The Governance of Migration Policy

Hanson, Gordon H.

Department of Economics of University of California

1 April 2009

Human Development Research Paper 2009/02

The Governance of Migration Policy

Gordon H. Hanson

United Nations Development Programme
Human Development Reports
Research Paper

April 2009

Human Development Research Paper 2009/02

The Governance of Migration Policy

Gordon H. Hanson

United Nations Development Programme
Human Development Reports
Research Paper 2009/2
April 2009

The Governance of Migration Policy

Gordon H. Hanson

Gordon H. Hanson is Professor at the Department of Economics of University of California, San Diego.
E-mail: gohanson@ucsd.edu.

Comments should be addressed by email to the author.

Abstract

In this paper, I examine high-income country motives for restricting immigration. Abundant evidence suggests that allowing labor to move from low-income to high-income countries would yield substantial gains in global income. Yet, most high-income countries impose strict limits on labor inflows and set their admission policies unilaterally. A core principle underlying the World Trade Organization is reciprocity in tariff setting. When it comes to migration from poor to rich countries, however, labor flows are rarely bidirectional, making reciprocity moot and leaving labor importers with all the bargaining power. One motivation for barriers to labor inflows is political pressure from groups that are hurt by immigration. Raising immigration would depend on creating mechanisms to transfer income from those that immigration helps to those that it hurts. Another motivation for immigration restrictions is that labor inflows from abroad may exacerbate distortions in an economy associated with redistributive tax and transfer policies. Making immigration more attractive would require creating mechanisms that limit the negative fiscal impacts of labor inflows on natives. Fiscal distortions create an incentive for receiving countries to screen immigrants according to their perceived economic impact. For high skilled immigrants, screening can be based on educational degrees and professional credentials, which are relatively easy to observe. For low skilled immigrants, illegal immigration represents an imperfect but increasingly common screening device. For policy makers in labor-importing nations, the modest benefits freer immigration brings may simply not be worth the political hassle. To induce high-income countries to lower border barriers, they need to get more out of the bargain.

Keywords: international migration, labor mobility, political economy, illegal migration

1 INTRODUCTION

When economists discuss the rationale for global trade accords, they generally appeal to the benefits of free trade for global economic well being. By agreeing to keep trade barriers against each other low, countries can achieve a higher level of welfare than they could by succumbing to the unilateral incentive to improve their terms of trade through the application of tariffs. The belief that the world is better off with multilateral trade liberalization than a state of trade war is in part what sustains the world trading system in the face of political opposition from special interests.

No such logic guides the policies that govern international migration. Most labor-importing countries set their admission policies unilaterally, with high-income countries imposing strict limits on labor inflows. While only a handful of countries impede emigration, allowing workers to leave in no way guarantees that they have a place to go.[1] Many countries have negotiated bilateral agreements on labor movements – the Philippines through its Overseas Employment Administration manages agreements on temporary migration flows with a dozen countries (International Organization for Migration, 2003) and Spain has immigration agreements with at least seven countries (http://www.migrationpolicy.org/)[2] – but meaningful migration accords are much more the exception than the rule.[3] The closest source and destination countries have come to negotiating a multilateral deal on migration is Mode IV of the General Agreement on Trade in Services (GATS), which addresses the temporary movement of "natural persons" in the provision of services across borders.[4] While GATS has been in force

[1] The right to emigrate is codified in international treaties. The UN Universal Declaration of Human Rights (1948) states that, "Everyone has a right to leave any country, including his own."

[2] Spain has agreements on legal immigration with Ecuador, Colombia, Morocco, the Dominican Republic, Nigeria, Poland, and Romania. However, the country has had substantial illegal labor inflows from the non-European countries within this group (Jandl, 2003), leaving the practical importance of its bilateral migration agreements in question.

[3] While the OECD (2004) identifies the existence of 176 bilateral migration agreements, their practical affect appears to be limited. Most agreements establish a framework for future migration flows rather than mechanisms for governing current flows. The same OECD study recognizes that the vast majority of migration flows occur outside of negotiated arrangements.

[4] Migration under Mode IV results from a contract between a buyer in an importing country and a supplier in an exporting country, in circumstances where consummation of trade requires the presence of the supplier's employees in the buyer's location (e.g., trade in architectural services that requires the supplier to be present in the buyer's country in order to oversee construction of a building). Given the fixed costs involved in negotiating such contracts, they are likely to be limited to skilled labor. Mode IV migration is distinct from migration under a guest worker program, in which an employer in an importing country directly hires a worker from an exporting country under a temporary contract.

since the implementation of the Uruguay Round in 1995, its importance for international migration is limited. Mode IV explicitly excludes open-ended labor contracts, making it relevant to only a subset of temporary labor flows (IOM/World Bank/WTO, 2004). Further, government commitments under Mode IV remain vague and often subject to extensive restrictions, leaving them applicable primarily to either very short-term contractors or intra-company transferees, most of whom are highly skilled and whose movement is relatively unimpeded to begin with (Mamdouh, 2004).[5] Today, the vast majority of labor flows between countries remain governed by policies that labor importing countries design, monitor, and enforce.

Were the outcome of the current system an efficient global allocation of labor, there would be little to grumble about. But there is evidence that allowing labor to move from low-income to high-income countries would yield substantial gains in global income. Clemens, Montenegro and Pritchett (2008) report that for a sample of 42 developing countries the average gain to migrating to the United States is an increase in annual earnings of about four times, at purchasing power parity. For individuals with a secondary school education this amounts to an annual increase in income of around $10,000 (Hanson, 2008). Rosenzweig (2007) estimates slightly larger benefits from migrating to the United States, among individuals that obtain a U.S. green card.[6] These gains, which I describe in more detail in section two, reflect enormous cross country differences in labor productivity, which three decades of economic liberalization by developing countries have been unable to erase. If goods, capital, and technology cannot flow in sufficient quantities to raise poor country incomes to rich country levels, then the freer mobility of labor is an obvious corrective. The only argument against labor mobility would be negative externalities associated with either the exodus of labor from sending countries or the arrival of labor in receiving countries (Docquier and Rapoport, 2008). Given the magnitude of the apparent income gains from incremental migration, negative spillovers would have to be very large to justify restricting labor flows on global efficiency grounds. While research on the issue is still at an early stage, there is as of yet no compelling evidence that spillovers of such magnitude exist, meaning that it would be hard to make an economic case against significantly increasing international migration.

[5] The ultimate relevance of Mode IV may depend on the willingness of countries to broaden their commitments through the Doha Round negotiations, which remain stalled.
[6] There are few systematic estimates of gains to migration to high-income destinations other than the United States.

With money seemingly left on the table, it is a puzzle why countries have not found a way to facilitate greater global labor mobility. One question is why labor-importing countries continue to set immigration policies unilaterally. The simple answer is that when it comes to migration from poor to rich countries importers have all the bargaining power. A core principle underlying the World Trade Organization is reciprocity in tariff setting: by allowing imports into their markets countries secure access to markets for their exports. With international migration between low-income and high-income countries, labor flows are rarely bidirectional, making reciprocity moot. Whereas migration from high-income to low-income countries accounts for only 3.5% of world flows, migration from low-income to high-income is 33.6% of the total (see Table 1). The United States stands out for its importance as a destination. The country is host to 19.7% of all international migrants from low-income incomes and 49.5% of migrants from low-income countries that reside in high-income countries. Yet, the United States is the source country for just 1.2% of the world's migrants. Because cross-country differences in income are largely a result of variation in total factor productivity (rather than, say, differences in relative factor supplies), rich countries primarily import labor from poor countries and poor countries primarily export labor to rich countries (Grogger and Hanson, 2008). The reciprocal market access that poor labor exporters can offer is of little value to labor rich importers, leaving them under minimal bilateral pressure to open their borders to poor country workers.

A more fundamental question is why, even without the lure of reciprocal market access, receiving countries do not choose to make their economies more open to foreign labor. If global labor flows raise global income, shouldn't receiving countries have an incentive to let foreign workers into their labor markets? Is the problem that receiving countries do not gain from immigration or that political constraints restrict them from choosing more efficient immigration policies? In this paper, I examine high-income country motives for restricting immigration and how the institutional framework for policy setting translates these motives into policy outcomes. Along the way I will also conjecture as to why migration policy choices in middle-income countries, such as Arab Gulf States, tend to differ from rich OECD countries and what this might say about the role of political regimes in shaping immigration policy.

The focus of my discussion will be on immigration restrictions in high-income countries.[7] There are important intra-regional labor movements associated with seasonal labor supply, the disintegration of countries (as with the Former Soviet Union), dislocation from war or natural disasters (as in southern Africa), and economic crisis, which I will not discuss.[8] Intra-regional flows among Former Soviet Union countries account for 14% of world migration, among Sub-Saharan African countries account for 7% of world flows, and among South Asian countries account for 5.8% of world flows (see Table 1). Adding in intra-regional migration in Southeast Asia, Eastern Europe, and Latin America and the Caribbean, and migration between neighboring low and middle-income countries account for 32% of the world total. These flows are clearly a significant component of global labor movements. However, there is little research on cross-border migration between low-income countries, making the topic difficult to address (Ratha and Shaw, 2007). I leave these flows out of the discussion not because they are unimportant but because the literature is still nascent.

One motivation for barriers to labor inflows is political pressure from groups that are hurt by immigration. If workers opposed to immigration lobby more effectively than the business groups that tend to support immigration, policy makers may choose to set foreign labor inflows too low, at least from the perspective of maximizing national income. Raising immigration would depend on creating a mechanism to transfer income from those that immigration helps to those that it hurts. In section three, I discuss theoretical and empirical literature on the political economy of immigration policy.

A related reason countries restrict immigration is that labor inflows from abroad may exacerbate distortions in an economy. In the presence of redistributive tax and transfer policies, immigration, particularly if it is low skilled, may raise the net tax burden on native residents. Native voters may support immigration restrictions as a second best response to a welfare system that is hard to reform. The key to making immigration more attractive is creating mechanisms

[7] I define high income to include Australia, Japan, New Zealand; Canada, the United States; Austria, Belgium, Denmark, Finland, France, Germany, Greece, Ireland, Italy, Luxembourg, the Netherlands, Norway, Portugal, Spain, Sweden, and the United Kingdom. See Table 1.
[8] There are sizable migration flows between many nearby countries, including from the former Soviet Republics to Russia and the Ukraine; Slovakia to the Czech Republic; Bosnia to Croatia; Poland to Bulgaria and the Ukraine; bidirectional flows between Bangladesh, India, and Pakistan; Afghanistan to Iran; Iraq to Syria; other Middle Eastern states to Saudi Arabia; Mali to Burkina Faso; other East African states to Cote d'Ivoire; other Southern African states to South Africa; China to Hong Kong; Indonesia and the Philippines to Malaysia; Malaysia to Singapore; Nicaragua to Costa Rica; and Bolivia, Chile, and Uruguay to Argentina (Parson et al., 2007).

that limit the negative fiscal impacts of labor inflows on natives. Interestingly, the tax argument on immigration can also work in favor of setting labor inflows too high. With pay-as-you-go public pensions, older native workers may support the immigration of younger workers, in order to ensure the government has sufficient payroll tax revenues to make good on its obligations, regardless of the long-term fiscal implications of the labor inflows. In section four, I discuss how the fiscal impacts of labor inflows affect immigration policy.

Fiscal distortions create an incentive for receiving countries to screen immigrants according to their perceived economic impact. For high skilled immigrants, screening can be based on educational degrees and professional credentials, which are relatively easy to observe. But for low skilled immigrants, screening is more problematic. Their economic performance is based less on education than on motivation and ability, which are hard to verify in a visa application or a consular interview. Having low skilled workers enter as illegal immigrants, as is increasingly the case not only in the United States but also in Europe, is a mechanism for selecting potential entrants who have a strong desire to work. While illegal entry may help identify good workers, it has other properties that are unappealing, including exposing migrants to extreme physical risks, leaving immigrants in a state of prolonged uncertainty regarding their residency rights, and attracting criminal gangs into the business of migration. In section four, I discuss why countries create separate policy regimes to govern legal and illegal immigration and identify mechanisms that could potentially replace illegal entry. I also discuss reasons why non-democratic countries tend to choose temporary legal immigration over illegal immigration and what this could say about the scope for expanding foreign guest worker programs in rich, democratic countries.

High-income countries maintain barriers to immigration not because of a lack of international cooperation but because they do not perceive significant benefits from greater labor inflows. Ironically, the labor movements that make migrants substantially better off appear to have only modest effects on net incomes in receiving countries. Borjas (1999) estimates that for the United States the net short run impact from immigration is a change in GDP of a few tenths of a percent, which given the uncertainties involved in making such a calculation is essentially a wash. While one may quibble with some of the assumptions underlying his calculations, plausible alternative assumptions would not yield outcomes more than two or three times larger, which is still less than one percent of GDP. For policy makers in labor-importing nations, the modest benefits freer immigration may bring are simply not worth the political hassle. To induce high-income countries to lower border barriers, they need to get more out of the bargain. By way of conclusion, in section six I discuss policy reforms that could make receiving countries amenable to raising immigration from poor countries.

2 INCOME GAINS FROM EMIGRATION

How large are the gains in migrating from a low-income to a high-income country? Surprisingly, there is relatively little research on this question. Before beginning the discussion of the political economy of immigration policy, I briefly describe results from recent attempts to quantify the gross gains to migration, most of which focus on the United States. By gross gains, I mean ignoring the costs of migration, evidence on which is hard to come by.

As an illustrative example, consider the income gain to migrating from Mexico to the United States. The simplest way to evaluate the gain would be to compare average incomes in the two countries. In 2000, per capita GDP in Mexico was $9,700, compared with $34,500 in the United States (in 2000 PPP adjusted dollars). While the absolute income gain from leaving Mexico for the United States is surely large, it may be overstated by the difference in per capita income. One issue is that workers in Mexico and the United States have different levels of education and labor market experience. At the very least, one would want to compare incomes for individuals with similar observable characteristics. Using data from U.S. and Mexico population censuses, Hanson (2006) reports that in 2000 the average hourly wage for a 28 to 32 year old male with 9 to 11 years of education was $2.40 in Mexico and $8.70 for recent Mexican immigrants in the US.[9] At full time labor supply (35 hours per week and 48 weeks per year) this would yield a yearly income gain of $10,600. Combining household data in developing countries with data from the U.S. Census, Clemens, Montenegro, and Pritchett (2008) estimate that in 2000 the annual income gain to migration for a 35 year-old urban Mexican male with 9 to 12 years of education was $9,200. Simply by controlling for observable characteristics, the estimated gain to migration from Mexico to the United States falls from $25,000 to $10,000.

Yet, migrants and non-migrants with similar education and experience may not be the

[9] Interestingly, for Mexico the relative income gain appears similar (about four times) whether one looks at per capita GDP or hourly wages for low skilled labor. For other developing countries, per capita GDP differences overstate the relative gain to migration. See Clemens et al. (2008).

right comparison. They may differ in terms of unobserved cognitive ability, motor skills, or motivation. If migrants are positively selected on unobserved skill, the estimated $10,000 gain would overstate the benefits from emigration. Using a range of econometric techniques, Clemens, Montenegro, and Pritchett (2008) attempt to control for self-selection on unobservables in migration, as well as for the possibility that the gains to migration include compensation for the cost of moving abroad. They find that observed gains to migration overstate true gains by 1.25 to 1.5 times. For the Mexico-U.S. case, the gain to migration would fall from $10,000 to $6,700 to $8,000.

A still better comparison would be to examine income for the same individual, before and after migration. Rosenzweig (2007) uses data from the New Immigrant Survey to estimate the change in income for new U.S. permanent legal immigrants in 2003. He compares their current U.S. earnings with their earnings in the last job they held in their country of origin, prior to migration. For a legal immigrant from Mexico with 9 to 12 years of education, the average gain in income is $15,900 (again, at full time labor supply). Comparing the same individuals in two countries corrects for selection on unobservables but may introduce other complications. If preparing for migration causes an individual to lower his or her labor supply or accept a job with a low hourly wage, Rosenzweig's estimates may overstate the gains to migration.

An alternative way to gauge the income gain to migration would be to compare the incomes of two individuals from the same source country where one is randomly selected to migrate to a particular destination and the other is not. McKenzie, Gibson, and Stillman (2006) use data from New Zealand's visa lottery to examine such an experiment. They compare the income of lottery losers in Tonga (i.e., those who applied for the visa lottery and were rejected) with the incomes of lottery winners who migrated from Tonga in New Zealand. The average increase in income is 263%, which is half as large as the difference in Tongan and New Zealand per capita GDP. McKenzie et al. are also able to compare the incomes of lottery losers in Tonga with the incomes they expected to have earned if they had migrated. Expected gains are only 84%. Relatively small expected gains may reflect informational asymmetries between domestic and foreign residents regarding labor market conditions abroad.

The income gain from migration captures the gross return from moving to another country. While there has been research on the role of migration networks in migration decisions, there is little work that estimates the actual cost of migration. These costs include transport expenses in moving abroad, time lost in switching labor markets, administrative fees incurred in legal migration, border crossing costs in illegal migration, the psychic costs of leaving home, and perceived changes in uncertainty associated with living and working in another country. Given the absence of comprehensive data on migration costs, we are far from being able to produce reliable estimates of the change in net income resulting from emigration.

The change in income from emigration is the monetary gain from moving between countries. Through remittances, this gain is shared between the migrant and his or her family members at home. Remittances have increased markedly in East Asia and the Pacific, Latin America and the Caribbean, South Asia, and Sub-Saharan Africa. As of 2007, remittances exceeded official development assistance in all regions except Sub-Saharan Africa and were greater than 65% of foreign direct investment inflows in all regions except Europe and Central Asia. Among the smaller countries of Central America, the Caribbean, and the South Pacific, remittances account for a large share of national income, ranging from 10% to 17% of GDP in the Dominican Republic, Guatemala, El Salvador, Honduras, Jamaica, and Nicaragua, and representing an astounding 53% of GDP in Haiti (Acosta, Fajnzylber, and Lopez, 2007).

Having migrants abroad also provides insurance to households, helping them smooth consumption in response to income shocks, be they domestic or foreign. Yang (2007) examines changes in remittances to households in the Philippines before and after the Asian financial crisis. As of 1997, 6% of Philippine households had a member that had migrated abroad. Some had gone to countries in the Middle East, whose currencies appreciated sharply against the Philippine peso in 1997-1998, while others had gone to East Asia, where currencies appreciated less sharply or even depreciated. Consistent with consumption smoothing, remittances increased more for households whose migrants resided in countries that experienced stronger currency appreciation against the peso. Yang also examines changes in household expenditure and labor supply. Households with migrants in countries experiencing stronger currency appreciation vis-à-vis the peso had larger increases in spending on child education, spending on durable goods, children's school attendance, and entrepreneurial investments. In these households, the labor supply of 10-17 year old children fell by more, particularly for boys. These results suggest migration may help household overcome credit constraints on investment imposed by sending country financial markets.

For labor exporting countries, the costs and benefits from emigration tend to be highly unequally distributed (Fajnzylber and Lopez, 2007). Most of the gain is captured by migrants, a portion of which they share with their family members. Non-migrating workers in sending countries may also gain, as wages rise in response to a reduction in labor supply (Mishra, 2007). Yet, labor exporting countries are likely to suffer a reduction in GDP, given the loss of labor resources. If the emigrating labor is highly skilled, there may also be negative consequences for economic growth (which could be ameliorated by emigration's positive effect on the incentive to acquire skills; Docquier and Rapoport, 2008). The end result of emigration is that, at least in the short run, a relatively small number of individuals may enjoy a substantial gain while a relatively large number may experience a moderate loss. For sending countries, emigration tends to increase GNP (which in theory includes income earned by migrants) but to decrease GDP (Hanson, 2008). Here, then, is an important difference between trade and international migration. While in theory trade raises the GDP of all countries, international migration only raises the GDP of receiving countries. In theory, migration does raise GNP for all countries, but if sending countries lack the means to tax emigrants, the value of their lost labor services may not be offset by the value of the income they remit.

The gross income gain to migration appears to be large. For a young male with some secondary education, Clemens, Montenegro, and Pritchett (2008) estimate the median annual gain from migrating to the United States to be $11,200 (after applying their correction for selection bias), while Rosenzweig estimates the annual gain to legal migration to the United States to be $10,600 (at full time labor supply). The net gains to migration are unknown, however, given the absence of information about the magnitude of migration costs. Remittances spread the income gains from migration to individuals in sending countries, allow households to smooth consumption in response to income shocks, and perhaps relax credit constraints on households. Thus, while the net impact of migration on receiving countries appears to be small, for migrants and their family members in sending countries it is significant.

3 POLITICAL ECONOMY OF IMMIGRATION POLICY

Why do countries restrict immigration? Absent distortions, the first-best policy for a labor-importing country would be to have open borders. Yet, most developed countries are far from such a policy. Immigration changes the distribution of income within a country, creating winners and losers. In the United States, winners appear to include businesses that hire foreign labor, consumers that buy the goods and services that immigrants produce (Cortes, 2008), and land owners (Saiz, 2007); losers include low skilled native workers that compete with immigrants for jobs (Borjas, 2003) and taxpayers that absorb the fiscal costs of immigration (Hanson, Scheve, and Slaughter, 2008). Evidence for Europe suggests that the labor market and fiscal consequences of immigration also contribute to opposition to foreign labor inflows (Mayda, 2006; Facchini and Mayda, 2008).

By changing the income distribution, immigration has political consequences, which may give politicians an incentive to restrict labor inflows from abroad. In choosing an immigration policy, a government trades off political support from special interests against consumer welfare, which tends to be enhanced by economic openness. In a context where the median voter's wages would be reduced by immigration, politicians may choose to restrict labor inflows in order to enhance their future electoral prospects (Benhabib, 1996; de Melo, Grether, and Müller, 2001). This logic does not appear to be very applicable to the United States or Europe, where immigrants are drawn disproportionately from either the bottom end or the top end of the skill distribution. Workers in the middle of the skill distribution appear relatively unaffected by immigration, giving them little motivation for making the issue central to their voting behavior (Borjas, 2003). Alternatively, governments may restrict immigration because they weigh the welfare of different individuals unequally, for whatever reason favoring those opposed to immigration (Foreman-Peck, 1992). In the United States, fiscal conservatives have considerable political weight, given their prominence in the Republican Party. Their opposition to immigration (in concert with cultural conservatives who also resist immigration) helped derail attempts to legalize illegal immigrants and expand visas for guest workers in 2007. For fear of offending the party's base, Republican presidential candidate John McCain, who had been a leading advocate for expanded immigration, gave the issue little attention in his 2008 campaign. In Australia, Austria, Denmark, France, Greece, Italy, and the Netherlands, right wing parties have also been energized by immigration, allowing a core of anti-immigrant voters to have outsize influence in political outcomes.

Lobbying by special interests may also influence immigration policy. Facchini and Willmann (2005) extend the Grossman-Helpman model of the political economy of trade policy to consider international factor mobility. In their setup, governments restrict factor inflows from abroad through a per-factor unit tax or quota. They assume that the receiving-country government captures factor tax revenues or quota rents, and that individuals are organized according to their factor type and lobby the government on immigration policy. The first assumption appears to be counterfactual, as few governments collect significant payments from factor inflows. The second assumption has more empirical support. In the United States, periodic attempts to increase enforcement against illegal immigration are met with political opposition, particularly during periods when immigrant-intensive industries are booming (Hanson and Spilimbergo, 2001). In equilibrium, each factor lobby offers the government campaign contributions to support stronger (weaker) restrictions on inflows of factors for which its members substitute (complement) in production.

Facchini, Mayda and Mishra (2008) examine the allocation of foreign guest workers (in the form of H1B visas for skilled labor) across US industries and find that industries that spend more on lobbying the government on immigration succeed in obtaining a larger number of visas. Most H1B immigrants are in engineering, science or other technical fields, which have been in scare supply in the United States during the last two decades (Lowell, 2000). Lobbying activities are evidence that skilled immigration benefits employers, consistent with standard economic theory that inflows of labor raise the marginal product of capital. In theory, skill-intensive industries are the ones that gain most from skilled immigration, consistent with their aggressive in lobbying for visas (Facchini, Mayda, and Mishra, 2008).[10] A substantial share of visas goes to high technology firms, with Cisco, Dell, Google, Hewlett-Packard, IBM, Intel, Microsoft, Motorola, Nokia, Oracle, Qualcomm, Siemens, Sprint, Sun, and Verizon being among the companies that sponsor the largest numbers of H1B visa holders.[11]

For politicians to respond to pressure from voters regarding immigration policy, voters in destination countries must perceive that immigration affects their standard of living. In the United States, Scheve and Slaughter (2001) find that opposition to immigration is stronger among less-educated workers, which appear to be the group most hurt by labor inflows from abroad (Borjas, 2003). The opposition of the less-educated is greater in regions where immigrant

[10] See also "Google, Oracle, and Microsoft Demand H1-B Remain a Source of Cheap Labor," June 26, 2007, http://programmersguild.blogspot.com/2007/06/ microsoft-oracle-and-google-demand-that.html; and "Bill Gates: U.S. Senate Committee Hearing on Strengthening American Competitiveness," March 7, 2007, http://www.microsoft.com/ Presspass/exec/billg/speeches/2007/03-07Senate.mspx.

[11] See http://www.myvisajobs.com/Visa-Job-Browse.aspx.

inflows have been larger. Less-skilled labor's skepticism about immigration mirrors its opposition to globalization more generally (Scheve and Slaughter, 2001). Mayda (2006) obtains similar results for a cross-section of European and Asian countries. In economies where immigrants are less skilled than natives, opposition to immigration is stronger among less-skilled residents. Still, one might be skeptical about the ability of low skilled labor to influence immigration policy. Low income workers tend to have relatively low voter participation rates, giving politicians an incentive to discount their concerns. Further, in some countries many low skilled workers are themselves first or second generation immigrants, who tend to be underrepresented in the political process.

There is some evidence of organized labor lobbying against immigration, mirroring their opposition to international trade and globalization in general. In the United States, labor unions helped convince Congress to terminate the Bracero Program, which allowed several hundred thousand foreign guest workers (mainly from Mexico) to work in U.S. agriculture each growing season from 1942 to 1965 (Calavita, 1992). More recently, U.S. engineers have lobbied against the H1B visa program, though with limited success. Organized labor's opposition to the Bracero Program was consistent with its long-standing opposition to liberal immigration policies. Over time, however, union opposition to immigration has weakened. In the United States, first and second generation immigrants now constitute a rising share of union membership. Perhaps out of fear of undermining their recruiting efforts, U.S. unions have removed opposition to immigration from their political platforms. Labor unions, including the AFL-CIO, remain opposed to expanding guest worker programs, for fear that they weaken domestic labor standards, but has become less critical of permanent immigration.

The impact of immigration on the distribution of income induces special interests to lobby governments on immigration policy. Business groups tend to favor immigration and lobby to keep barriers low. Labor groups tend to oppose immigration and lobby to keep barriers high. Were these the only forces affecting immigration policy, one would expect admission standards to be much more relaxed than they are now. In the United States, organized labor has diminished political power and in recent decades has softened its opposition to immigration. At least from the perspective of the wage impacts of immigration, one would expect policy makers to favor more sizable labor inflows. That they do not suggests other factors also shape immigration policy. Next, I consider how the fiscal consequences of immigration affect policies governing labor inflows from abroad.

4 FISCAL IMPACTS OF IMMIGRATION POLICY

Tax and transfer policies create another motivation for a labor-importing country to restrict immigration, even where the level of immigration is set by a social planner. If immigrants are primarily individuals with low income relative to natives (which may be true even if migrants are high skilled relative to non-migrants in the source country), increased labor inflows may exacerbate distortions created by social-insurance programs or means-tested entitlement programs (Wellisch and Walz, 1998). Such policies may make a departure from free immigration the constrained social optimum. In the long run, immigrants may also affect voting outcomes directly through their participation in the political process, possibly leading to a further transfer of income away from native taxpayers (Razin, Sadka, and Swagel, 2002; Ortega, 2004).

In the United States, the fiscal consequences of immigration appear to matter for immigration policy preferences. Low-skilled immigrants – who account for one-third of the U.S. foreign-born population – tend to earn relatively low wages, pay relatively little in taxes, and receive subsidized health care with relatively high frequency (Borjas and Hilton, 1996; Fix and Passel, 2002). Hanson, Scheve, and Slaughter (2007) find that U.S. natives who are more exposed to immigrant fiscal pressures – those living in states that have large immigrant populations and that provide immigrants access to generous public benefits – are more in favor of reducing immigration. This public-finance cleavage is strongest among natives with high earnings potential, who tend to be in higher tax brackets. Facchini and Mayda (2008) obtain similar results for Europe, where immigrants also appear to be a fiscal drain (Sinn, Flaig, Werding, Munz and Hofmann, 2003). More educated individuals, who are also likely to be high income earners, are more opposed to immigration in countries where immigrants are less skilled and governments are more generous in the benefits they provide.

There are also regional inequalities in the fiscal impacts of immigration. These are particularly noticeable in the United States. States and localities incur much of the fiscal cost associated with immigration, while the federal government receives much of the revenues (Hanson, 2006). In the United States, states and localities pay for public education and public health, with support from the federal government in the form of block grants. About half of the value of public services that immigrants absorb is in the form of publication education, with health care occupying the second category. Much of the tax revenues from immigration, in contrast, go to the federal government. While sales taxes and property taxes are captured by states and localities, payroll taxes and federal income taxes would go to Washington, DC. Illegal immigrants often have payroll taxes withheld because they present Social Security cards to employers (be they real or fake) as proof of employability. By law, U.S. employers are required to ask for documents proving the eligibility of an individual for employment but they are not required to go to great efforts to verify the authenticity of these documents. As part of an accepted fiction in employing illegal immigrants, employers deduct payroll taxes from their paychecks and pay these to the federal government. Contributions maid on behalf of invalid Social Security accounts go into the Earnings Suspense Fund, which as of 2007 held $600 billion. Many illegal immigrants pay federal income taxes, as well, as this creates a paper trail of their earnings which is useful for obtaining home loans and car loans from banks.

How large are the net fiscal consequences of immigration in actuality? The truth is we do not really know. The vast majority of studies, including the analyses of immigration and public pensions discussed below, are calibration exercises based on assumptions about future immigration and immigrant behavior. One of the few comprehensive national level analyses of the fiscal impact of immigration was by the National Research Council (NRC), which conducted case studies on the states of New Jersey and California and for the United States as a whole (Smith and Edmonston, 1997). In 2000, the share of the foreign-born in the adult population was 34% in California, 24% percent in New Jersey, and 15% in the United States. Interestingly, California and New Jersey states have immigrant populations with quite different skill profiles and patterns of welfare usage. In 2000, the share of immigrant households headed by someone with less than a high-school education was 34% in California and 29% in the nation as a whole, but only 23% in New Jersey. Similarly, the share of immigrant households receiving welfare benefits was 13% in California and 10% in the nation as a whole, but only 8% in New Jersey. These differences in welfare uptake are due in part to immigrants in California being less skilled and in part to California offering more generous benefits.

Based on federal, state, and local government expenditures and tax receipts, the NRC estimated that the short-run fiscal impact of immigration was negative in both New Jersey and

California. In New Jersey, using data for 1989–1990, immigrant households received an average net fiscal transfer from natives of $1,500, or 3% of average state immigrant household income. Spread among the more numerous state native population, this amounted to an average net fiscal burden of $230 per native household, or 0.4% of average state native household income. In California, using data for 1994–95, immigrant households received an average net fiscal transfer of $3,500, or 9% of average immigrant household income, which resulted in an average fiscal burden on native households of $1,200, or 2% of average native household income. The impact of immigration on California is more negative because immigrant households in the state (a) are more numerous relative to the native population, (b) have more children, causing them to make greater use of public education, and (c) earn lower incomes, leading them to have lower tax payments and greater use of public assistance.

For the entire United States, the NRC estimated that in 1996 immigration imposed a short-run fiscal burden on the average U.S. native household of $200, or 0.2% of U.S. GDP.[12] In that year, the immigration surplus, as calculated by Borjas (1999), was 0.1% of GDP. A back of the envelope calculation then suggests that in the short run immigration in the mid-1990s reduced the annual income of U.S. residents by about 0.1% of GDP. Given the uncertainties involved in making this calculation, one should not put great stock in the fact that the resulting estimate is negative. All one can say is that the available evidence suggests the total impact is quite small.

What about illegal immigrants? Camarota (2004) applies the NRC methodology to estimate the fiscal impact of illegal immigration in the United States. He finds that in 2002 US illegal immigrants on net received $10 billion more in government benefits than they paid in taxes, a value equal to 0.1% of US GDP in that year. With unauthorized immigrants accounting for 5% of the US labor force, US residents would receive a surplus from illegal immigration of

[12] Going from a short-run to a long-run estimate of the fiscal cost of immigration can change the results considerably. Immigrants are relatively young and far from their peak earning and taxpaying years. As immigrants age, their net fiscal contribution increases. Also, their children are likely to be more educated and to make greater tax contributions. The NRC estimates that the average immigrant admitted in 1990 would produce a net fiscal contribution of $80,000 over the next 300 years (in present discounted value terms), with the contribution depending on the individual's skill level. The long-run fiscal contribution is negative for low-skilled immigrants (less than a high-school education) and positive for higher-skilled immigrants (more than a high-school education). Going 300 years forward requires strong assumptions about the future economy. Even for the average immigrant, the annual net fiscal contribution is negative for the first twenty-five years after arriving in the United States. The long-run estimate assumes the federal government will ultimately raise taxes to bring the federal budget into balance. If this doesn't happen, the long-run fiscal contribution of the average immigrant would be negative.

about 0.03% of GDP. Combining these two numbers, it appears that as of 2002 illegal immigration caused an annual income loss of 0.07% of US GDP. Again, given the uncertainties surrounding this sort of calculation, one could not say with much confidence that this impact is different from zero.

Pay as you go pension systems create a further incentive for politicians to manipulate the timing and level of immigration (Scholten and Thum, 1996; Razin and Sadka, 1999; Poutvaara, 2005). Governments may choose to permit immigration of young workers, in order to smooth adjustment to demographic shocks, such as the aging of the baby boom generation (Auerbach and Oreopoulos, 1999; Storesletten, 2000). Given its graying population and unfunded pension liabilities, one might expect Europe to be opening itself more aggressively to foreign labor inflows (Boeri, McCormick, and Hanson, 2002). However, concerns over possible increases in expenditure on social insurance programs may temper the region's enthusiasm for using immigration to solve its pension problems (Boeri and Brücker, 2005; De Giorgi and Pellizzari, 2006).

Analysis for Spain suggests that maintaining high levels of immigration would substantially reduce the net fiscal burden for future generations of natives, owing to the fact that in the absence of immigration plunging fertility would leave relatively small cohorts of future workers to finance the public pensions of relatively large cohorts of retired workers (Collado, Iturbe-Ormaetxe, Guadalupe Valera, 2004). For Sweden, which has a strong welfare state, the net fiscal impact of immigration appears to depend crucially on the labor force participation rate for immigrant workers. In a calibration exercise, Storesletten (2003) finds that if immigrant participation rates stay above 60% the net discounted economic impact of immigration is positive for natives in the country. In the United States, where the fertility decline has been much less pronounced than in Spain, the long run fiscal impacts of immigration are much more sensitive to assumptions about future patterns of public spending (Auerbach and Oreopoulos, 1999).

Beyond the economic consequences of labor inflows, some argue that opposition to immigration is grounded in culture, with individuals preferring homogenous societies because they foster a stronger sense of national identity and civic purpose (Huntington, 2005). Consistent with this claim, the recent anti-immigration-based presidential campaigns of Pauline Hanson in Australia, Jean Marie Le Pen in France, and Tom Tancredo and Duncan Hunter in the United

States each touted the negative cultural effects of foreign labor inflows. Using individual survey data, Dustmann and Preston (2004) suggest that racist attitudes are an important component of opposition to immigration in the United Kingdom. In a related vein, Hainmueller and Hiscox (2004) claim that greater tolerance for immigration among the college educated reflects cosmopolitan attitudes rather than economic concerns.

Because fiscal conservatives and cultural conservatives are often aligned politically, it is difficult to disentangle how important cultural attitudes are in promoting resistance to immigration. While opposing immigration in order to conserve cultural homogeneity may have appeal in Europe, Japan, or Korea, it is an odd case to make in the United States, given its long history of immigration by groups without a significant presence in the country. Immigrants from Germany in the 18th century, Ireland in the 19th century, and Italy and Eastern Europe in the early 20th century successfully assimilated into U.S. society. Recent generations of Mexicans and Central Americans are assimilating at comparable speeds. While cultural attitudes may present initial resistance to immigration, they may fade in importance with time.

In Europe, the challenge of immigration from Islamic countries is contributing to cultural and ethnic tensions not seen for over a generation.[13] Though empirical research is just emerging on the topic, there is evidence that Muslim immigrants in Europe are slow to assimilate and integrate into society (Bisin, Patacchini, Verdier, and Zenou, 2008). One conjecture is that the slow pace of Muslim assimilation in Europe (relative to the United States) is not attributable to any particular features of the Muslim population but to rigid rules governing labor markets in Europe, which make economic progress difficult for new entrants (be they the young or the foreign born).

Tax and spending policies associated with the modern welfare state create an environment in which immigration from low income countries may exacerbate fiscal distortions. Where immigrants have relatively low income levels, as in the United States and Europe, welfare policies serve to transfer income from native households to immigrant households. Adverse fiscal impacts from immigration for natives create political opposition to foreign labor inflows, which may be reinforced by regional disparities in who pays for the public services that immigrants consume. Opposition to immigration may be softened by the positive effect that admitting foreign workers has on the solvency of public pension systems. While Europe and

[13] See, e.g., "Two Amalgamated Worlds," *The Economist*, April 3, 2008.

Japan have not yet turned to immigration as a way of easing the transition to a future with smaller national labor forces, the pension obligations their governments have vis-à-vis coming generations of retirees may create an incentive to do so.

5 THE DESIGN OF IMMIGRATION POLICY REGIMES

Because immigration may create tension with the functioning of the welfare state, high income democratic countries – all of which have welfare systems of one kind or another – may resist the unfettered inflow of foreign labor. One solution to the conflict would be to deny immigrants access to welfare benefits, which would allow receiving countries to gain from labor inflows while not exacerbating fiscal distortions too severely. Guest worker programs in part serve this purpose. They grant foreign workers admission visas, while restricting their residency rights by placing limits on the amount of time they can spend in the country and the public services to which they have access. Yet, in most countries, guest worker programs remain small. In the United States, temporary immigrants accounted for only 3% of the total stock of immigrants in the country in 2005 (Camarota, 2005). In 2006, inflows of legal temporary workers were 213,000 in Australia, 146,000 in Canada, 28,000 in France, 295,000 in Germany, 98,000 in Italy, 164,000 in Japan, 83,000 in the Netherlands, and 266,000 in the United Kingdom (OECD, 2008). Note that given the short term status of guest workers these numbers represents *stocks* and not *flows* of temporary immigrants (i.e., these populations of workers turn over completely every one to three years).

Interestingly, it is non-democratic countries, including the Gulf States, Hong Kong, and Singapore, that appear to channel most of their low-skilled immigrants through guest worker programs (Rupert, 1999; Winckler, 1999). Table 2 shows the stock of immigrants in 2000 in the six largest Middle Eastern labor importing countries, Bahrain, Jordan, Kuwait, Qatar, Saudi Arabia, and the United Arab Emirates.[14] In 2000, immigration in these countries accounted for 6.4% of the world total and 7.5% of world immigration from low and middle income countries.

[14] While immigrants accounts for a large share of the populations of Hong Kong and Singapore, labor inflows into these countries are a small share of the world total (with the exception of migration from China to Hong Kong, which totals 2.2 million individuals). In 2000, the number of non-Chinese immigrants in Hong Kong and Singapore were just over a half a million individuals in each country (Parsons et al., 2007).

Two thirds of the immigration in the six Gulf States comes from just seven sending countries, Bangladesh, Egypt, India, Indonesia, Pakistan, the Philippines, and Yemen.

Why would Gulf States be willing to admit large numbers of low skilled immigrants as guest workers whereas the United States and Europe effectively force similar labor inflows to be illegal? One conjecture is that non-democratic countries are better able to enforce the departure provisions of guest worker contracts (Massey, 2004). The Gulf States do appear to be aggressive in deporting illegal immigrants (Shah, 2006). Enforcing departure requires immigration authorities to be able to monitor the movements of immigrants. A government cannot deport immigrants that violate the terms of their visas unless it can locate them. Monitoring may be aided by the internal surveillance that non-democratic countries maintain as part of their national security infrastructure. Tight internal security may make it difficult for illegal immigrants to evade apprehension. The watchful eye of the government may thus enhance the capability of the state to run large scale temporary immigration programs.

Relative to non-democratic societies, democratic countries are typically less vigilant over the movements of individuals. The protection of civil liberties inherent to democratic societies may complicate the internal enforcement of temporary immigration visas (Martin, 2001). Concerns over violating civil liberties may impede the state from acquiring information over where immigrants live and work. If immigrants in democratic countries choose to overstay their visas and violate the terms of their temporary labor contracts, they often can (Passel, 2006). One consequence of imperfect vigilance in democracies may be that voters are skeptical about the ability of governments to force temporary migrants to return home after their labor contracts are completed. Imperfect enforcement of guest worker contracts for low skilled immigrants may lead voters to view such programs as simply allowing open ended immigration, causing them to have weak political support (Briggs, 2004).

How do democratic receiving countries resolve the conflict between the welfare state and the need for immigration? One way is by effectively forcing low skilled foreign workers to enter their countries as illegal immigrants. Illegal immigration gives receiving countries access to the labor they desire, while limiting the fiscal consequences of labor inflows. In the United States, illegal immigrants account for 30% of the foreign born population in the country (Passel, 2006). Illegal immigration is by no means exclusively a US phenomenon. For the European Union, Jandl (2003) estimates than the gross annual inflow of illegal immigrants is on the order of

650,000 to 800,000 individuals a year, which is comparable to gross illegal inflows in the United States. Inflows of this magnitude do not necessarily translate into large stocks of illegal immigrants in part because European countries have been aggressive in providing amnesties to illegal immigrants. Greece, Italy, Portugal, and Spain have each offered multiple amnesties, which has kept the share of illegals in the region's foreign born population under 10% (Jandl, 2003).

While the United States and Europe devote resources to enforcing their borders against illegal immigration, it is evident that these enforcement efforts are not meant to be too effective. The United States spends about $15 billion a year on border enforcement efforts and apprehends 0.8 to 1.2 million individuals attempting to enter the country illegally (Hanson, 2006). In the European Union, there are no official data on spending on border enforcement or on the number of illegal immigrants detained but Jandl (2003) suggests that there are at least 0.3 to 0.4 million apprehensions of illegal immigrants in EU countries each year. The United States and Europe could easily afford to spend far more on border enforcement but choose not to. High levels of illegal immigration reflect a decision on the part of receiving country governments to allow illegal entry to occur. Illegal immigration is a policy choice.

To understand why countries permit both legal and illegal immigration it is helpful to review the mechanisms that countries use to govern admissions. Countries regulate legal immigration through a combination of numerical quotas, entry selection criteria, and restrictions on residency rights. While many countries have admission categories that allow unrestricted immigration, these are generally limited to immediate family members of citizens, as in the United States, or individuals from countries within an economic bloc, as in the European Union. Other legal immigrants are subject to quotas, whose number varies according to a nation's *ex ante* selection criteria. The United States allocates the majority of permanent residence visas to relatives of U.S. citizens and legal residents; Australia and Canada favor legal immigrants that meet designated skill criteria; and many European countries reserve a large share of visas for refugees and asylees (OECD, 2008). Visas come with limited residency rights. Temporary visas specify a time limit for residence, the types of jobs a visa holder may hold, and the set of government benefits to which the holder has access. Permanent visas provide broader residency rights, such as mobility between employers and access to more government benefits, but do not always offer a clear path to citizenship.

Regarding illegal immigration, while countries do not explicitly set unauthorized labor inflows, they do implicitly determine the ease of illegal entry through their enforcement actions. By choosing the intensity with which they police national borders and monitor domestic worksites, governments influence the smuggling fee illegal immigrants pay to enter a country (Ethier, 1986; Gathmann, 2004). Enforcement also defines an *ex post* selection criterion for illegal immigrants: individuals who are able to evade capture by avoiding the police earn the right to stay in the country (Cox and Posner, 2006). The United States, for instance, concentrates enforcement on borders rather than in the interior, allowing most illegal immigrants who do not commit crimes or maintain a high public profile to remain on U.S. soil (Davila, Pagan, and Grau, 1999). While illegal immigrants lack official residency rights, they are not devoid of legal protections. Again in the United States, illegal immigrants may report crimes, attend public schools, seek emergency medical services, obtain bank loans, or even acquire a driver's license (in some states), with minimal risk of deportation.

Recently, countries have begun to change the way they approach enforcement against illegal immigration. Beginning in 2006, immigration authorities in the United States dramatically increased large scale raids of US worksites and sought to locate immigrants who had ignored deportation orders, as a means of increasing enforcement against illegal immigration in the US interior (Camarota, 2008). The government has increased interior enforcement against illegal immigration at several points in the past (the early 1950s, 1987, 1994, and 2001), only to relax these efforts once economic conditions generated an increase in the demand for labor (Hanson, 2006). With the transition in government from President Bush to President Obama, there are signs that the United States will place less emphasis on enforcement against illegal immigration in the US interior, returning to the traditional practice of focusing on the border.[15]

For migrants, there are obvious disadvantages associated with high-income countries channeling the low skilled through illegal means of entry. Illegal migration is dangerous, subjecting migrants to physical risks associated entry by sea, across deserts, or hidden in transport vehicles. To reduce physical risks, migrants often seek the services of a smuggler, but this entails risks of its own associated with robbery or assault. Once in the destination country, being illegal leaves migrants in a state of uncertainty and weakens their ability and incentive to make long run investments in their place of residence. By virtue of their status, illegal

[15] See, e.g., http://www.barackobama.com/issues/immigration/.

immigrants lack legal recourse and may be apprehensive to seek police or fire protection when the situation calls.

Cross-country differences in policy regimes do not affect the skill mix of immigrants as much as one might think. Antecol, Cobb-Clark, and Trejo (2003) find that excluding immigrants from Latin America – who benefit from close proximity to the United States – the education, English fluency, and income of immigrants in Australia, Canada, and the United States are relatively similar. This is true despite Australia's and Canada's use of a point system that favors skilled immigrants and the US reliance on family reunification, which takes no account of skill, for the majority of its admissions. Comparing immigrants admitted on employment-based visas in Australia and the United States, Jasso and Rosenzweig (2007) suggest that it is self-selection, rather than national screening mechanisms, which accounts for differences in immigrant skills.

Even with similarities between countries in who gets in, there are differences within countries in how legal and illegal inflows are regulated. As discussed above, authorized entrants tend to be subject to quantity regulation and ex ante selection criteria and have either expansive residency rights (for permanent immigrants) or limited residency rights (for temporary immigrants); and unauthorized entrants tend to be subject to price regulation and ex post selection criteria and have minimal residency rights.

Why do countries permit both legal and illegal immigration? First, consider legal inflows. Quantity regulation allows a country to achieve specific goals in admissions, by assigning quotas to particular categories. The allocation of quotas may reflect a desire to maximize the immigration surplus (by admitting scarce labor types), political economy constraints on the level and type of immigrant inflows, or other objectives of government (e.g., national security, cultural homogeneity, humanitarian concerns). An ex ante screen has a cost in that the government foregoes the option to obtain information on an immigrant beyond observable characteristics, before offering admission (Cox and Posner, 2006). However, the cost of foregone information may be small for skilled immigrants whose abilities are verifiable in the form of educational degrees, professional awards, and past employment positions. The effective information cost may also be small where countries have strong preferences for specific types of entrants (e.g., family members), in which case any updating on immigrant quality after residence in the country would be unlikely to alter the admission decision.

Combining an ex ante screen with broad residency rights gives immigrants a strong incentive to assimilate. However, broad rights have a high fiscal cost, since they give immigrants access to government benefits. The cost of providing broad rights may be small for skilled immigrants, whose income-earning ability would make them net contributors to government coffers. For family-based immigrants, the perceived cost of broad rights may also be small since, as family members of residents, their well being may be an implicit component of national welfare. For refugees and asylees, a similar logic would not apply, perhaps accounting for why they tend to have narrow residency rights (Åslund, Edin, and Fredriksson, 2001; Hatton and Williamson, 2004).

Quotas do not imply as much inflexibility in immigration levels as it would seem, since countries often admit a mix of permanent and temporary entrants. Opponents to immigration may be unwilling to allow all entrants be permanent. Temporary immigration quotas give politicians the power to rescind visas in the future, which may increase support for immigration. The cost of having immigrants be temporary is a weak incentive to assimilate. Comparing the costs and benefits, we might expect the share of temporary immigrants in legal admissions to be higher when an economy is closer to a business cycle peak, at which point the option value of being able to expel current entrants in the future may be relatively high.

Constitutional rules governing citizenship may constrain legal immigration policy regimes. Countries allow individuals to acquire citizenship by birth, naturalization or marriage. Under the *jus soli* principle, which is rooted in both civil and common law traditions, citizenship is acquired by place of birth, implying the native-born child of an immigrant is a citizen. Under the *jus sanguinis* principle, citizenship is acquired by descent, such that the child of a citizen is also a citizen, regardless of birthplace. Current citizenship laws often embody both principles, though they tend to have emerged out of one tradition or the other. Jus soli was predominant in Europe through the 18th century, given feudal traditions linking citizenship to land. The French adopted jus sanguinis in the early 19th century, which then spread throughout continental Europe and its colonies. The United Kingdom, however, preserved jus soli, which was adopted by the United States, Canada, and Australia (Bertocchi and Strozzi, 2006). Under a jus sanguinis tradition, a country may have difficulty in granting broad residency rights to immigrants whose parents were not citizens, as appears to be the case in France.

Source country policies may also affect which immigrants become naturalized in destination countries. During the 1990s, Brazil, Colombia, Costa Rica, the Dominican Republic, and Ecuador each enacted laws permitting dual citizenship. Mazzolari (2005) finds that between 1990 and 2000 U.S. naturalization rates for eligible immigrants from these countries increased relative to immigrants from other countries, suggesting that not having to give up citizenship in the source may speed assimilation in the destination.

For illegal immigration, entry prices and selection criteria are defined implicitly through the intensity of border and interior enforcement (Either, 1986). Entry prices serve as selection device, since an individual must value migration to be willing to incur the cost of paying a smuggler. Entry fees thus select immigrants with large perceived income gains (Orrenius and Zavodny, 2001), which would include those for whom immigration would yield large gains in either pre-tax income (due to a productivity gain from immigration) *or* post-tax income (due to tax and transfer policies in the destination). While most destination countries would prefer to attract the first type of immigrant over the second, an entry price does not select between the two.

One way to encourage immigration of more productive illegal immigrants is through granting narrow residency rights. For instance, since 1996 non-citizens in the United States have been ineligible for most types of federally funded public assistance (Fix and Passel, 2002). A second way is through ex post screening. Interior enforcement helps screen out illegal immigrants who commit crimes, try to obtain government benefits illicitly, or engage in other behavior deemed objectionable. Governments that choose *not* to monitor employers that hire illegal immigrants can ensure that illegals who come to work are able remain in the country. In the United States, greater border enforcement does not appear to have strong deterrent effects on illegal entry (Davila, Pagan, and Soydemir, 2002) or to affect wages or employment in U.S. border cities (Hanson, Robertson, and Spilimbergo, 2001), suggesting that the primary role of enforcement is not to disrupt U.S. labor markets.

Combining price regulation, narrow residency rights, and an ex post screen helps countries attract productive and motivated illegal immigrants. This selection process may be particularly important for the low-skilled, whose observable characteristics may be uninformative about their productivity. In the United States, two-thirds of immigrants with less than a high school education appear to be in the country illegally (Passel, 2006), suggesting that the majority of the least skilled immigrants are unauthorized. Relative to similarly skilled natives, low-skill immigrants have high employment rates and low rates of participation in crime (Butcher and Piehl, 1998 and 2006).

The United States and the EU have considered using expanded temporary immigration to absorb their illegal immigrant populations (Walmsley and Winters, 2005; Schiff, 2007). Large scale illegal entry in the United States began after the end of the Bracero Program (1942-1964), which admitted large numbers of seasonal laborers from Mexico and the Caribbean to work on U.S. farms (Calavita, 1992). Could new guest worker programs end illegal inflows? Recent literature suggests that unless interior enforcement is highly effective at preventing employers from hiring illegals, a guest worker program that rations entry would not curtail the employment of unauthorized labor but simply push these workers deeper into the underground economy (Djajic, 1999; Epstein, Hillman, and Weiss, 1999; Epstein and Weiss, 2001).

The emergence of large scale illegal immigration in the United States and Europe can be seen as the result of a conflict between a desire to allow immigration of low skilled individuals (most of whom are from low income countries) and a desire to maintain a significant welfare state. The mechanisms that govern illegal immigration select individuals with a strong motivation to work and restrict their access to government benefits. The advantage of such a system is that it subjects illegal immigration to market forces, producing a level of immigration and a composition of immigrants that reflect relative economic opportunities in sending and receiving countries. In practice, illegal immigration appears to be more flexible and more responsive to economic conditions than legal immigration.

Yet, there would appear to be clear disadvantages to illegal immigration. It creates a class of individuals with poorly defined residency rights, who, in the absence of occasional amnesties, lack legal protection. The presence of a large group of individuals living without official status may undermine civil society in receiving countries by weakening democratic norms and reducing the incentive of politicians to respond to the needs of their constituents (Huntington, 2004). The uncertain tenure of illegal immigrants may reduce their incentive to make long run investments in the receiving country, preventing some productivity gains from being realized. Allowing illegal immigration creates the incentive for entry by criminal gangs, who offer smuggling services but may subject prospective migrants to the risk of abuse (Martin and Miller, 2000). The challenge to policy makers is to design an immigration regime that has the appealing efficiency properties of illegal immigration – in terms of its flexibility and screening mechanisms – but lacks the negative consequences for the rule of law in receiving countries and the physical security of migrants.

6 DISCUSSION

In a neoclassical economy, the optimal immigration policy would be to allow the unfettered entry of labor from abroad. Yet, labor-importing countries tightly restrict labor inflows. Barriers to immigration in part reflect domestic political opposition to open borders, with those most opposed to labor inflows being the workers and taxpayers who are most exposed to the adverse consequences of immigration on labor markets and fiscal accounts. Immigration barriers may also represent a second-best policy that governments adopt in order not to exacerbate distortions associated with domestic social-insurance programs that they are unwilling to dismantle.

The structure of immigration policy regimes suggests that destination countries also use barriers to identify individuals who appear likely to be productive workers and/or have the desire to assimilate. Reserving immigration visas for skilled workers selects high ability foreigners in a transparent manner. Restricting the residency rights of immigrants helps screen out those whose primary interest is in enjoying rich-country welfare benefits. Less transparently, barriers to illegal immigration also select the more productive and more motivated workers among the low-skilled, whose ability is hard to observe. The existence of informational problems in evaluating immigrants' abilities and motivations suggests there may be gains from coordination between labor-exporting and labor-importing countries. Were labor-importing countries to have access to better information on the employment histories of low-skilled individuals in developing countries, they might be willing to accept them in larger numbers and require fewer of them to enter their economies as illegal immigrants.

There would appear to be strong efficiency arguments for having high income countries admit more immigrants. Their unwillingness to do so reflects an estimation that the gains from higher immigration are not worth the political and fiscal costs. There would also appear to be efficiency gains associated with converting illegal immigrants into legal immigrants. Legality would reduce the uncertainty and physical risk that are inherent to unauthorized migration, increase the incentive of migrants to make investments in human or physical capital, diminish the scope for criminal gangs to capture a portion of the gains to migration, and strengthen the rule of law in receiving countries. The challenge in converting illegal immigrants into legal immigrants – in terms of maintaining domestic political support for such a policy – is avoiding making fiscal distortions in receiving countries worse.

Given the absence of an incentive for receiving countries to participate in multilateral negotiations on immigration barriers, efforts to reform immigration policies will have to come from receiving countries themselves. What measures would encourage individuals and governments in receiving countries to accept higher levels of legal immigration from low income countries?

- *Have employers internalize the fiscal cost of hiring immigrant workers.*

One source of opposition to immigration is that it results in a net fiscal transfer from native households to immigrant households, at least in cases where immigrants have low income levels relative to natives (under the assumption that the receiving country tax system is progressive). Low skilled immigration thus imposes a negative pecuniary externality on native taxpayers in the form of a higher net tax burden. Employers in receiving countries would make efficient choices regarding the employment of immigrant workers if they had to internalize the fiscal cost. One mechanism for internalization is a payroll tax that is specific to immigrant workers. It is likely that the incidence of the payroll tax would fall largely on labor, in which case lower wages for foreign workers would reflect their true productivity in receiving countries. The tax would be set to reflect the number of family members coming with an immigrant employee.

Establishing an immigrant payroll tax would create a two tiered payroll tax structure, one for native workers and one for immigrant workers. There is precedence for separate taxation of foreign labor in how temporary foreign workers are currently treated. Immigrants would convert to the native tax system upon naturalization.

The revenues from immigrant payroll taxes could be divided among local and national governments, according to which entities incur the marginal cost of providing public services to immigrants. In this way, local governments would not have an incentive to impede immigration, as they have attempted to do in many parts of the United States (through restrictions on the hiring and housing illegal immigrants).

A payroll tax on immigrant workers may be unappealing on equity grounds, given these individuals have low incomes and are often among the most marginal members of society in destination countries. My argument is that a payroll tax of this type would generate increased political support for immigration of low skilled labor. While the welfare of existing immigrants would likely decline, there would be large welfare gains for the additional individuals who were able to become migrants. There thus may be a tradeoff in terms of the welfare of existing migrants and the welfare of potential migrants. Of course, one might prefer that high-income countries simply lower their immigration barriers and absorb whatever fiscal costs this might entail. However, political realities suggest such an outcome is extremely unlikely.

- *Create an incentive for employers to hire legal immigrants.*

To convert current and future illegal immigrants into legal immigrants requires changing the incentives for employers in receiving countries. For employers, one key change is ending their ability to hire illegal immigrants under the guise of legal employment, as currently occurs in the United States. This could be achieved by having a national identification card, as exists in some European countries, or by imposing a mandatory verification system for employment eligibility. The United States has developed an electronic system known as E-Verify, in which prospective employees have their documents checked against a government database. As it stands, verification is mandatory only for government contractors and a few select types of other firms. Making electronic verification mandatory for all firms would end the ability of employers to plausibly deny that they have knowingly hired illegal immigrants. Verification would make monitoring of employers a much more significant deterrent against violating employment regulations. Of course, mandatory verification of employment eligibility would not curtail employment of illegal immigrants in all sectors. Enforcing employment practices by households and small firms would be very costly. Employment of illegal immigrants in the home and in small firms would likely continue, with housecleaning, child care, yard care, home renovation, and small scale construction being among the sectors where employment of illegal immigration would be hardest to root out. Still, mandatory verification would dramatically reduce the incentive to hire illegal immigrants in medium and large firms, which account for most employment.

A second key change is making employment visas available in sufficient quantity. One appeal of hiring illegal immigrants is that they are available immediately, with their numbers fluctuating over the course of the business cycle. One way to make visas responsive to market conditions is to auction their supply (Freeman, 2006). Were governments to set a target price for visas, they could vary the supply to keep the visa price relatively constant. Specifying visas for a given length, say, one, two, or three years, would ensure that governments had the ability to raise or lower the total number of visas in circulation. Workers and employers would be free to determine how they divide the cost of the visa. Employment contracts would be required to specify the price at which a worker could "purchase" his or her visa from an employer in the event the worker wanted to change jobs before the visa had expired. The sale of visas would generate revenue for receiving countries, transferring a portion of the gains from migration from migrants to the host country. Capturing these gains would encourage receiving countries to raise immigration of low skilled individuals beyond current levels.

While auctioning visas might appear to be a significant change in how receiving countries govern legal immigration, recall that regimes governing illegal immigration are already price regulated. Smugglers charge fees to migrants to enter receiving countries illegally, with the fee reflecting demand for entry (rising during relative boom periods in the receiving country) and the cost of illegal crossing (rising during periods of more intense border enforcement by the receiving country). Auctioning visas would allow receiving countries to capture revenues currently enjoyed by smugglers. Migrants would go from paying smugglers a fee for an uncertain entry outcome to paying a fee for a certain entry outcome, arguably improving their welfare even if the entry price rises.

- *Create an incentive for migrants to work as legal employees.*

For migrants, the imposition of a payroll tax and the auctioning of visas could create an incentive for them to eschew legal employment and seek work in the underground economy as unauthorized employees. While mandatory verification and monitoring of employers would dissuade many firms from hiring illegal immigrants, not all firms would be deterred. Migrants would also need incentives to operate in the legal economy. One incentive is the promise of permanent residence and citizenship. Suppose that migrants could accumulate points toward obtaining a permanent residence visa by obtaining and completing satisfactorily a series of temporary employment visas. Migrants would have an incentive to comply with the requirements of a temporary visa if they wanted to get their visa renewed at the end of the visa period. These requirements would include working in the receiving country only with a valid employment visa, paying all relevant payroll taxes, and not using public services for which temporary immigrants are ineligible (e.g., in the United States, non-citizens are ineligible for federally funded income support payments). After a specified number of temporary visa renewals, an immigrant would be eligible for permanent residence and, after a specified waiting period, citizenship, brining full residency rights. Such a system of graduated residency rights (going from an initial temporary visa to a renewed temporary visa to permanent residence to citizenship) would provide a strong incentive for migrants to play by the rules. Citizenship would be conditional on behavior. Illegal migrants would progress from the current environment of vague promises of permanent residence in return for their working hard and staying out of trouble to a system where the rewards to compliance are well defined and subject to low risk.

Of course, to make such as system work receiving countries would have to be willing to steadily expand the supply of permanent residence visas. Their incentive for doing so would be the revenue generated by auctioning visas and collecting payroll taxes on temporary immigrants and the reduction of illegal immigration.

- *Create screening mechanisms for low skilled immigrant workers.*

One of the appealing features of illegal immigration is that it attracts individuals with a strong desire to work. By virtue of having to pay an entry fee and not having access to a safety net, illegal immigrants are highly motivated to stay employed. The challenge for policy makers is to replicate these features through a system of legal migration. One way to accomplish this would be by allowing international employment agencies to matching workers in sending countries with employers in receiving countries. Employment agencies would serve as intermediaries, obtaining information on the skill profile and work history of prospective migrants and the occupational requirements of employers. Employment agencies have come to play a large role in domestic hiring by firms in high income countries, particularly the United

States (Autor, 2008). In the Philippines, such agencies help place workers in construction jobs in Gulf States and domestic service jobs in Hong Kong and Singapore.

The active market for illegal labor in the United States and Europe may have reduced the scope for legal intermediaries. Since legal intermediaries risk fines or imprisonment by taking illegal immigrants as clients, their incentive to enter the market is limited. Perhaps as a consequence, employers primarily use informal networks to find workers, relying on their employees to recruit friends and relatives from sending countries (Massey et al., 1994). Such networks serve a useful purpose but by their nature are small in scale. Converting illegal immigrants into legal immigrants would potentially increase the demand for formal intermediaries to help employers find workers abroad.

Screening mechanisms should not rely on sending countries to be gatekeepers for emigration. Were sending country governments given the power to select which individuals would obtain visas to work abroad, the incentive for corruption would be great. Initially, the Bracero Program had the Mexican government allocating visas to migrants to work in the United States (Calavita, 1992). Rampant corruption and abuse of workers put an end to this. U.S. employers then began to contract directly with Mexican workers (often using their own recruiters to find field hands).

This is one argument against attempting to regulate migration through bilateral agreements. What exactly would sending country governments bring to the table in such an arrangement? It is difficult to imagine that they would have access to information about workers that destination country employers would value. It is also difficult to see why they would have a desire to regulate migration in a manner that helped emigrants. If emigrants cease to be voters by virtue of leaving, sending country governments may have weak incentives to be responsive to their interests. Further, to the extent they would exercise control over the supply of labor, sending country governments would have an incentive to attempt to appropriate the gains to migration from migrants. Migrants would likely be better offer if they were free to enter into labor contracts with employers in destination countries, without requiring the approval of the sending country.

Allowing more labor to move from low income countries to high income countries would raise world income, generating gains for migrants, migrant family members in sending countries, and receiving countries. Receiving countries remain unenthusiastic about immigration because they enjoy, at best, small net gains from international labor flows. Migrants capture much of the gains from international migration. Whatever benefits that remain for receiving countries are partially or fully negated by worsening fiscal distortions. Unless receiving countries perceive greater benefits from immigration, they will not be inclined to allow more labor in.

Multilateral negotiations hold little hope for expanding labor flows. At least as far as migration is concerned, receiving countries have all the bargaining power. Reciprocal market access for migration to poor sending countries is simply not much of an attraction for the United States or Europe. The WTO itself acknowledges that GATS Mode IV has been ineffective at increasing global labor flows (IOM/World Bank/WTO, Mamdouh, 2004). Making Mode IV a meaningful vehicle for migration would appear to require governments to substantially liberalize their commitments on labor movements associated with trade in services. High-income countries do not appear to have made this a priority in their approach to negotiations surrounding the Doha Round (Charlton and Stiglitz, 2005). Conceivably, low-income countries could demand progress on expanding Mode IV as grounds for completing Doha. Given the existing conflicts and controversy surrounding the negotiations, it is difficult to see how such an approach would make completing the round more likely.

Fortunately, there are changes that receiving countries could undertake themselves that would encourage the lowering of immigration barriers. The fiscal costs of immigration could be reduced by subjecting immigrant workers to payroll taxes and by auctioning visas to temporary immigrant workers. With more visas available and in flexible supply, the incentive for illegal migration would fall. Sensible monitoring of employers could further reduce the hiring of illegal labor. Migrants could also gain from such reforms, to the extent they obtained a clearly defined path to citizenship and were able to escape the risk uncertainty of unauthorized migration. New individuals in low income countries could possibly gain access to emigration opportunities. Simply stated, unless they perceive larger benefits to immigration, receiving countries are unlikely to open their borders.

REFERENCES

Acosta, Pablo, Pablo Fajnzylber, and Humberto Lopez. 2007. "How Important are Remittances in America?" In Pablo Fajnzylber and Humberto Lopez, eds., *Close to Home*, Washington, DC: The World Bank, forthcoming.

Antecol, Heather, Deborah A. Cobb-Clark, Stephen J. Trejo. 2003. "Immigration Policy and the Skills of Immigrants to Australia, Canada, and the United States." *Journal of Human Resources*. 38(1): 192-218.

Åslund, Olof, Per-Anders Edin and Peter Fredriksson. 2001. Settlement Policies and the Economic Success of Immigrants. IZA Discussion Paper No. 2730.

Auerbach, Alan J., and Philip Oreopoulos. 1999. "Analyzing the Fiscal Impact of U.S. Immigration." *American Economic Review. Papers and Proceedings*, 89(2), pp. 176-180.

Autor, David. 2008. *Studies in Labor Market Intermediation*. University of Chicago Press, forthcoming.

Benhabib, Jess. 1996. "On the Political Economy of Immigration." *European Economic Review*, 40: 1737-1743.

Bertocchi, Graziella, and Chiara Strozzi. 2006. "The Evolution of Citizenship: Economic and Institutional Determinants." IZA Discussion Paper No. 2510.

Bisin, Alberto, Eleonora Patacchini, Thierry Verdier, and Yves Zenou. 2008. "Are Muslim Immigrants Different in Terms of Cultural Integration?" *Journal of the European Economic Association*, 6(2-3), 445 - 456.

Boeri, Tito, and Herbert Brücker. 2005. "Migration, Co-ordination Failures, and EU Enlargement." *Economic Policy*, 20(44), 629-703.

Boeri, Tito, Barry McCormick, and Gordon H. Hanson. 2002. *Immigration Policy and the Welfare State*. Oxford: Oxford University Press.

Borjas, George J. *Heaven's Door: Immigration Policy and the American Economy*. Princeton, N.J.: Princeton University Press, 1999.

Borjas, George J. "The Labor Demand Curve *Is* Downward Sloping: Reexamining the Impact of Immigration on the Labor Market," *Quarterly Journal of Economics* 118 (November 2003): 1335-1374.

Borjas, George J., and Lynette Hilton. 1996. "Immigration and the Welfare State: Immigrant Participation in Means-Tested Entitlement Programs" *Quarterly Journal of Economics*, 111(2): 575-604.

Briggs, Vernon. 2004. "Guestworker Programs: Lessons from the Past and Warnings for the Future." Center for Immigration Studies.

Butcher, Kristin F. and Anne Morrison Piehl. 1998. "Recent Immigrants: Unexpected Implications for Crime and Incarceration." *Industrial and Labor Relations Review* 51: 654-679.

Butcher, Kristin F. and Anne Morrison Piehl. 2006. "Why are Immigrants' Incarceration Rates so Low? Evidence on Selective Immigration, Deterrence, and Deportation." Mimeo, Wellesley College and Rutgers University.

Calavita, Kitty. *Inside The State: The Bracero Program, Immigration, and The I.N.S.* New York, NY: Routledge, 1992.

Camarota, Steven A. *The High Cost of Cheap Labor: Illegal Immigration and the Federal Budget*. Center for Immigration Studies, 2004.

Camarota, Steven. 2005. *Immigration at Mid Decade: A Snapshot of America's Foreign Born Population in 2005*. Center for Immigration Studies.

Camarota, Steven. 2008. "Homeward Bound: Recent Immigration Enforcement and the Decline in the Illegal Alien Population." Center for Immigration Studies.

Charlton, Andrew, and Joseph Stiglitz. 2005. "A Development-friendly Prioritisation of Doha Round Proposals." *The World Economy*, 28(3): 298-312.

Clemens, Michael, Claudio Montenegro, and Lant Pritchett. 2008. "The Great Discrimination: Borders as a Labor Market Barrier." Mimeo, Center on Global Development.

Collado, M. Dolores, Inigo Iturbe-Ormaetxe, Guadalupe Valera, 2004. "Quantifying the Impact of Spanish Immigration on the Welfare State." *International Tax and Public Finance,* 11: 335-353.

Cortes, Patricia. 2008. "The Effect of Low-Skilled Immigration on U.S. Prices: Evidence from CPI Data." *Journal of Political Economy*.

Cox, Adam B. and Eric A. Posner. 2007. "The Second Order Structure of U.S. Immigration Law." *Stanford Law Review*, 59(4).

Davila, Alberto, Jose A. Pagan, and Montserrat Viladrich Grau. 1999. "Immigration Reform, the INS, and the Distribution of Interior and Border Enforcement Resources." *Public Choice*, 99(3-4): 327-45.

Djajic, Slobodan. 1999. "Dynamics of Immigration Control." *Journal of Population Economics*, February 12(1): 45-61.

De Giorgi, Giacomo, and Michele Pellizzari. 2006. "Welfare Migration in Europe and the Cost of a Harmonised Social Assistance." IZA Discussion Paper No. 2094.

De Melo, Jaime, Jean-Marie Grether and Tobias Müller. 2001. The Political Economy of International Migration in a Ricardo-Viner Model. CEPR Discussion Paper No. 2714.

Docquier, Frederic and Hillel Rapoport. 2008. "Skilled Migration: The Perspective of Developing Countries." In Jagdish Bhagwati and Gordon Hanson, eds., *Skilled Immigration Today: Problems, Prospects, and Policies*. Oxford: Oxford University Press, forthcoming.

Dustmann, Christian, and Ian Preston. 2004. "Racial and Economic Factors in Attitudes to Immigration." Mimeo, University College London.

Epstein, Gil S., Arye L. Hillman, and Avi Weiss. 1999. "Creating Illegal Immigrants." *Journal of Population Economics*, 12: 3-21.

Epstein, Gil S., and Avi Weiss. 2001. "A Theory of Immigration Amnesties." IZA Discussion Paper No. 2830.

Facchini, Giovanni, and Anna Maria Mayda. 2008. "Individual Attitudes towards Immigrants: Welfare-state Determinants across Countries." *Review of Economics and Statistics*.

Facchini, Giovanni, Anna Maria Mayda, Prachi Mishra. 2008. "Do Interest Groups Affect Immigration?" Mimeo, Georgetown University and the IMF.

Facchini, Giovanni, and Gerald Willmann. 2006. "The Political Economy of International Factor Mobility." *Journal of International Economics*, forthcoming.

Fix, Michael, and Jeffrey Passel. 2002. "The Scope and Impact of Welfare Reform's Immigrant Provisions." Washington, DC: The Urban Institute.

Foreman-Peck, J. 1992. "A Political Economy of International Migration." *The Manchester School*, 60: 359-376.

Gathmann, Christina. 2004. "The Effects of Enforcement on Illegal Markets: Evidence from Migrant Smuggling on the Southwestern Border." IZA Discussion Paper No. 1004.

Hainmueller, Jens, and Michael J. Hiscox. 2004. "Educated Preferences: Explaining Attitudes Toward Immigration in Europe." Paper prepared for presentation at the Annual Meeting of the American Political Science Association.

Hanson, Gordon H. 2006. "Illegal Migration from Mexico to the United States." *Journal of Economic Literature*, 44: 869-924.

Hanson, Gordon H. 2008. "The Economic Consequences of the International Migration of Labor." *Annual Review of Economics*, forthcoming.

Hanson, Gordon H., Kenneth Scheve, and Matthew J. Slaughter. 2007. "Local Public Finance and Individual Preferences over Globalization Strategies." *Economics and Politics,* 19(2007): 1-33.

Hanson, Gordon H., Raymond Robertson, and Antonio Spilimbergo. 2001. "Does Border Enforcement Protect U.S. Workers from Illegal Immigration?" *The Review of Economics and Statistics*, 84(2002): 73-92.

Hanson, Gordon H., and Antonio Spilimbergo. 2001 "Political Economy, Sectoral Shocks, and Border Enforcement," *Canadian Journal of Economics*, 34(2001): 612-638.

Hatton, Timothy J., and Jeffrey G. Williamson. 2004. "Refugees, Asylum Seekers and Policy in Europe." NBER Working Paper No. 10680.

Huntington, Samuel. 2004. *Who Are We? The Challenges to America's National Identity*. New York: Simon and Schuster.

International Organization for Migration. 2003. *Labour Migration: Trends, Challenges and Policy Responses in Countries of Origin.*

IOM/World Bank/WTO. 2004. "Trade and Migration Background Paper." IOM, World Bank, and the WTO.

Jandl, Michael. 2003. "Estimates on the Number of Illegal and Smuggled Immigrants in Europe." International Centre for Migration Policy Development.

Jasso, Guillermina and Mark Rosenzweig. 2005. "Selection Criteria and the Skill Composition of Immigrants: A Comparative Analysis of Australian and US Employment Immigration," mimeo NYU and Yale University.

Lowell, Lindsay. 2000. "H1-B Temporary Visas: Estimating the Population." Mimeo, Georgetown University.

Mamdouh, Hamid. 2004. "Movement of Natural Persons under the GATS." WTO.

Martin, Phillip. 2001. "There is Nothing More Permanent than Temporary Foreign Workers." Center for Immigration Studies.

Martin, Phillip, and Mark Miller. 2000. "Smuggling and Trafficking: A Conference Report." *International Migration Review*, 34(3): 969-975.

Massey, Douglas S. 2004. "International Migration at the Dawn of the Twenty-First Century: The Role of the State." *Population and Development Review*, 25(2): 303-322.

Massey, Douglas S., L. Goldring, and Jorge Durand. 1994. "Continuities in Transnational Migration: An Analysis of Nineteen Mexican Communities." *American Journal of Sociology* 99(6): 1492-1533.

Mayda, Anna Maria. 2006. "Who is Against Immigration? A Cross Country Investigation of Individual Attitudes towards Immigrants." *Review of Economics and Statistics*, 88(3): 510-530.

Mazzolari, Francesca. 2006. "Determinants and Effects of Naturalization: Effects of Dual Citizenship Laws." Mimeo, UC Irvine.

McKenzie, David, John Gibson, and Steven Stillman. 2006. "How Important is Selection? Experimental versus Non-experimental Measures of the Income Gains from Migration." Mimeo, The World Bank.

Mishra, Prachi. 2007. "Emigration and Wages in Source Countries: Evidence from Mexico." *Journal of Development Economics*, 82(1): 180-199.

OECD. 2004. *Migration for Employment - Bilateral Agreements at a Crossroads*. OECD: Paris.

OECD. 2008. *International Migration Outlook*. OECD: Paris.

Orrenius, Pia M. and Madeline Zavodny. 2005. "Self-Selection among Undocumented Immigrants from Mexico." *Journal of Development Economics*, October 78(1): 215-240.

Ortega, Francesc. 2004. "Immigration Policy and the Welfare State." Mimeo, New York University.

Parsons, Christopher, Ronald Skeldon, Terrie Walmsley, and L. Alan Winters. 2007. "Quantifying International Migration: A Database of Bilateral Migration Stocks." World Bank Policy Research Working Paper 4165.

Passel, Jeffrey S. 2006. "Size and Characteristics of the Unauthorized Population in the US: Estimates from the March 2005 Current Population Survey." Pew Hispanic Center.

Poutvaara, Panu. 2005. "Social Security Incentives, Human Capital Investment and Mobility of Labor." IZA Discussion Paper No. 1729.

Ratha, Dilip, and William Shaw. 2007. "South-South Migration and Remittances." Mimeo, The World Bank.

Razin, Asaf, and Efraim Sadka. 1999. "Migration and Pensions with International Capital Mobility." *Journal of Public Economics*, 74: 141-150.

Razin, Asaf, Efraim Sadka, and Phillip Swagel. 2002. "Tax Burden and Migration: Political Economy Theory and Evidence." *Journal of Public Economics* 85: 167-190.

Rosenzweig, Mark. 2007. "Education and Migration: A Global Perspective." Mimeo, Yale.

Rupert, Elizabeth. 1999. "Managing Foreign Labor in Singapore and Malaysia: Are There Lessons for GCC Countries?" The World Bank, Policy Research Working Paper Series: 2053.

Saiz, Albert. 2007. "Immigration and Housing Rents in American Cities." *Journal of Urban Economics*. 61: 345-371.

Scheve, Kenneth F., and Matthew J. Slaughter. 2001. "Labor-Market Competition and Individual Preferences Over Immigration Policy." *Review of Economics and Statistics*, 83(1): 133-145.

Schiff, Maurice. 2007. "Optimal Immigration Policy: Permanent, Guest-worker, or Mode IV?" Mimeo, World Bank.

Scholten, Ulrich, and Marcel Thum. 1996. "Public Pensions and Immigration Policy in a Democracy." *Public Choice*, 66: 347-361.

Shah, Nasra. 2006. "Restrictive Labour Immigration Policies in the Oil Rich Gulf." UN Population Division.

Smith, James P. and Barry Edmonston, eds. *The New Americans: Economic, Demographic, and Fiscal Effects of Immigration*. Washington, DC: National Academy Pres, 1997.

Storesletten, Kjetil. 2000. "Sustaining Fiscal Policy Through Immigration." *Journal of Political Economy*, 108(2): 300-323.

Storesletten, Kjetil. 2003. "Fiscal Implications of Immigration: A Net Present Value Calculation." Mimeo, Stockholm University.

Walmsley, Terrie L. and L. Alan Winters. 2005. "Relaxing the Restrictions on the Temporary Movement of Natural Persons: A Simulation Analysis." *Journal of Economic Integration*, 20(4): 688-726.

Wellisch, Dietmar, and Uwe Walz. 1998. "Why Do Rich Countries Prefer Free Trade over Free Immigration? The Role of the Modern Welfare States." *European Economic Review*, 42: 1595-1612.

Winckler, Onn. 1999. "The Immigration Policy of the Gulf Cooperation Council (GCC) States." In Tim Niblock and Rodney Wilson, eds. *The political economy of the Middle East*. Northampton, MA: Elgar Reference Collection.

Yang, Dean. 2007. "International Migration, Remittances, and Household Investment: Evidence from Philippine Migrants' Exchange Rate Shocks." *Economic Journal*, forthcoming.

Table 1

Stocks of International Migrants by Origin and Destination Region, 2000

Destination Region Origin Region	High Income	Other Asia	Latin Am. & Car.	Eastern Europe	Former Soviet Union	Middle East & N. Africa	Sub Saharan Africa	Total
High Income	21,155,815	1,149,869	2,036,010	553,633	478,763	1,246,442	772,836	27,393,368
Other Asia	15,266,768	18,104,219	174,503	126,806	368,003	9,397,668	411,041	43,849,008
Latin America & Car.	21,453,599	622,774	3,575,082	60,829	249,683	452,855	237,676	26,652,498
Eastern Europe	6,913,603	198,836	79,468	1,689,382	832,362	1,269,960	162,681	11,146,292
Former Soviet Union	2,252,041	674,546	69,594	1,650,766	24,553,428	1,612,173	411,628	31,224,176
Mid. East & N. Africa	9,161,003	461,413	93,889	276,559	247,622	7,118,225	531,322	17,890,033
Sub Saharan Africa	3,901,407	302,209	41,135	63,436	138,666	798,755	12,307,038	17,552,646
Total	80,104,236	21,513,866	6,069,681	4,421,411	26,868,527	21,896,078	14,834,222	175,708,021

International Migrants by Origin and Destination Region as Share of World Total, 2000

Destination Region Origin Region	High Income	Other Asia	Latin Am. & Car.	Eastern Europe	Former Soviet Union	Middle East & N. Africa	Sub Saharan Africa	Total
High Income	0.120	0.007	0.012	0.003	0.003	0.007	0.004	0.156
Other Asia	0.087	0.103	0.001	0.001	0.002	0.053	0.002	0.250
Latin America & Car.	0.122	0.004	0.020	0.000	0.001	0.003	0.001	0.152
Eastern Europe	0.039	0.001	0.000	0.010	0.005	0.007	0.001	0.063
Former Soviet Union	0.013	0.004	0.000	0.009	0.140	0.009	0.002	0.178

Mid. East & N. Africa	0.052	0.003	0.001	0.002	0.001	0.041	0.003	0.102
Sub Saharan Africa	0.022	0.002	0.000	0.000	0.001	0.005	0.070	0.100
	0.456	0.122	0.035	0.025	0.153	0.125	0.084	1.000

High income includes Australia, Japan, New Zealand; Canada, the United States; Andorra, Austria, Belgium, Denmark, Finland, France, Germany, Greece, Ireland, Italy, Liechtenstein, Luxembourg, the Netherlands, Norway, Portugal, Spain, Sweden, and the United Kingdom. Data are from Parsons et al. (2007).

Table 2: International Migration to Arab Gulf States, 2000

Origin Countries	Bahrain	Jordan	Kuwait	Oman	Qatar	Saudi Arabia	United Arab Emirates	Total
Other Asia	191,059	848,149	395,614	580,034	409,388	2,929,055	1,485,422	6,838,721
Indonesia						296,778	13,098	355,955
Philippines						383,031	18,551	486,521
Bangladesh				111,968		379,207	24,041	614,611
India	146,512	362,591	219,184	341,342	409,388	1,045,985	1,299,439	3,824,441
Pakistan						661,383		881,854
Middle East, N. Africa	30,797	516,591	87,011	72,538	0	1,967,811	214,235	2,888,983
Yemen						360,438		424,900
Egypt		127,018				1,015,124		1,248,258

High Income	4,469	134,300	147,698	12,308	0	53,643	51,441	403,859
Eastern Europe	1,424	120,194	58,854	756	0	1,266	46,039	228,533
Former Soviet Union	18,393	177,372	179,148	2,329	0	1,865	67,941	447,048
Latin America, Caribbean	2,884	74,713	152,289	182	0	785	28,619	259,472
Sub Saharan Africa	5,281	73,897	87,060	13,574	0	300,387	28,304	508,503
Total	254,307	1,945,216	1,107,674	681,721	409,388	5,254,812	1,922,001	11,575,119

This table shows the stock of immigrants in Gulf States by sending region and for the largest sending countries. Data are from Parsons et al. (2007).