olds to other Census divisions in the peak year 2009 due to task force agreements. The cumulative effect over the six year sample period is 50,000. Given baseline annual migration of this group around 435,000, 287(g)-induced migration is small. There were not major distributional shifts of the foreign-born workforce across the United States as the result of 287(g) enforcement.

Task force agreements were curtailed at the end of 2012, but since 2010 states have used 287(g) as a model for legislative initiatives designed to bolster enforcement below the Federal level. The impacts of these laws are yet to be seen, but the most extreme case would be one in which the effects of Arizona SB 1070 and similar bills in five other states resembled the impact of a local task force initiative. I perform a simulation which imagines that six states implement laws having the same impact as full task force coverage. Full coverage of six states – AL, AZ, GA, IN, SC, and UT - would affect about ten percent of all immigrants. Partial equilibrium simulations suggest that about 42,000 of them would be induced to relocate to a different Census division annually as a result of the laws. These flows are large enough to be noticeable in certain areas.

#### VII. Conclusion

This analysis investigates the impact of local immigration enforcement on migration choice. The results suggest that 287(g) task force agreements do not cause out-migration from the United States except in extreme cases. Instead, task force agreements cause relocations across states, divisions, and regions within the United States. Importantly for policy-makers, the effects are concentrated among more educated non-citizens. These individuals are more likely to be documented (though their legal status is not observable in the data) and are likely productive workers in the local economy. Thus, the task-force enforcement regimes may be missing their intended targets.

The overall magnitude of migration induced by the task force policies is modest due to the relative small scale of the 287(g) program and the fact that only a small fraction of the foreign born relocate each year. As a result, any one region is unlikely to receive a large number of

immigrants as the result of strict enforcement elsewhere. Regional policy makers need not fear that a weak enforcement regime will lead to major demographic changes in their area. Nevertheless, enforcement policy could be one part of a policy effort to deter highly skilled immigrants from or attract them to a local area.

As the country considers immigration reform, it is important to consider the effect of enforcement action beyond its impact on the number of undocumented residents in the country. Even though the task force model itself has been eliminated, widespread implementation of enforcement regimes like the task force model could drive a redistribution of immigrants within the United States. It is enforcement involving street harassment that appears to affect internal migration decisions. Current Federal immigration policy is moving to expand the Criminal Aliens Program and Secure Communities Program. Though both programs focus on individuals charged with a crime, both are criticized for incentivizing street harassment by local law enforcement authorities. Policy-makers seeking to retain skilled immigrants should consider their enforcement regimes accordingly.

More broadly, the results suggest that, in addition to economic opportunity and social networks, the local policy environment influences location choice among the foreign-born within the United States. Full task force coverage has the same impact on internal migration as a ten to fifteen percent decline in employment demand for immigrants. The distribution of the foreign-born in the United States is likely to gradually evolve as the result of local enforcement policy, with highly skilled immigrants concentrating in areas that eschew aggressive enforcement policies.

#### VIII. References

- Bansak, Cynthia, 2005. "The Differential Wage Impact of the Immigration Reform and Control Act on Latino Ethnic Subgroups," *Social Science Quarterly*, 86(1).
- Bauer, Thomas, Gil S. Epstein, and Ira N. Gang, 2005. "Enclaves, language, and the location choice of migrants," *Journal of Population Economics*, 18(4).
- Bertrand, Marianne, Erzo F. P. Luttmer and Sendhil Mullainathan, 2000. "Network Effects And Welfare Cultures," *Quarterly Journal of Economics*, 115(3).
- Bohn, Sarah, Magnus Loftsrom, and Stephen Raphael, forthcoming. "Did the 2007 Legal Arizona Workers Act Reduce the States Unauthorized Immigrant Population?," *Review of Economics and Statistics*.
- Borjas George J., 1999. "Immigration and welfare magnet." *Journal of labor economics*, 17(4), 607-637.
- Borjas, George J., 2001. "Does Immigration Grease the Wheels of the Labor Market?," Brookings Papers on Economic Activity, 2001(1), 69-119.
- Borjas, George J., 2006. "Native Internal Migration and the Labor Market Impact of Immigration," *Journal of Human Resources*, 41(2).
- Borjas, George J., and Lynette Hilton, 1996. "Immigration and the Welfare State: Immigrant Participation in Means-Tested Entitlement Programs," *The Quarterly Journal of Economics*, 111(2).
- Boushey, Graeme, and Adam Luedtke, 2011. "Immigrants across the U.S. Federal Laboratory: Explaining State-Level Innovation in Immigration Policy," *State Politics and Policy Quarterly*, 11(4).
- Buckley, F.H., 1996. "The Political Economy of Immigration Policies," *International Review of Law and Economics*, 16.
- Cadena, Brian C., and Brian Kovak, 2013. "Immigration, Internal Migration, and Local Labor Market Adjustment During the Great Recession," unpublished manuscript.
- Card, David, 2001. "Immigrant inflows, native outflows, and the local labor market impacts of higher immigration," *Journal of Labor Economics*, 19.
- Cascio, Elizabeth U., and Ethan G. Lewis, 2012. "Cracks in the Melting Pot: Immigration, School Choice, and Segregation," *American Economic Journal: Economic Policy*, 4(3).

- Cortes, Patricia, and Jose Tessada, 2011. "Low-Skilled Immigration and the Labor Supply of Highly Skilled Women," *American Economic Journal: Applied Economics* 3.
- Davila, Alberto, and Jose A. Pagan, "The Effect of Selective INS Monitoring Strategies on the Industrial Employment Choice and Earnings of Recent Migrants," *Economic Inquiry*, 35(1), 1997.
- Dodson, Marvin E., 2001. "Welfare Generosity and Location Choices among new United States Immigrants," *International Review of Law and Economics*, 21.
- Edin, Per-Anders, Peter Fredriksson, and Olof Aslund, 2003. "Ethnic Enclaves and the Economic Success of Immigrants Evidence from a Natural Experiment," *Quarterly Journal of Economics*, 118(1).
- Funkhouser, Edward, 2000. "Changes in the Geographic Concentration and Location of Residence of Immigrants," *International Migration Review*, 34(2).
- Hoefer, Michael, Nancy Rytina, and Bryan Baker, 2012. "Estimates of the Unauthorized Immigrant Population Residing in The United States: January 2011," Department of Homeland Security Office of Immigration Statistics Report.
- Jaeger, David A. 2007. *Green cards and the location choices of immigrants in the United States,* 1971–2000. Vol. 27. Emerald Group Publishing Limited.
- Kostandini, Genti, Elton Mykerezi, and Cezar Escalante, 2012. "The Impact of immigration Enforcement on the Farming Sector," unpublished manuscript.
- Lacayo, A. Elena, 2010. "The Impact of Section 287(g) of the Immigration and Nationality Act on the Latino Community," *National Council of La Raza Issue Brief* 21.
- Lewis, Ethan, 2005. "Immigration, Skill Mix, and the Choice of Technique," Federal Reserve Bank of Philadelphia Working Paper 05-8, 2005.
- Lleras-Muney, A., 2005. "The relationship between education and adult mortality in the United States," *The Review of Economic Studies*, 72(1).
- O'Neil, Kevin, 2013. "Immigration Enforcement by Local Police under 287(g) and Growth of Unauthorized Immigrant and Other Populations," *University of Cape Town Working Paper*.

- Orreinus, Pia M. and Madeline Zavodny, 2003. "Do Amnesty Programs Reduce Undocumented Immigration? Evidence from IRCA," *Demography*, 40(3).
- Orrenius, Pia M., and Madeline Zavodny, 2009. "The Effects of Tougher Enforcement on the Job Prospects of Recent Latin American Immigrants," *Journal of Policy Analysis and Management*, 28(2).
- Ortega, Francesc, and Giovanni Peri, 2013. "The Effect of Income and Immigration Policies on International Migration," *Migration Studies*, 1(1).
- Ruggles, Steven, J. Trent Alexander, Katie Genadek, Ronald Goeken, Matthew B. Schroeder, and Matthew Sobek, 2010. *Integrated Public Use Microdata Series: Version 5.0* [Machinereadable database]. Minneapolis: University of Minnesota.
- Saiz, Albert, 2003. "Room in the Kitchen for the Melting Pot: Immigration and Rental Prices," Review of Economics and Statistics, 85(3).
- Saiz, Albert, 2007. "Immigration and Housing Rents in American Cities," *Journal of Urban Economics*, 61(2).
- Shahani, Aarti, and Judith Greene, 2009. Local Democracy on ICE: Why State and Local Governments Have No Business in Federal Immigration Law Enforcement (Brooklyn, NY: Justice Strategies, 2009), http://www.justicestrategies.org/sites/default/files/JS-Democracy-On-Ice.pdf
- Vaughan, Jessica M., and James R. Edwards, Jr., 2009. "The 287(g) Program: Protecting Home Towns and Homeland," *Center for Immigration Studies Backgrounder*.
- Watson, Tara, 2010. "Inside the Refrigerator: Immigration Enforcement and Chilling in Immigrant Medicaid Participation." National Bureau of Economic Research Working Paper 16278.
- Wozniak, Abigail, and Thomas J. Murray, 2012. "Timing is Everything: Short Run Population Impacts of Immigration in U.S. Cities," *Journal of Urban Economics*, 72(1).

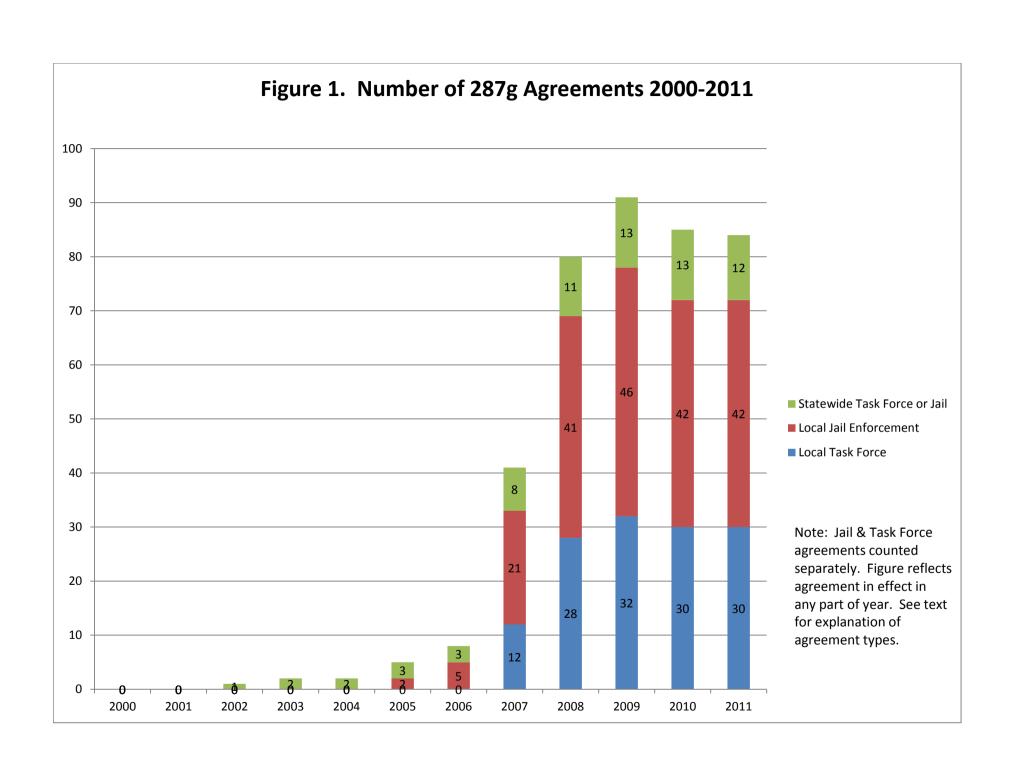
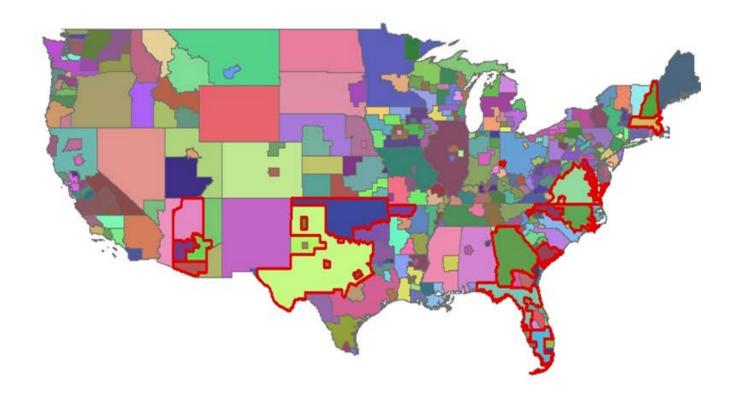


Figure 2. Map of Local Areas With Task Force Locations Outlined in Red



**Table 1. Summary Statistics** 

Panel A. Summary Statistics for Aggregate Analysis (Weighted by 2005 Immigrant Population, N=2028)

, 55 5 , 1	Mean	Std. Dev.	Min	Max
Immigrant Population	1,283,012	1,331,307	50	3,949,614
Native Born Population	3,982,879	2,884,369	70,910	9,263,624
Fraction Immigrants Exiting U.S. (N=1690)	0.02	0.08	-6.83	0.97
Immigrant Inflow From Abroad (/initial immig.pop, N=16	90) 0.03	0.02	0.00	1.29
Fraction Moved Out of Local Area (Conditional on Staying	g in U.S.) 0.03	0.02	0.00	0.83
Fraction Moved State (Conditional on Staying in U.S.)	0.02	0.02	0.00	0.61
Fraction Moved Division (Conditional on Staying in U.S.)	0.02	0.01	0.00	0.61
Fraction Moved Region (Conditional on Staying in U.S.)	0.01	0.01	0.00	0.61
Immigrant Inflow From Other Parts of U.S. (/initial immig	. pop, N=169 0.03	0.03	0.00	3.57
Local Task Force Agreement Coverage	0.02	0.12	0.00	1.33
Local Jail Enforcement Agreement Coverage	0.17	0.34	0.00	1.14
Statewide Agreement Coverage	0.18	0.41	0.00	2.00
Bartik Labor Demand Index	0.03	0.02	-0.04	0.13
Immigrant-Specific Bartik Labor Demand Index	0.02	0.03	-0.16	0.18
Predicted Immigrant Population Relative to 2000	0.19	0.04	-0.03	0.32
Fraction Arriving Last 5 Years	0.04	0.02	0.00	0.07

Panel B. Summary Statistics for Individual Analysis of Immigrants Remaining in U.S. (Weighted by ACS Survey Weights, N=1,081,129) Sample is 18-to-49-year-old non-institutionalized foreign born in U.S. for two consecutive years

	Mean	Std. Dev.	Min	Max
Moved	0.18	0.38	0.00	1.00
Moved Out of Local Area	0.04	0.19	0.00	1.00
Moved Out of State	0.03	0.16	0.00	1.00
Moved Division	0.02	0.14	0.00	1.00
Moved Region	0.01	0.12	0.00	1.00
Local Task Force Agreement Coverage	0.02	0.12	0.00	1.33
Local Jail Enforcement Agreement Coverage	0.16	0.33	0.00	1.14
Statewide Agreement Coverage	0.17	0.41	0.00	2.00
State E-Verify	0.07	0.25	0.00	1.00
In-state Tuition	0.56	0.50	0.00	1.00
Bartik Labor Demand Index	0.03	0.02	-0.04	0.13
Immigrant-Specific Bartik Labor Demand Index	0.02	0.03	-0.16	0.18
Local Area Unemployment Rate	0.08	0.03	0.02	0.21
Predicted Immigrant Population Relative to 2000	0.19	0.04	-0.03	0.32
Arrived Last 5 Years	0.18	0.39	0.00	1.00
Male	0.52	0.50	0.00	1.00
Married	0.59	0.49	0.00	1.00
Own School Age Children	0.40	0.49	0.00	1.00
High School Degree	0.28	0.45	0.00	1.00
Some College	0.17	0.38	0.00	1.00
College Grad or More	0.25	0.43	0.00	1.00
Age	34.89	8.45	18.00	49.00
Age>=30	0.71	0.45	0.00	1.00

Table 2. Effects of Enforcement on Annual Cross-Border Migration (Aggregate Analysis) 2006-2011

I II IV

	Fraction Exited U.S.	Fraction Exited U.S.	Inflows from Abroad (As a fraction of initial total immigrant population)	Inflows from Abroad (As a fraction of initial total immigrant population)
		Maricopa County Excluded		Maricopa County Excluded
	(mean=0.017)	(mean=0.016)	(mean=0.031)	(mean=0.031)
Task Force Enforcement	0.0865**	0.0078	-0.0127**	-0.0102
	(0.0246)	(0.0633)	(0.0044)	(0.0071)
Jail Enforcement	0.0201	0.0112	-0.0017	0.0041
	(0.0286)	(0.0329)	(0.0072)	(0.0042)
Statewide Enforcement	-0.0024	-0.0094	-0.0031	-0.0022
	(0.0117)	(0.0107)	(0.0027)	(0.0028)
Bartik Labor Demand	-0.7679	-0.5677	0.0562	0.0446
	(0.7053)	(0.7283)	(0.1542)	(0.1570)
Immigrant-Specific Bartik Labor Demand	-0.4378	-0.4449	0.0633	0.0731
	(0.3234)	(0.3267)	(0.0891)	(0.0890)
Predicted Immigrant Population	0.1713	0.2179	0.0492	0.0470
	(0.3241)	(0.3198)	(0.0528)	(0.0533)
Fraction Population Arrived Last Five Years	5.4860**	6.1709**	-0.4499**	-0.4741**
	(0.9484)	(0.8697)	(0.1176)	(0.1346)
Year Dummies	yes	yes	yes	yes
Local Area Dummies	yes	yes	yes	yes
Number of Observations	1690	1685	1690	1685
R-Squared	0.197	0.197	0.512	0.513
•	-	-	-	

Notes: Standard errors clustered by local area reported in parentheses. +, \*, \*\* indicate statistical significance at the 10, 5, and 1 percent levels. 2005 excluded from analysis due to data limitations, but results are not sensitive to that exclusion. There are 338 local areas, 51 states, 9 divisions, and 4 regions. Analysis at the local area-year level and weighted by immigrant population in 2005.

Table 3. Effects of Enforcement on Internal Migration to Other Regions 2005-2011 (Aggregate Analysis)

I II IV V

		Fraction Moved to Different Local Area (Conditional on Remaining In U.S.)	Fraction Moved to Different State (Conditional on Remaining In U.S.)	Fraction Moved to Different Census Division (Conditional on Remaining In U.S.)	Fraction Moved to Different Census Region (Conditional on Remaining In U.S.)	Inflow from Other Parts of U.S. (As A Fraction of Initial Immigrant or Native Population)
Panel A.	Immigrants (Including Maricopa, N=2028)	(mean=0.033)	(mean=0.022)	(mean=0.016)	(mean=0.012)	(mean=0.031)
	Task Force Enforcement	0.0090*	0.0099**	0.0083*	0.0054**	-0.0034
		(0.0043)	(0.0033)	(0.0035)	(0.0020)	(0.0048)
	Jail Enforcement	-0.0048	-0.0029	-0.0043+	-0.0019	-0.0065
		(0.0043)	(0.0026)	(0.0026)	(0.0021)	(0.0047)
	Statewide Enforcement	0.0020	-0.0012	-0.0013	-0.0013	0.0005
		(0.0020)	(0.0020)	(0.0018)	(0.0009)	(0.0038)
Panel B.	mmigrants (Excluding Maricopa, N=2022)	(mean=0.033)	(mean=0.022)	(mean=0.016)	(mean=0.012)	(mean=0.031)
	Task Force Enforcement	0.0123	0.0138	0.0158*	0.0096*	-0.0100
		(0.0100)	(0.0086)	(0.0071)	(0.0048)	(0.0119)
	Jail Enforcement	-0.0049	-0.0021	-0.0040	-0.0007	-0.0066
		(0.0049)	(0.0028)	(0.0029)	(0.0019)	(0.0060)
	Statewide Enforcement	0.0019	-0.0010	-0.0011	-0.0009	0.0003
		(0.0021)	(0.0021)	(0.0019)	(0.0009)	(0.0040)
Panel C.	Natives (Including Maricopa, N=2028)	(mean=0.043)	(mean=0.026)	(mean=0.019)	(mean=0.014)	(mean=0.038)
	Task Force Enforcement	-0.0044	-0.0032+	-0.0023	-0.0025	0.0018
		(0.0028)	(0.0018)	(0.0022)	(0.0016)	(0.0022)
	Jail Enforcement	0.0010	0.0018	0.0022	0.0029+	-0.0043
		(0.0031)	(0.0019)	(0.0022)	(0.0016)	(0.0028)
	Statewide Enforcement	0.0033**	0.0017	0.0010	0.0006	-0.0010
		(0.0011)	(0.0011)	(8000.0)	(0.0005)	(0.0016)
Panel D.	Natives (Excluding Maricopa, N=2022)	(mean=0.042)	(mean=0.026)	(mean=0.019)	(mean=0.013)	(mean=0.038)
	Task Force Enforcement	-0.0021	-0.0027	0.0005	-0.0004	0.0028
		(0.0052)	(0.0033)	(0.0028)	(0.0019)	(0.0045)
	Jail Enforcement	-0.0000	0.0010	0.0010	0.0021	-0.0054
		(0.0034)	(0.0019)	(0.0022)	(0.0016)	(0.0033)
	Statewide Enforcement	0.0030*	0.0014	0.0006	0.0003	-0.0011
		(0.0012)	(0.0012)	(8000.0)	(0.0005)	(0.0017)

Notes: Standard errors clustered by local area reported in parentheses. +, \*, \*\* indicate statistical significance at the 10, 5, and 1 percent levels.

2005 excluded from column VI analysis due to data limitations, but results are not sensitive to that exclusion. There are 338 local areas, 51 states, 9 divisions, and 4 regions.

Analysis at the local area-year level and weighted by immigrant population in 2005. All regressions include full set of controls shown in Table 2.

Table 4. Individual Effects of Enforcement on Internal Migration 2005-2011(Linear Probability Models)
Sample Includes Noninstutionalized Foreign-Born Individuals 18-49 Living in the United States for Two Consecutive Years

	1	II	III	IV	V	VI	VII	VIII
	Moved Out of Local Area	Moved Out of Local Area	Moved Out of State	Moved Out of State	Moved Out of Census Division	Moved Out of Census Division	Moved Out of Census Region	Moved Out of Census Region
		Maricopa County Excluded		Maricopa County Excluded		Maricopa County Excluded		Maricopa County Excluded
	(mean=0.038)	(mean=0.038)	(mean=0.025)	(mean=0.025)	(mean=0.019)	(mean=0.019)	(mean=0.014)	(mean=0.014)
Task Force Enforcement	0.0086*	0.0123	0.0112**	0.0144	0.0100**	0.0185*	0.0078**	0.0124*
	(0.0043)	(0.0096)	(0.0035)	(0.0093)	(0.0037)	(0.0080)	(0.0020)	(0.0056)
Jail Enforcement	-0.0034	-0.0035	-0.0012	-0.0009	-0.0032	-0.0032	-0.0012	-0.0004
	(0.0041)	(0.0046)	(0.0023)	(0.0025)	(0.0023)	(0.0025)	(0.0017)	(0.0016)
Statewide Enforcement	0.0020	0.0018	-0.0015	-0.0014	-0.0021	-0.0019	-0.0020+	-0.0016
	(0.0023)	(0.0025)	(0.0024)	(0.0026)	(0.0021)	(0.0023)	(0.0010)	(0.0010)
Bartik Labor Demand	-0.0337	-0.0411	-0.0839	-0.0915	0.1278	0.1097	0.0777	0.0678
	(0.1403)	(0.1429)	(0.1088)	(0.1111)	(0.0778)	(0.0778)	(0.0691)	(0.0693)
Immigrant-Specific Bartik Labor Demand	-0.0937	-0.0887	-0.0487	-0.0444	-0.1403**	-0.1318**	-0.0970*	-0.0911*
	(0.0769)	(0.0776)	(0.0613)	(0.0620)	(0.0493)	(0.0494)	(0.0405)	(0.0403)
Predicted Immigrant Population	-0.1249**	-0.1263**	-0.0840**	-0.0864**	-0.0519+	-0.0553*	-0.0388+	-0.0405+
	(0.0433)	(0.0441)	(0.0298)	(0.0301)	(0.0276)	(0.0274)	(0.0232)	(0.0230)
Arrived Last Five Years	0.0140**	0.0141**	0.0125**	0.0126**	0.0098**	0.0098**	0.0074**	0.0075**
	(0.0011)	(0.0011)	(0.0009)	(0.0009)	(0.0007)	(0.0007)	(0.0006)	(0.0006)
Male	0.0028**	0.0028**	0.0017**	0.0017**	0.0012**	0.0011**	0.0009**	0.0009**
	(0.0005)	(0.0005)	(0.0003)	(0.0003)	(0.0003)	(0.0003)	(0.0002)	(0.0002)
Married	-0.0022+	-0.0023+	-0.0002	-0.0003	0.0000	0.0000	0.0001	0.0001
	(0.0011)	(0.0012)	(0.0007)	(0.0008)	(0.0006)	(0.0006)	(0.0005)	(0.0005)
Own School Age Children in Household	-0.0145**	-0.0146**	-0.0104**	-0.0105**	-0.0080**	-0.0081**	-0.0061**	-0.0062**
	(0.0014)	(0.0014)	(0.0010)	(0.0010)	(0.0007)	(0.0007)	(0.0005)	(0.0006)
High School Degree	0.0032**	0.0032**	0.0017*	0.0018**	0.0014**	0.0015**	0.0009+	0.0009+
	(0.0007)	(0.0007)	(0.0007)	(0.0007)	(0.0005)	(0.0005)	(0.0005)	(0.0005)
Some College	0.0039**	0.0038**	0.0017+	0.0016+	0.0011	0.0011	0.0010	0.0010
	(0.0009)	(0.0010)	(0.0010)	(0.0010)	(0.0008)	(0.0008)	(0.0007)	(0.0007)
College Grad or More	0.0208**	0.0209**	0.0175**	0.0176**	0.0140**	0.0140**	0.0114**	0.0114**
	(0.0020)	(0.0020)	(0.0022)	(0.0022)	(0.0018)	(0.0018)	(0.0013)	(0.0014)
Age >=30	-0.0178**	-0.0179**	-0.0096**	-0.0095**	-0.0069**	-0.0069**	-0.0050**	-0.0050**
	(0.0011)	(0.0012)	(0.0011)	(0.0011)	(0.0008)	(0.0008)	(0.0006)	(0.0006)
Country of Origin Category Dummies	yes	yes	yes	yes	yes	yes	yes	yes
Year Dummies	yes	yes	yes	yes	yes	yes	yes	yes
Local Area Dummies	yes	yes	yes	yes	yes	yes	yes	yes
Observations	1,081,129	1,062,600	1,081,129	1,062,600	1,081,129	1,062,600	1,081,129	1,062,600
R-squared	0.023	0.023	0.021	0.021	0.016	0.016	0.015	0.015

Notes: Standard errors clustered by local area reported in parentheses. +, \*, \*\* indicate statistical significance at the 10, 5, and 1 percent levels. There are 338 local areas, 51 states, 9 divisions, and 4 regions.

Analysis at the individual level and weighted by ACS survey weights.

## Table 5. Effects of Task Force Enforcement on Internal Migration of Immigrants and Natives Sample Includes Noninstutionalized Individuals 18-49 Living in the United States for Two Consecutive Years Excludes Maricopa County

	Fraction Moved Out of Local Area (Conditional on Remaining In U.S.)	Fraction Moved Out of State (Conditional on Remaining In U.S.)	Fraction Moved Out of Census Division (Conditional on Remaining In U.S.)	Fraction Moved Out of Census Region (Conditional on Remaining In U.S.)
Panel A. Immigrants (N=1,062,600)	(mean=0.038)	(mean=0.025)	(mean=0.019)	(mean=0.014)
Task Force Enforcement	0.0123	0.0144	0.0185*	0.0124*
	(0.0096)	(0.0093)	(0.0080)	(0.0056)
Panel B. Natives (N=5,911,822)	(mean=0.057)	(mean=0.036)	(mean=0.025)	(mean=0.018)
Task Force Enforcement	-0.0026	-0.0046+	-0.0024	-0.0028
	(0.0054)	(0.0027)	(0.0023)	(0.0018)
Panel C. Natives (Reweighted, N=5,696,693)	(mean=0.050)	(mean=0.031)	(mean=0.022)	(mean=0.016)
Task Force Enforcement	-0.0085	-0.0065+	-0.0045	-0.0048
	(0.0057)	(0.0039)	(0.0040)	(0.0033)
Panel D. Difference Between Immigrants and Natives (Reweighted)				
Task Force Enforcement	0.0208+	0.0209+	0.0230*	0.0173*
	(0.0119)	(0.0112)	(0.0099)	(0.0070)

Notes: Standard errors clustered by initial local area are reported in parentheses. +, \*, \*\* indicate statistical significance at the 10, 5 and 1 percent levels.

Analysis at the individual level. All regressions include full set of controls shown in Table 4. Panel D shows coefficient on interaction term from a fully interacted model.

There are 337 local areas (excluding Maricopa County), 51 states, 9 divisions, and 4 regions.

Reweighting based on initial local area- sex-age category-education category cells, where weights make natives comparable to immigrants on those dimensions. Cells with no immigrants are dropped in Panels C and D.

Table 6. Responses to Enforcement By Citizenship and Education
Sample Includes Noninstutionalized Individuals 18-49 Living in the United States for Two Consecutive Years
Excludes Maricopa County

	All	No High School Degree	High School Exactly	Some College	College Graduate or More		
Panel A. Immigrants	(mean=0.019)	(mean=0.012)	(mean=0.016)	(mean=0.017)	(mean=0.032)		
Task Force Enforcement	<b>0.0185*</b> (0.0080)	<b>0.0045</b> (0.0135)	<b>0.0154+</b> (0.0082)	<b>0.0235**</b> (0.0086)	<b>0.0361*</b> (0.0152)		
Panel B. Non-Citizens	(mean=0.021)	(mean=0.013)	(mean=0.017)	(mean=0.019)	(mean=0.043)		
Task Force Enforcement	<b>0.0202+</b> (0.0119)	<b>0.0019</b> (0.0163)	<b>0.0187+</b> (0.0097)	<b>0.0195</b> (0.0158)	<b>0.0611**</b> (0.0223)		
Panel C. Natives (Reweighted)	(mean=0.022)	(mean=0.015)	(mean=0.024)	(mean=0.022)	(mean=0.028)		
Task Force Enforcement	<b>-0.0045</b> (0.0040)	<b>-0.0168**</b> (0.0059)	<b>-0.0014</b> (0.0042)	<b>-0.0000</b> (0.0074)	<b>0.0007</b> (0.0066)		
Panel D. Difference Between Immigrants and Natives (Reweighted)							
Task Force Enforcement	<b>0.0230*</b> (0.0099)	<b>0.0213</b> (0.0161)	<b>0.0167</b> (0.0102)	<b>0.0235**</b> (0.0084)	<b>0.0354*</b> (0.0167)		

Notes: Standard errors clustered by initial local area are reported in parentheses. +, \*, \*\* indicate statistical significance at the 10, 5, and 1 percent levels. Analysis at the individual level. All regressions include full set of controls shown in Table 4.

There are 337 local areas (excluding Maricopa County), 51 states, 9 divisions, and 4 regions.

### Appendix Table 1. Robustness - Divisional Moves

Sample Includes Noninstutionalized Foreign-Born Individuals 18-49 Living in the United States for Two Consecutive Years

I II III IV V VI VII VIII IX

Moved Out of Census Division Census Di

	Baseline	Exclude Controls	Task Force Only	Use Unemp. Rate Instead of Bartik Measures	Control for Additional Enforcement Variables	State-Year Fixed Effects	Industry Controls	Include Institution- alized	Logit (Odds Ratios Reported)
Task Force Enforcement	0.0185*	0.0171*	0.0148*	0.0190*	0.0181*	0.0091*	0.0183*	0.0156+	2.8285*
Jail Enforcement	(0.0080) - <b>0.0032</b> (0.0025)	(0.0077) - <b>0.0010</b> (0.0028)	(0.0067)	(0.0075) - <b>0.0022</b> (0.0033)	(0.0082) - <b>0.0032</b> (0.0025)	(0.0044) - <b>0.0035*</b> (0.0017)	(0.0079) - <b>0.0031</b> (0.0025)	(0.0080) - <b>0.0027</b> (0.0025)	(1.2181) <b>0.7125</b> (0.1559)
Statewide Enforcement	<b>-0.0019</b> (0.0023)	- <b>0.0017</b> (0.0024)		- <b>0.0018</b> (0.0026)	- <b>0.0023</b> (0.0021)	- <b>0.0017</b> ) - <b>0.0005</b> (0.0004)	<b>-0.0019</b> (0.0023)	- <b>0.0023</b> ) - <b>0.0021</b> (0.0023)	<b>1.0044</b> (0.0940)
Local Area Unemployment Rate - Highly Educated	(0.0020)	(0.001.)		0.0106 (0.0433)	(0.00==)	(0.000.)	(0.0020)	(5.5525)	(0.00 .0)
Local Area Unemployment Rate - Less Educated				0.0405 (0.0260)					
In-State Tuition					0.0008 (0.0021)				
E-Verify					0.0034 (0.0247)				
Bartik Labor Demand	0.1097 (0.0778)		0.1132 (0.0786)		0.1054 (0.0782)	0.0383 (0.0618)	0.1139 (0.0780)	0.1410+ (0.0765)	55.8550 (187.1034)
Immigrant-Specific Bartik Labor Demand	-0.1318** (0.0494)		-0.1248* (0.0482)		-0.1267* (0.0497)	-0.0748+ (0.0387)	-0.1292** (0.0492)	-0.1455** (0.0492)	0.0256* (0.0462)
Predicted Immigrant Population	-0.0553* (0.0274)		-0.0523* (0.0261)	-0.0766** (0.0259)	-0.0551* (0.0273)	-0.0180 (0.0195)	-0.0562* (0.0273)	-0.0491+ (0.0270)	0.0226**
Arrived Last Five Years	0.0098** (0.0007)		0.0098** (0.0007)	0.0098** (0.0007)	0.0098** (0.0007)	0.0003 (0.0006)	0.0103** (0.0007)	0.0098** (0.0007)	1.4668** (0.0393)
Male	0.0011**		0.0011**	0.0011**	0.0011**	0.0002 (0.0003)	0.0003 (0.0003)	0.0015**	1.0750** (0.0163)
Married	0.0000 (0.0006)		0.0000 (0.0006)	0.0000 (0.0006)	0.0000 (0.0006)	0.0027** (0.0004)	-0.0001 (0.0007)	-0.0001 (0.0006)	1.0028 (0.0325)
Own School Age Children in Household	-0.0081** (0.0007)		-0.0081** (0.0007)	-0.0081** (0.0007)	-0.0081** (0.0007)	-0.0038** (0.0004)	-0.0080** (0.0007)	-0.0087** (0.0007)	0.5769** (0.0163)
High School Degree	0.0015** (0.0005)		0.0015** (0.0005)	0.0015** (0.0005)	0.0015** (0.0005)	0.0015** (0.0005)	0.0010* (0.0005)	0.0012* (0.0005)	1.1465** (0.0428)
Some College	0.0011 (0.0008)		0.0011 (0.0008)	0.0011 (0.0008)	0.0011 (0.0008)	0.0010 (0.0007)	0.0002 (0.0008)	0.0007 (0.0008)	1.1088+ (0.0613)
College Grad or More	0.0140** (0.0018)		0.0140** (0.0018)	0.0140** (0.0018)	0.0140** (0.0018)	0.0114** (0.0015)	0.0130** (0.0017)	0.0136** (0.0018)	2.0056** (0.1316)
Age >=30	-0.0069** (0.0008)		-0.0069** (0.0008)	-0.0069** (0.0008)	-0.0069** (0.0008)	-0.0069** (0.0008)	-0.0064** (0.0007)	-0.0066** (0.0007)	0.7167** (0.0188)
Country of Origin Category Dummies	yes		yes	yes	yes	yes	yes	yes	yes
Year Dummies	yes	yes	yes	yes	yes	yes	yes	yes	yes
Local Area Dummies	yes	yes	yes	yes	yes	yes	yes	yes	yes
State*Year Dummies						yes			
Industry Dummies	4 000 000						yes		
Observations R-squared	1,062,600 0.016	1,062,600 0.009	1,062,600 0.016	1,062,600 0.016	1,062,600 0.016	1,062,600 0.121	1,062,600 0.021	1,075,779 0.016	1,061,977
•		-	-	-	-			-	

Notes: Standard errors clustered by local area reported in parentheses. +, \*, \*\* indicate statistical significance at the 10, 5, and 1 percent levels. There are 337 local areas (excluding Maricopa), 51 states, 9 divisions, and 4 regions.

Analysis at the individual level and weighted by ACS survey weights.

### Appendix Table 2. Robustness - Regional Moves Sample Includes Noninstutionalized Foreign-Born Individuals 18-49 Living in the United States for Two Consecutive Years

 $I \qquad \qquad II \qquad \qquad III \qquad \qquad IV \qquad \qquad V \qquad \qquad VI \qquad \qquad VIII \qquad \qquad IX$ 

Moved Out of Census Region Census Regio

	Baseline	Exclude Controls	Task Force Only	Use Unemp. Rate Instead of Bartik Measures	Control for Additional Enforcement Variables	State-Year Fixed Effects	Industry Controls	Include Institution- alized	Logit (Odds Ratios Reported)
Task Force Enforcement	0.0124*	0.0112*	0.0111*	0.0128*	0.0130*	0.0091*	0.0123*	0.0095+	2.7652*
Jail Enforcement	(0.0056) <b>-0.0004</b>	(0.0055) <b>0.0013</b>	(0.0050)	(0.0052) <b>0.0003</b>	(0.0057) <b>-0.0003</b>	(0.0044) <b>-0.0035*</b>	(0.0056) - <b>0.0003</b>	(0.0057) <b>-0.0001</b>	(1.2522) <b>0.8137</b>
	(0.0016)	(0.0017)		(0.0022)	(0.0016)	(0.0017)	(0.0015)	(0.0015)	(0.1439)
Statewide Enforcement	-0.0016	-0.0015		-0.0015	-0.0010	-0.0005	-0.0016	-0.0017	0.9644
	(0.0010)	(0.0011)		(0.0012)	(0.0012)	(0.0004)	(0.0011)	(0.0011)	(0.0538)
Local Area Unemployment Rate - Highly Educated				0.0237 (0.0378)					
Local Area Unemployment Rate - Less Educated				0.0298 (0.0201)					
In-State Tuition				,	-0.0012 (0.0015)				
E-Verify					0.0082 (0.0194)				
Bartik Labor Demand	0.0678		0.0680		0.0698	0.0383	0.0712	0.0875	16.0186
	(0.0693)		(0.0698)		(0.0692)	(0.0618)	(0.0695)	(0.0685)	(54.2682)
Immigrant-Specific Bartik Labor Demand	-0.0911*		-0.0900*		-0.0955*	-0.0748+	-0.0885*	-0.1013*	0.0616
	(0.0403)		(0.0401)		(0.0413)	(0.0387)	(0.0402)	(0.0402)	(0.1105)
Predicted Immigrant Population	-0.0405+		-0.0381+	-0.0571**	-0.0407+	-0.0180	-0.0411+	-0.0332	0.0279**
	(0.0230)		(0.0227)	(0.0218)	(0.0230)	(0.0195)	(0.0230)	(0.0226)	(0.0386)
Arrived Last Five Years	0.0075**		0.0075**	0.0075**	0.0075**	0.0003	0.0078**	0.0074**	1.4671**
	(0.0006)		(0.0006)	(0.0006)	(0.0006)	(0.0006)	(0.0006)	(0.0006)	(0.0454)
Male	0.0009**		0.0009**	0.0009**	0.0009**	0.0002	0.0005+	0.0012**	1.0822**
	(0.0002)		(0.0002)	(0.0002)	(0.0002)	(0.0003)	(0.0003)	(0.0002)	(0.0179)
Married	0.0001		0.0001	0.0001	0.0001	0.0027**	-0.0000	0.0000	1.0069
	(0.0005)		(0.0005)	(0.0005)	(0.0005)	(0.0004)	(0.0005)	(0.0005)	(0.0352)
Own School Age Children in Household	-0.0062**		-0.0062**	-0.0062**	-0.0062**	-0.0038**	-0.0061**	-0.0066**	0.5693**
	(0.0006)		(0.0006)	(0.0006)	(0.0006)	(0.0004)	(0.0005)	(0.0006)	(0.0165)
High School Degree	0.0009+		0.0009+	0.0010+	0.0009+	0.0015**	0.0006	0.0008	1.1537**
Sama Callaga	(0.0005)		(0.0005)	(0.0005)	(0.0005)	(0.0005)	(0.0005)	(0.0005)	(0.0583)
Some College	0.0010		0.0010	0.0010	0.0010	0.0010	0.0003	0.0007	1.1455*
College Cred or More	(0.0007)		(0.0007)	(0.0007)	(0.0007)	(0.0007)	(0.0007)	(0.0007)	(0.0730)
College Grad or More	0.0114**		0.0114**	0.0114**	0.0114**	0.0114**	0.0106**	0.0111**	2.1060**
Ago >=20	(0.0014) -0.0050**		(0.0014) -0.0050**	(0.0014) -0.0051**	(0.0014) -0.0050**	(0.0015) 0.0001	(0.0013) -0.0047**	(0.0013) -0.0049**	(0.1424) 0.7226**
Age >=30	(0.0006)		(0.0030	(0.0006)	(0.0006)	(0.0001	(0.0006)	(0.0049	(0.0196)
Country of Origin Catagory Dummios	-							•	
Country of Origin Category Dummies Year Dummies	yes yes	VAC	yes	yes	yes	yes	yes	yes	yes
Local Area Dummies		yes	yes	yes	yes	yes	yes	yes	yes
State*Year Dummies	yes	yes	yes	yes	yes	yes yes	yes	yes	yes
Industry Dummies						yes	yes		
Observations	1,062,600	1,062,600	1,062,600	1,062,600	1,062,600	1,062,600	1,062,600	1,075,779	1,061,154
R-squared	0.015	0.008	0.015	0.015	0.015	0.096	0.018	0.014	_,552,15
		2.2.2							

Notes: Standard errors clustered by local area reported in parentheses. +, \*, \*\* indicate statistical significance at the 10, 5, and 1 percent levels. There are 337 local areas (excluding Maricopa), 51 states, 9 divisions, and 4 regions.

Analysis at the individual level and weighted by ACS survey weights.

# Appendix Table 3. Responses to Enforcement By Industry Sample Includes Noninstutionalized Individuals 18-49 Living in the United States for Two Consecutive Years Excludes Maricopa County

	Agriculture or Mining	Construction	Manufacturing	Transportation, Communication, Wholesale Trade, and Retail Trade	Business Services, Personal Services, and Entertainment	FIRE and Professional Services	Public Administration and Military
Panel A. Immigrants	(N=43,889)	(N=86,992)	(N=115,762)	(N=251,168)	(N=140,550)	(N=257,129)	(N=21,927)
Task Force Enforcement	<b>0.0539+</b> (0.0293)	<b>-0.0039</b> (0.0150)	<b>0.0160</b> (0.0124)	<b>0.0046</b> (0.0139)	<b>0.0275+</b> (0.0141)	<b>0.0217*</b> (0.0089)	<b>0.0465</b> (0.0407)
Panel B. Natives (reweighted)	(N=139,257)	(N=354,918)	(N=554,213)	(N=1,461,249)	(N=578,056)	(N=1,793,482)	(N=297,474)
Task Force Enforcement	<b>0.0111</b> (0.0201)	<b>0.0072</b> (0.0129)	<b>-0.0005</b> (0.0096)	<b>0.0017</b> (0.0060)	<b>-0.0206*</b> (0.0105)	<b>-0.0027</b> (0.0039)	<b>-0.0112</b> (0.0116)
Panel C. Difference (reweighted)							
Task Force Enforcement	<b>0.0429</b> (0.0356)	<b>-0.0111</b> (0.0214)	<b>0.0166</b> (0.0141)	<b>0.0029</b> (0.0140)	<b>0.0482**</b> (0.0176)	<b>0.0244*</b> (0.0104)	<b>0.0578</b> (0.0481)

Notes: Standard errors clustered by initial local area are reported in parentheses. +, \*, \*\* indicate statistical significance at the 10, 5, and 1 percent levels. Analysis at the individual level. All regressions include full set of controls shown in Table 4.

There are 337 local areas (excluding Maricopa County), 51 states, 9 divisions, and 4 regions.

Unemployed are asked for most recent industry; sample excludes those for whom industry is not reported.