

# Occasional paper

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Immigration

Jonathan Wadsworth

November 2019

## **Abstract**

Immigration remains a highly contentious issue and its purported effects on the labour market and the wider economy are still highly contested. The discussion below is intended as an overview of what we know and what we do not know about immigration to the UK and its economic effects, and the possible direction of future migration policy.

Economists have long understood that immigration is influenced by individual assessments of the costs and benefits of a move to another country. Individuals can decide to move and indeed leave or migrate elsewhere if economic and/or political conditions shift in favour of migration to other countries. The number of immigrants in the UK is a reflection of a series of economic and political events that have made the UK relatively more or less attractive to migrants over time. Equally, the attractiveness of the UK to migrants from outside the UK is influenced by relative economic circumstances but also by the relative costs of entry embodied in the visa and entry system.

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# **Immigration**

Jonathan Wadsworth

November 2019

## **Summary**

- Unlike the UK-born population, a majority of immigrants are in employment.
- Immigration's effects on most areas of the economy appear to be small: no large negative effects and no large positive effects.
- While immigrants are over-represented among the unemployed and economically inactive they are under-represented in the child and pensioner populations.
- These observations all help to explain why, on average, immigrants pay more in taxes than they receive in state benefits relative to others.
- Future immigration policy has to determine who is allowed into the UK, into which sectors of the economy, for how long and at what cost. This is not, and has never been, a straightforward task.
- Immigration policy and informed debate are compromised by the current ambiguity over measuring the number of immigrants in the UK.

## **Immigration and the UK Economy**

Immigration remains a highly contentious issue and its purported effects on the labour market and the wider economy are still highly contested.<sup>1</sup> The discussion below is intended as an overview of what we know and what we don't know about immigration to the UK and its economic effects, and the possible direction of future migration policy.

Economists have long understood that immigration is influenced by individual assessments of the costs and benefits of a move to another country. Individuals can decide to move and indeed leave or migrate elsewhere if economic and/or political conditions shift in favour of migration to other countries. The number of immigrants in the UK is a reflection of a series of economic and political events that have made the UK relatively more or less attractive to migrants over time. Equally, the attractiveness of the UK to migrants from outside the UK is influenced by relative economic circumstances but also by the relative costs of entry embodied in the visa and entry system.

### **How many immigrants are there in the UK?**

As Table 1 and Figure 1 show, immigration, as measured in the Labour Force Survey (LFS) by the number of UK residents who were born outside the UK, had been growing from around 1995, primarily from outside the EU, until the admission of the A10 accession countries in 2004. After the UK, Ireland and Sweden opened up their labour markets to migrants from central and eastern Europe along with Cyprus and Malta, immigration from the EU rose in tandem with continued rises in non-EU immigration, reaching a peak of 14.6% of the UK population in 2017. Thereafter, according to the LFS, immigration seems to have been static. The 2019 level of immigration is no higher than in 2017 (and may even be below that).

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<sup>1</sup> Immigration is no longer the most pressing concern among the electorate that it was prior to the Brexit referendum. More than three years on, concerns about Europe have eclipsed anything else, including the NHS, defence, the environment and unemployment as well as immigration. See the regular series of issues of concern documented in Mori (2019) summarised in Figure A0 in the appendix for example.

**Table 1: Immigrants and the UK population**

	Total (millions)	UK-born (millions)	Immigrant (millions)	EU (millions)	Non-EU (millions)	Immigrant share (%)	EU share
<b>Total</b>							
1975	55.3	52.1	3.2	0.9	2.3	5.8%	1.6%
1995	57.2	53.3	3.8	1.1	2.7	6.7%	1.9%
2003	58.7	53.6	5.1	1.3	3.8	8.7%	2.1%
2016	64.7	55.6	9.1	3.6	5.5	14.0%	5.6%
2017	65.0	55.5	9.5	3.7	5.8	14.6%	5.6%
2019	65.9	56.5	9.4	3.6	5.8	14.3%	5.5%
<b>Working age</b>							
1975	33.6	31.2	2.5	0.7	1.8	7.3%	2.2%
1995	36.4	33.4	3.0	0.8	2.2	8.2%	2.0%
2003	38.0	34.0	4.0	0.9	3.1	10.5%	2.3%
2016	41.0	33.6	7.4	2.9	4.5	18.0%	7.1%
2017	41.1	33.4	7.7	3.0	4.8	18.5%	7.2%
2019	41.3	33.7	7.6	2.9	4.7	18.4%	7.0%

**Source:** Author analysis of the Labour Force Survey (LFS); working age population is 16-64.

### Measuring immigration

Knowing the number of immigrants living in the UK is something of an inexact science. There is no official count of the number of resident immigrants, nor of inflows and outflows, despite, until recently, net inflows being a longstanding government target. Instead, there are different household surveys that are used to estimate these various stocks and flows.

The Office for National Statistics (ONS) has a preferred measure of counting immigration *flows* (the numbers arriving and the numbers leaving), based on analysis of the International Passenger Survey (IPS). The IPS has recently been downgraded to ‘experimental’ status because of concerns with its coverage and weighting (see ONS, 2019, for a detailed discussion).

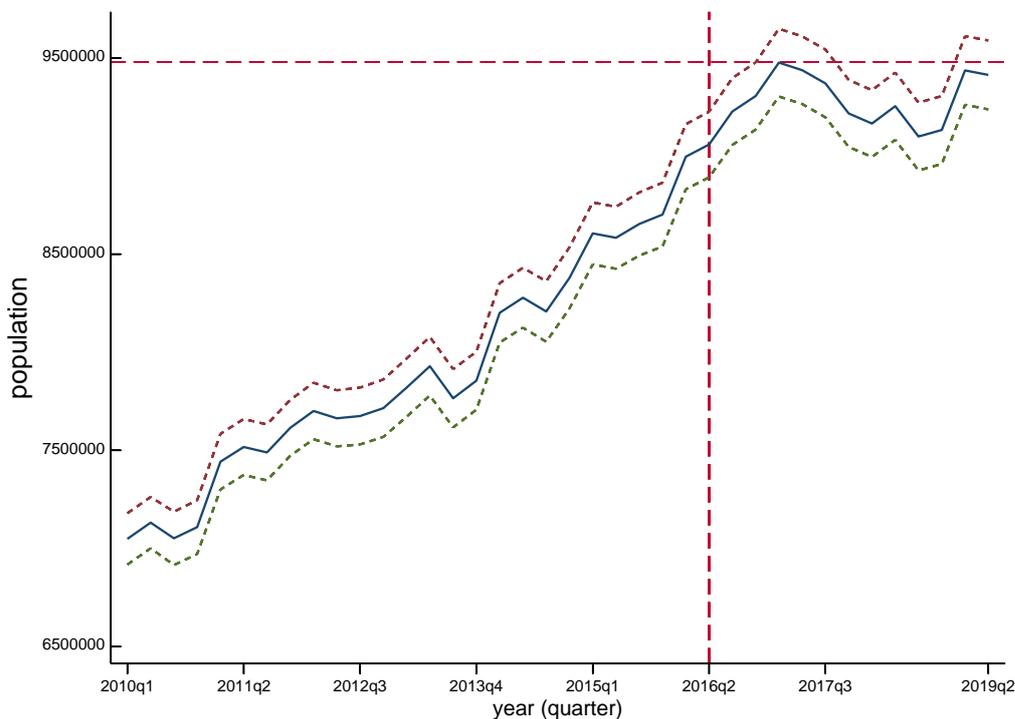
But the only official data set that can provide a regular, timely estimate of the *total number* of immigrants living in the UK (not just the yearly flows in and out) is the Labour Force Survey/Annual Population Survey (LFS). This is the same survey that is used to measure the unemployment rate in the UK. The LFS also has detailed information on the characteristics of immigrants and those born in the UK. So if we want to compare, say, the educational attainment of immigrants and the UK-born, or where immigrants live, or whether immigrants are more or less likely to be unemployed, or the effect of immigration on the wages of the UK-born, the LFS is practically the only UK data set that can be used to investigate these and other related issues.

Currently, the various survey sources are sending conflicting signals. The LFS-based count (Figure 1) says that the immigrant population has been static, and may have even fallen a little since 2017. In contrast, the IPS says that net inflows (inflows minus outflows) to the UK by immigrants have been resiliently positive, in the order of 250,000 a year (see Figure 2), even using the intermediate revisions made by the ONS to the IPS data. If more immigrants are coming to the UK than leaving, immigration must be rising. The two surveys are saying different things.

Admittedly both data sources use different definitions of immigrants. The LFS defines immigrants based on country of birth and usual residence.<sup>2</sup> The IPS uses nationality, as shown on respondents' passports, to define immigrant status with an additional qualification that the survey respondent intends to stay for 12 months or more. So part of the difference is likely to be due to this. So both may be right. Equally, both may be wrong for different reasons.

But the central point is that policy formulation and informed debate about immigration are currently compromised by the ambiguity in the data.

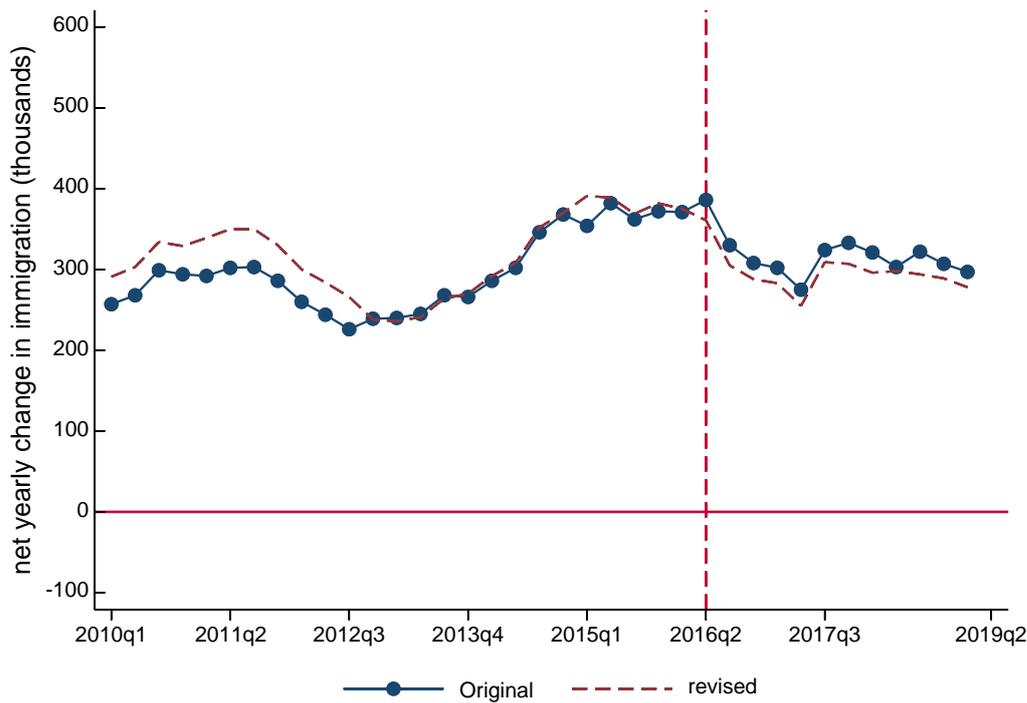
**Figure 1: LFS estimates of immigrant population**



Source: LFS; author calculations. Note: Dotted lines are 95% confidence intervals to account for sampling uncertainty; central estimate given by solid line.

<sup>2</sup> It is also possible to use nationality as the basis for immigration status, but nationality, unlike country of birth, is somewhat determined by government policy and individual choices.

**Figure 2: IPS estimates of changes in the immigrant population**



Source: LTIM (2019); author calculations

So – measurement issues notwithstanding – what do we know about immigration to the UK and its effects on the economy?

**What do immigrants do?**

Table 2 shows the distribution of immigrants and UK-born by population type in 2019. Unlike the UK-born population, a majority of immigrants are in employment and so are over-represented among the total number in work. Immigrants are also over-represented in the unemployed and economically inactive populations, and under-represented among the children and pensionable age populations.

This is partly, because of the age distribution – most immigrants arrive as young adults and not all immigrants stay in the UK until retirement age (Figure 3). EU migrants are typically younger than non-EU migrants, having been in the UK, on average, for less time. So immigrants are younger and therefore more likely to be healthier. They are also more highly qualified, on average,<sup>3</sup> than the UK population and therefore more likely to be in (higher paid) work than the average UK-born individual. They are also, as a group, less likely to use child or pension services.

<sup>3</sup> In 2019, the average immigrant had two more years of education than the average UK-born individual. 26% of UK-born individuals left education at the age of 21 or above, 45% of EU-born residents and 48% of non-EU born residents (source: APS).

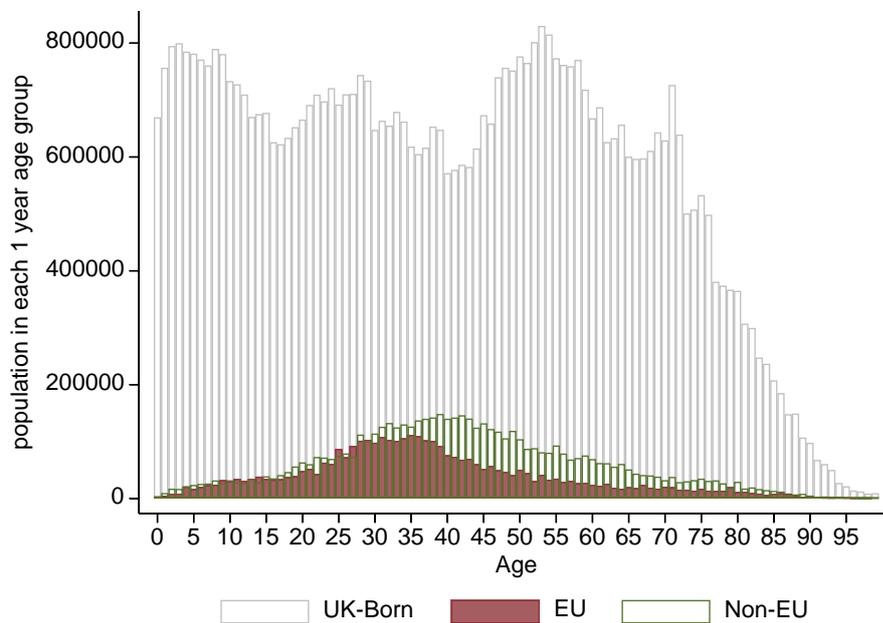
Of the 3.6 million EU migrants resident in the UK, most (65%), around 2.3 million, are employed. They are less likely to be economically inactive compared with the UK-born, and make up less than 3% of all individuals above state pensionable age,

**Table 2: Immigrants by activity status, 2019**

	All	Employed	Unemployed	Inactive	Student	Child <16	Pension Age
<b>Total (millions)</b>							
UK-born	56.5	24.9	0.9	5.3	2.6	11.9	10.9
Immigrant	9.4	5.5	0.3	1.2	0.6	0.8	1.0
<i>of which</i>							
EU	3.6	2.3	0.1	0.3	0.2	0.4	0.3
Non-EU	5.8	3.2	0.2	0.9	0.4	0.4	0.7
<b>As percentage of total</b>							
UK-born	100%	43.8%	1.7%	9.6%	4.6%	21.1%	19.2%
Immigrant	100%	58.9%	2.7%	13.2%	6.1%	8.0%	11.0%
<i>of which</i>							
EU	100%	65.2%	2.0%	8.0%	5.2%	9.9%	9.7%
Non-EU	100%	55.0%	3.2%	16.6%	6.7%	6.8%	11.8%

**Source:** author analysis of LFS; working age population is 16-64.

**Figure 3: The age distribution of the population by migrant status, 2019**



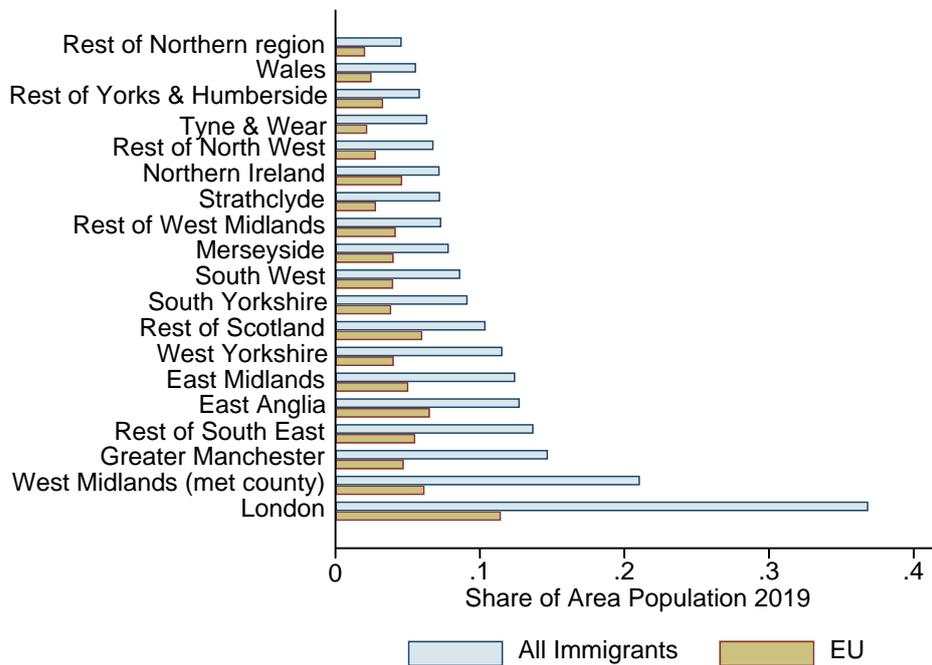
**Source:** Author analysis of Annual Population Survey.

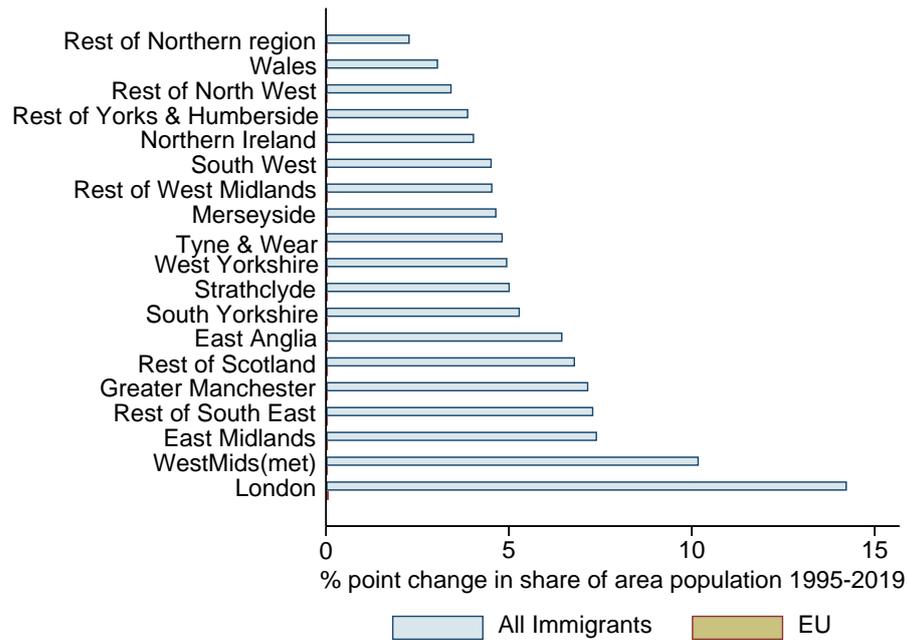
### Immigration and the regions

The regional distribution of immigrants is far from even. One third of all immigrants live in London (and just 10% of all UK-born individuals). Of London’s population, 36% were born abroad but just 5% of the population of the North-East of England are immigrants. The EU migrant share of the population of London is also much higher than elsewhere in the UK (at around 12% compared with the UK average elsewhere of 4.5%).

The regions with most immigrants in 2019 were also the regions with the most immigrants in 1995. High immigrant regions in 1995 have experienced the largest increases in immigration since 1995.

**Figure 4: The regional distribution of immigration, 1995-2019**



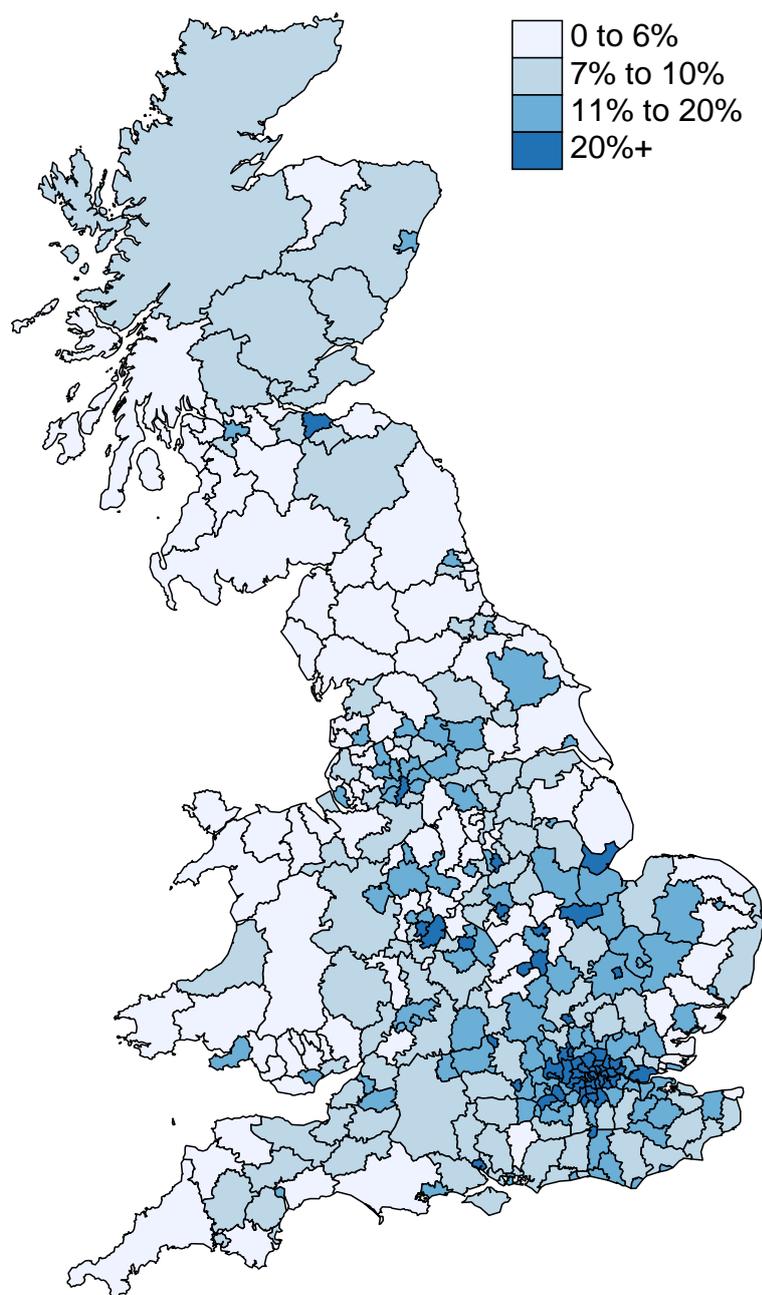


**Source:** author analysis of LFS.

There is also substantial variation in the distribution of the immigrant population within regions. Most immigrants tend to live in cities, rather than rural areas where there are likely to be a concentration of more opportunities to work or study. According to the APS, 57% of immigrants live in cities, compared to 29% of Uk-born individuals.<sup>4</sup> Although there are some exceptions to this, notably in agricultural areas of eastern England, (Figure 5).

<sup>4</sup> The definition of a city used here is London, Birmingham, Coventry, Manchester, Leeds, Bradford, Sheffield, Hull, York, Newcastle, Sunderland, Swansea, Cardiff, Bristol, Bath, Exeter, Plymouth, Southampton, Portsmouth, Norwich, Oxford, Cambridge, Derby, Leicester, Nottingham, Edinburgh, Glasgow, Aberdeen, Dundee

**Figure 5: The area population share of immigrants by unitary authority, 2019**



Source. Author analysis of ONS (2019a).

A simple correlation indicates that there are fewer (EU) immigrants in Brexit-voting areas (correlation coefficient = -0.30). It is true, however, that the rate of change in immigration has been greater in Brexit-voting areas, although this association is still rather weak (correlation coefficient = .09).<sup>5</sup> Should the EU population continue to decline, then it is perhaps in London and the South East that we might expect

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<sup>5</sup> See, among others Becker et al (2017) or Langella and Manning (2016) for a more detailed analysis of the determinants of the Brexit vote. The consensus of these papers is that, while the local area rate of change in immigration is a positive and statistically significant determinant of the Leave share of the vote, relative economic deprivation explains more of the variation in the Leave vote than immigration.

to see more noticeable effects. But this assumes that any Brexit shock is spread evenly across the population and there are reasons to suspect (see below) that this may not be the case.

### **Where do immigrants work?**

Immigrants are concentrated in certain sectors and occupations of the economy. Table 3 shows the industrial sectors that employ the most and least numbers of immigrants among their workforces. Since immigrants are 18% of the workforce, if immigrants were spread evenly across sectors, immigrants would comprise 18% of each sector's workforce. But some sectors, notably food manufacture and domestic service (cleaners) employ twice that proportion (column 3, Table 3). In contrast, immigrants working in the fishing and water supply industries comprise less than 5% of the workforce.

EU migrants while, on average, rather more evenly spread across the UK workforce, do feature prominently in a few sectors. The sectors that employ the highest proportion of EU migrants are typically low wage, high labour turnover sectors (such as hotels, domestic help and food manufacturing). Again, there are exceptions to this. In the air transport and scientific research sectors, typically skilled sectors, around 12-13% of the workforce are from the EU.

After Brexit, most of the *existing* EU workforce would still be eligible for UK citizenship or leave to remain (having the requisite years of residence in the UK). So the workforce is unlikely to disappear overnight. It is at *the hiring* margin that employers in the high EU share industries, particularly the high turnover sectors, may face difficulties after Brexit without some sort of sectoral quotas, seasonal schemes or adjustment period.

The annual hiring rate in the UK is typically between 12% and 17% of the total workforce, depending on the state of the economic cycle. But low wage sectors such as those in the Table tend to have higher turnover. The annual hiring rate in the food manufacture sector (SIC 10) is around one quarter of the total workforce and EU workers comprise more than one quarter of all new hires.

**Table 3: The sectoral distribution of immigrants, 2019**

	Total employment	Percentage of sector who are immigrants	Percentage of sector who are EU immigrants	Average hourly Wages	Hiring rate <sup>1</sup>	Percentage of hires from EU
<i><b>Largest immigrant sectors</b></i>						
Food manufacture (SIC10)	310,000	36%	23%	£9.80	15%	26%
Domestic service (SIC97)	40,000	36%	15%	£10.50	13%	24%
Warehousing (SIC52)	390,000	32%	20%	£10.70	20%	23%
Clothing (SIC14)	50,000	31%	20%	£10.00	16%	12%
Hotels (SIC55)	350,000	29%	17%	£8.40	24%	15%
Security (SIC80)	190,000	28%	6%	£10.10	19%	8%
Scientific (SIC72)	150,000	28%	17%	£18.70	17%	17%
Computing (SIC62)	710,000	27%	8%	£22.00	17%	12%
Transport (SIC49)	760,000	27%	7%	£12.00	11%	12%
Furniture (SIC31)	70,000	27%	19%	£10.30	17%	9%
<i><b>Smallest immigrant sectors</b></i>						
Metal manufacture (SIC24)	80,000	7%	3%	£13.20	13%	6%
Drinks manufacture (SIC11)	60,000	7%	4%	£14.50	15%	10%
Fishing (SIC 3)	20,000	5%	4%	£11.50	4%	0%
Water supply (SIC36)	80,000	2%	1%	£15.20	11%	3%
<b>UK</b>	32,600,000	18%	7%	£12.30	15%	9%

*Source:* LFS four-quarter average ending 2019q2. Note 1. Hiring rate is approximated by the percentage of the workforce in employment for less than 1 year. Average wage is median hourly wage.

Table 4 looks at the occupations with the largest and smallest workforce shares of immigrants. Many of the occupations that employ a large fraction of immigrants are less skilled manual occupations, consistent with the industrial distribution of migrants shown in Table 3. Again, there are exceptions. There are many immigrants working as scientific and health professionals (EU migrants are over-represented among scientists but less so among health professionals). In contrast, government administration makes little use of immigrant labour.<sup>6</sup>

Another feature of EU migration apparent from Table 4 is that in many of the less skilled occupations highlighted, there are many more EU graduates than might be expected from the UK graduate share in the same occupations. This ‘occupational downgrading’ may reflect job shopping among migrants not subject to work permit restrictions. Some migrants may be in what they regard as temporary jobs, while learning the language and assimilating with UK institutions or while engaging in more extensive job matching.<sup>7</sup>

Dustmann et al (2013) suggest that this may help to explain why they find evidence of more downward pressure on wages toward the bottom of the pay distribution. Certainly, a greater relative supply of workers in low wage work and a willingness to accept lower wages among EU graduates is consistent with this observation.<sup>8</sup> Conversely, productivity growth in the low wage sectors that employ more graduates could be improved, leading to more employment opportunities and less downward wage pressure in these sectors. As ever, more empirical evidence on this issue is needed.

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<sup>6</sup> The Table also suggest farming is under-represented, but this may be because migrant farm workers are often hired on a seasonal basis and housed in on-farm accommodation not likely to be sampled in the LFS.

<sup>7</sup> To what extent this may be a constrained choice is hard to establish.

<sup>8</sup> Again it should be emphasised that any estimated downward effect on wages is rather small.

**Table 4: The occupational distribution of EU immigrants, 2019**

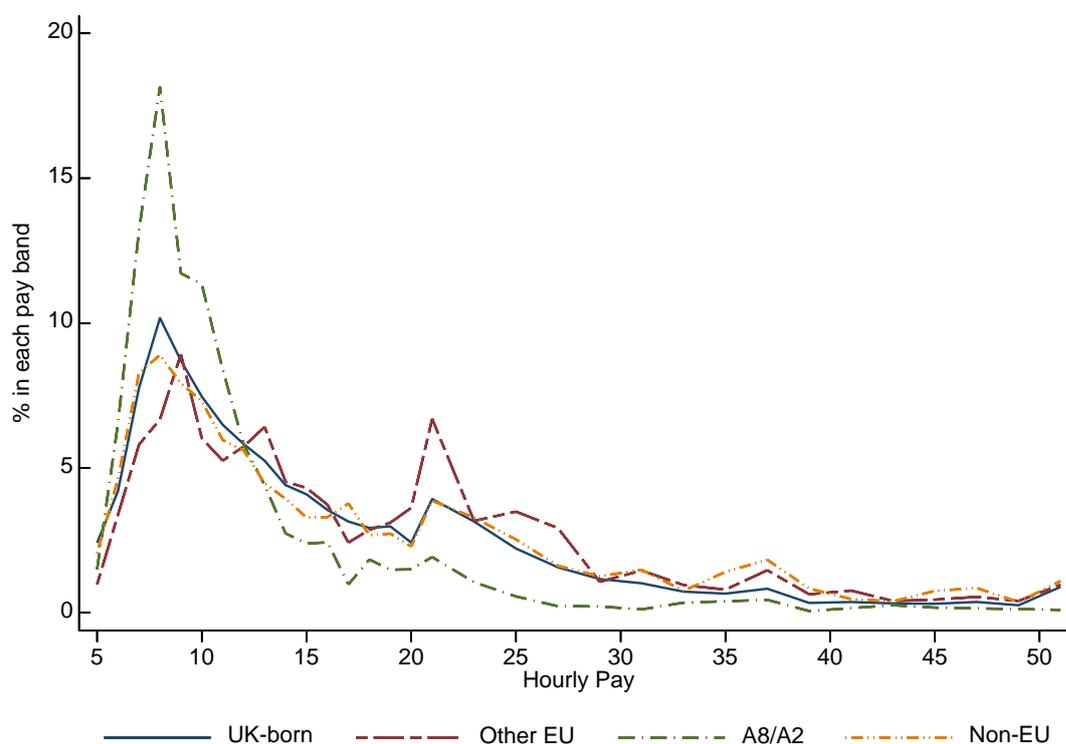
	Total	Percentage of sector who are immigrants	Percentage of sector who are EU immigrants	Percentage of UK-born in sector who are graduates	Percentage of EU in sector who are graduates	Percentage of new hires
<b><i>Largest immigrant workforce share</i></b>						
Packers (SOC 913)	260,000	43%	28%	4%	20%	22%
Cleaner managers (SOC 624)	80,000	39%	30%	3%	35%	12%
Food processing (SOC 811)	230,000	36%	25%	6%	27%	17%
Chefs and cooks (SOC 543)	460,000	33%	13%	7%	22%	18%
Textiles (SOC 541)	50,000	33%	16%	11%	23%	12%
Cleaners (SOC 923)	740,000	31%	17%	2%	20%	20%
Scientists (SOC 211)	220,000	29%	16%	74%	91%	15%
Storage (SOC 926)	460,000	28%	19%	4%	33%	22%
Health professionals (SOC 221)	560,000	28%	9%	82%	82%	14%
Drivers (SOC 821)	980,000	27%	10%	5%	25%	16%
<b><i>Smallest immigrant workforce</i></b>						
Government administration (SOC 411)	340,000	7%	2%	24%	33%	10%
Farm managers (SOC 121)	40,000	6%	1%	25%	1%	4%
Senior protective (SOC 117)	60,000	6%	2%	25%	38%	3%
Agriculture (SOC 511)	390,000	4%	2%	12%	22%	9%

*Source:* LFS, four quarter pooled 2018q2-2019q2. Classifications based on SOC 2000 codes averaged over four quarters. Note a graduate is defined here as having left full-time education aged 21 and over.

## The pay of immigrants

This sectoral distribution of work is reflected in the patterns of pay received by immigrants relative to the UK-born. EU immigrants in work are spread across the pay distribution and with a clear difference in pay patterns between A8/A2 and other EU workers. A8/A2 workers tend to be in low paid work, much more so than others, while EU14 workers tend to be in higher paid jobs, more so even than UK-born workers. Non-EU workers also appear to be paid much the same as UK-born workers. This again is partly reflective of changes in the entry regulations over time regarding who can work and where for these different migrant groups.

**Figure 6: Pay by migrant status, 2019**



Source: LFS author calculations.

## Different sector needs

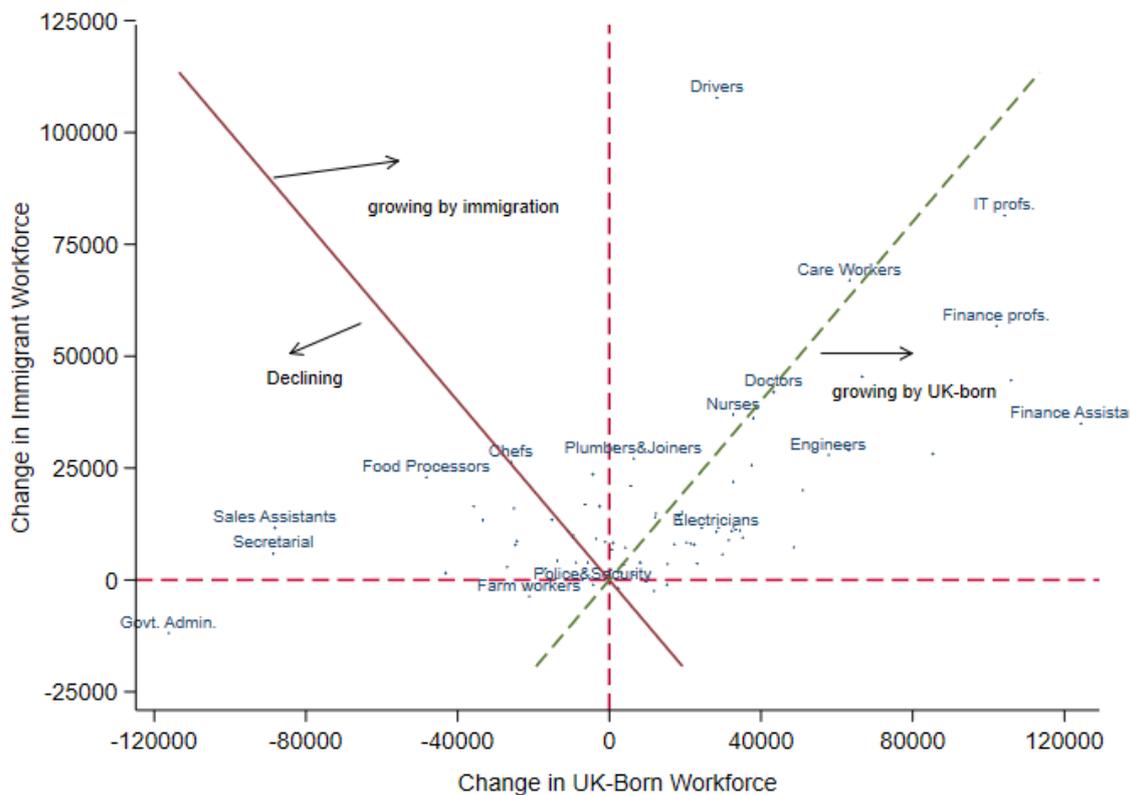
The results above suggest that different employers have different demands for migrant labour. Figure 7 shows just how diverse has been the experience of occupations since the recovery and, as a consequence, how diverse are each sector's needs and the resulting complexity of policy needed to address these needs.

The graph plots the change in employment of the UK-born and of immigrants in each (three-digit) occupation since the end of the last recession. Each dot gives the change in the number of immigrants and the change in the number of the UK-born employed in each occupation. Along the green line in the

figure, there is equal growth in the numbers of immigrants and natives (nursing, for example, is growing in this way). The backward sloping red line shows equal and opposite growth – so that chefs are a stable occupation only because a rise in the number of immigrant chefs is just offsetting the fall in the number of UK-born chefs.<sup>9</sup>

For observations to the right of the green line, the number of UK-born workers in the occupation has grown faster than the number of immigrants (for example, IT has hired more UK-born workers than immigrants). For occupations between the red and green lines (for example, plumbing), immigrant numbers have been growing faster than the number of UK-born employees. Observations to the left of the red line (for example, sales assistants) are declining – some (like sales) with growing immigrant numbers more than offset by falling UK-born. Others (like government administration) are in decline with falling numbers of both immigrants and UK-born workers.<sup>10</sup>

**Figure 7: Changes in immigrant and UK-born employment by occupation, 2011-2019**



Source APS; author calculations. The figure shows change in workforce size of immigrants and UK-born workers in each three-digit occupation.

<sup>9</sup> The government recently announced that chefs were to be placed on the shortage list of occupations, allowing more immigrants from outside the EU into this profession.

<sup>10</sup> The full list of occupations and their changing employment patterns is available on request.

We could think of occupations close to the green line (such as nurses or doctors) as jobs in which immigrants and UK-born workers are close substitutes. Immigrant employment is growing as much as UK-born employment. We could also see this as evidence of complementarities between labour types (for example, nurses training nurses or nurses filling in for lack of trained domestic supply). For some occupations (for example, plumbers), the immigrant population is rising with little change in UK-born employment. Other occupations (such as chefs) are only growing because increased employment of migrant workers is more than offsetting a fall in employment of UK-born workers. We could think of these occupations as supply constrained by a lack of UK-born workers in these professions.

For others (such as retail), the immigrant population is rising but not as fast as UK-born employment is falling. Perhaps the going wage in these sectors is only attractive to some immigrants not natives. As a result – in the absence of moves to raise wages – it may be that the capital mix changes to suit available supply or the occupation continues to decline. For occupations to the right of the green line, UK-born employment is growing faster than immigrant employment and there may be fewer labour shortages in these sectors (so there is available domestic labour supply). In short, the needs and operating methods of each sector are many and varied and immigration policy has somehow to reflect this.

### **Immigration's labour market effects**

Much academic work on immigration's effects was undertaken at the beginning of the decade. Much less work has been done since these initial studies. But the essential point about immigration's effects on the labour market prospects of UK-born workers can be summarised by the following two graphs, which are intended to summarise (rather than substitute for) the findings of the detailed academic studies that have preceded them.

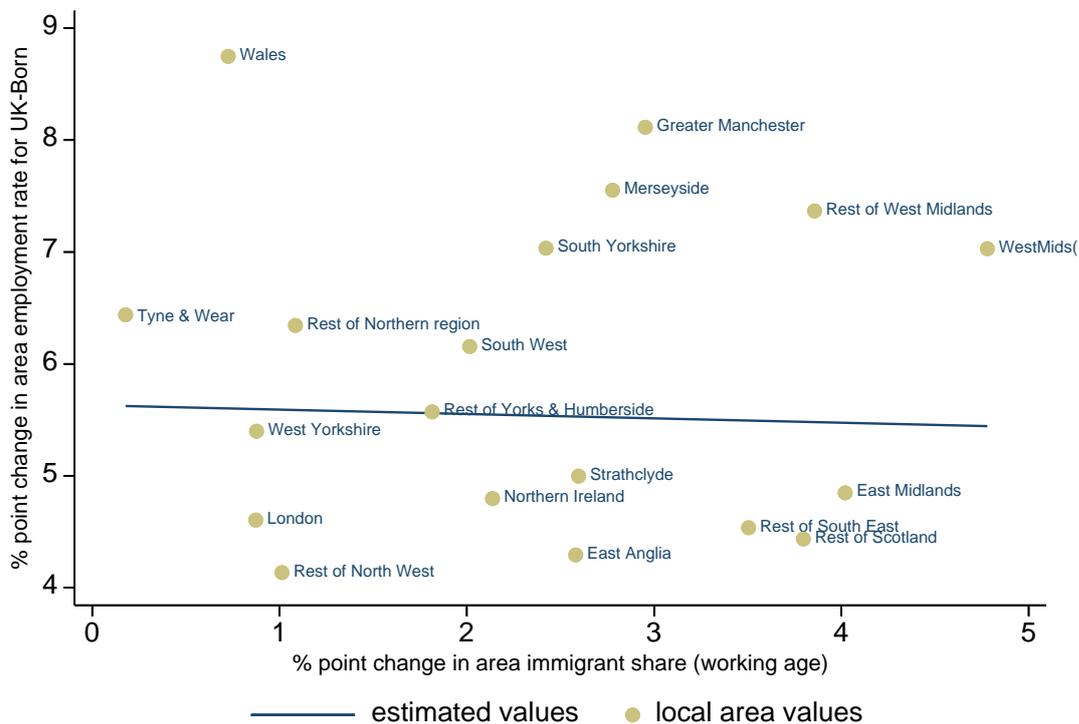
The graphs plot changes in the wages or employment of natives against changes in immigration across regions since the end of the last recession. This shows whether areas of the UK that had larger influxes of immigrants also had worse job and wage outcomes for the UK-born relative to other areas. Looking at changes over time also nets out other features of the local labour market that could also explain changes in unemployment and wages in those areas.

In the graphs, each dot represents an area. The areas correspond, broadly, to broad regional/country administrative areas. The solid line summarises the relationship between changes in immigration to the area and changes in the employment and wage rates of UK-born individuals in that area over the period

from 2011 to 2019.<sup>11</sup> If immigration reduced employment or wage prospects, we would expect a strong *downward* sloping line: more immigrants would mean fewer jobs and/or lower wages for local workers.

It is clear from the graphs that there is little relationship between immigration and the employment or wage rates of those born in the UK. Immigration is not associated with *either* deteriorating *or* improving job prospects for UK-born workers, on average.<sup>12</sup> Nor does this conclusion change much if groups thought to be closer substitutes for immigration, the less skilled UK-born, are used instead of all UK-born workers. See Figures A3 to A6 in the appendix.

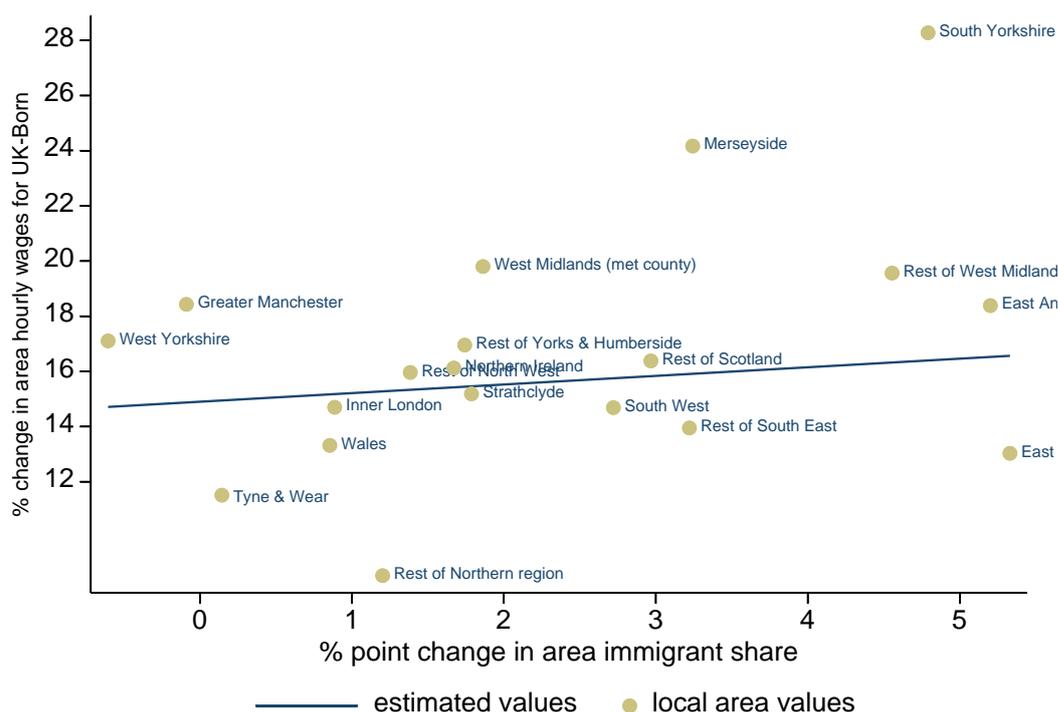
**Figure 8: Changes in immigration and the employment of UK-born residents, 2011-2019**



Source LFS (four quarters of each year); author calculations.

<sup>11</sup> The overall pattern does not change much if different start and end points are used or whether disaggregated by skill (see the graphs in the appendix) or whether EU immigration is used instead of all immigration. The estimated lines in the Figures in the main text and in the appendix are all statistically insignificantly different from zero – results available on request. Future work should examine labour market effects in periods if/when immigration is falling.

**Figure 9: Changes in immigration and wages of UK-born residents, 2011-2019**



Source LFS (4 quarters of each year). Author calculations.

### Immigration and public services

It is sometimes suggested that immigration could compromise public services by increasing demand and competition for publicly provided resources. All the descriptive work above underlies the reasons why several studies, summarised in MAC (2018), find that immigrants are net fiscal contributors, paying more in taxes than they receive in benefits and, as such, likely to put less pressure on public services like the health service. EU migrants, because they are younger and more likely to be in work than other migrants tend to be the largest net contributors. EU migrants are more likely to be current net contributors to fiscal revenues than other immigrants.<sup>13</sup> The size of these positive contributions is not, however, very large (MAC, 2018). This seems to mirror the findings across much of the UK economy: that immigration’s effects are not very large in either direction.

However, since the majority of EU residents are in work and the share of work accounted for by EU migrants is the largest of the shares across other states, any fall in the numbers of EU immigrants, unless offset, is likely to affect the world of work more than the education sector (nurseries, schools and colleges) or welfare services (pensions, welfare benefits) directly. There may also be implications for

<sup>13</sup> This essentially drives the findings of Dustmann and Frattini (2014), which indicate that EU migrants are net fiscal contributors, unlike the UK-born population. See HMRC (2017) for a disaggregation by EU countries of tax receipts versus tax credit payments and DWP (2017) for an assessment of welfare payments.

the funding of welfare and education services if tax revenues were to fall following a decline in the numbers of (employed) EU migrants and no offsetting rise in revenues from elsewhere.

### **Immigration policy in the future**

The policy options offered by the different political parties in this election vary from retaining the existing system to a points-based system that shows no favour for EU migrants over non-EU migrants.

Immigration to the UK contains three distinct groups: workers and their families, students and refugees. All three groups are covered by different rules and visa schemes. The last category are a comparatively small group, so policies toward the first two groups are likely to have more widespread effects.<sup>14</sup> Students from overseas are a big source of revenues for universities and, since they are allowed to stay and look for work after graduation, they provide an additional workforce supply.

With regard to the labour market, firms needing more workers can train more, automate more, change work practices (such as pay or working conditions) or move as well as using labour from abroad. Indeed, it may well be that the change in direction of EU immigration flows following Brexit has already forced some adjustment by firms, so the immediate migration response of increased outflows and a fall in inflows after the vote has forced firms to address the new reality without there being any change in policy.<sup>15</sup>

### **Will things change?**

It could also be argued that if *rising* immigration had little economic effects on UK-born workers (see Figures 8 and 9 above), then if (EU) immigration *falls* after Brexit might we also expect little effect even with no change in immigration policy? If we assume that the econometric models on which these findings are based control for other factors, then ‘little effect’ is the best estimate we have about immigration’s labour market effects, whether immigration is rising or falling.<sup>16</sup>

But this may not necessarily be so, since going forward, things will not be governed by the same macro-environment in which immigration was rising. It is the effect of the *interaction* of changes in the external environment alongside immigration trends about which we are much less certain. Alongside possible restrictions on the movement of labour from the EU, the possible ending of free trade with the EU that could accompany Brexit, the change in the exchange rate that will accompany Brexit, the change in the UK growth path that will accompany Brexit, and the relative performance of other economies are all

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<sup>14</sup> Asylum seekers made up around 5% of immigrants to the UK in 2018, House of Commons (2019).

<sup>15</sup> See MAC (2017) and MAC (2018), Portes (2017) and Resolution Foundation (2017) for other views on immigration policy options going forward.

<sup>16</sup> The coefficients in an econometric model implies symmetry of any estimated effect.

added unknowns that mean going forward may not be the same as going back. Nor can it be said with any certainty that the preferences of any new administration would be the same as the current administration. In short, predicting the future is tricky.

### **Immigration policy options**

If Brexit allows the government the opportunity to look at the free movement of labour from the EU and more broadly to look at immigration policy anew, then what should it do? With regard to future immigration policy, a debate should probably be had as to whether any new policies should deal with the immediate consequences of Brexit or focus on immigration policy in the long-term as a strategy. The two issues are not necessarily the same. The immediate consequences of Brexit may be very different from what governments may want from a long-term immigration strategy.

An economist might suggest that the design of policy should be based on the assessment of its relative costs and benefits, with the aim of choosing the policies that have the greatest benefit relative to the cost. Quantifying costs and benefits is never easy, particularly when it is not always obvious which constituent policy is being designed for. Is it the UK government? Is it UK businesses? Is it UK citizens? Is it the different countries of the UK? Is it the UK-born population rather than all UK citizens? What about the preferences of the EU?

None of these various constituencies will be equal beneficiaries and how to quantify and weight the preferences of the various competing agencies all add to the complexity of policy design with regard to forming a judgement of the various policy options with regard to economic efficiency and equality of outcomes. This is the difficulty that the government of the day will face.<sup>17</sup>

On the policy response to the short-term consequences of Brexit, it would be a mistake to think that employers (or schools or colleges) are going to lose 7% of their populations immediately. Any adjustment will be on the flow not the stock of migrants. The inflow of migrants is, currently, around 5% of the stock. Outflows are around 5% of the stock.<sup>18</sup> So any changes in EU migrant numbers will be incremental rather than large scale. Most of the sectors in Tables 3 and 4 are non-graduate jobs – although, as shown, there are many EU graduates undoubtedly working in these sectors. So certain firms and sectors would also have to look around for different sources of labour, raise wages or change

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<sup>17</sup> This is the role of social welfare functions/planners in Economics. The difficulties in quantifying the various preferences, costs and benefits remain.

<sup>18</sup> The LFS estimates the total immigrant inflow in 2019 to be around 5% and the EU inflow (share of all immigrants who had been in the UK for less than one year) to be 4% in 2019, down from a peak of 10% and 14% respectively in 2006.

their methods of working (though any firm that relies on a never ending supply of EU workers in an environment of free movement of labour in and out of the country has an unstable business model).

But consequences there may be, and government will have to decide if the demands from the sectors most affected, such as those highlighted above, in the short run need to be addressed alongside a longer-term immigration strategy. One option would be to allow sector-specific and time-limited or seasonal migration schemes (from the EU or elsewhere) to allow workers into these less skilled sectors over the medium term until businesses had adapted to the new policy environment. How long the medium term should be is again a matter for debate. The downside of such a policy is that sectors may postpone any changes to their business model.

### ***Who gets in?***

Any future work-related migration policy is therefore likely to involve rationing of places and with it the selection of migrants. This means thinking about whether to adapt existing schemes or introduce new ones. A debate on whether there should be a quota on the number of migrants allowed in each year. Quota or not, decisions have to be taken about the numbers of individuals allowed in under the different entry routes (essentially work, family or students), and the spread or differential treatment to EU over non-EU citizens.

Work visa are currently based around the notion that bringing in migrants alleviates skill shortages. While firms always have the option to raise wages or change the capital mix in these situations, such adjustments may take time and so a visa scheme can address ‘short-term’ shortages. This in itself creates incentive problems, since once on a shortage list, occupations have less incentive to train their own or adopt alternative ways of working.<sup>19</sup>

Conversely a policy of importing skilled labour from abroad could facilitate more training of local workforces, by skilled immigrants, if training is rationed.<sup>20</sup> Non-EU work visas to the UK are currently restricted to ‘graduate-level’ jobs. Any quotas or work visas on EU nationals after Brexit are also likely to favour graduate sector jobs. This is partly because the existing immigration policy for non-EU citizens is almost exclusively restricted to graduate-level jobs and partly because the net fiscal contribution from graduates is likely to be higher than from non-graduate jobs.<sup>21</sup> Whether there are

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<sup>19</sup> Similar to a general non-time delimited policy, arguably this may have happened with some sectors placed on the existing UK Shortage Occupation List. Once on the list, without periodic re-assessments there is less incentive to try alternatives to hiring immigrants.

<sup>20</sup> See Mountford and Wadsworth (2019) for a detailed discussion and an empirical investigation of these competing hypotheses.

<sup>21</sup> Note this is graduate jobs not people. The definition of a graduate job is in turn is based on occupational classification and/or average wages in the occupation.

more shortages in this area or in the vocational sector, due to the UK's relatively poor training record (OECD, 2017), is open to discussion.<sup>22</sup> It may be that a revised shortage list could be broadened, again, to include vocational jobs.

### ***Back to the future***

Another form of selection would be to target individuals rather than jobs, effectively reverting to a points-based system, a form of which was in place in the UK in the late 2000s. Coming up with a coherent points system is not an easy thing to do. That said, Canada and Australia operate, in part, an individual points-based immigration system (OECD, 2018, 2019). Canada recently re-weighted its points system toward skilled migrants with a job offer). Australia's individual points system also depends, partly, on the individual working in a (moving) set of shortage occupations.

Both countries operate a two-tier entry system. Applicants first apply and are then ranked according to a points scheduling system. Periodically, applicants with points above a threshold are invited to apply for admission. The allocation of points moves according to a variety of (moveable) considerations. Both countries operate policies that can facilitate rising numbers of skilled immigrants so an off-the-shelf adoption of such a policy by the UK would probably not work, since a continually rising number of skilled immigrants is unlikely to be a policy should the UK relinquish free movement of labour.

For example, targeting individual graduates may not help graduate sectors if the graduates migrate to less skilled occupations (as suggested by Table 4). One benefit of having occupation-based entry shortage schemes rather than individual points-based entry is that labour market signals determine which businesses are in shortage. In general, it is hard for governments or agencies to pick winners. Letting firms and workers interact within informed general government imposed guidelines (such as restricting entry to graduate jobs) is probably a better way to get good job matches. Restricting by occupation rather than people probably reduces migration flows more, since the set of eligible occupations is easier to restrict than a set of eligible individuals.

Despite the prominence and priority given to the shortage occupation list, a majority of non-EEA work-related migrants arrive instead by the resident labour market test (RLMT).<sup>23</sup> This allows employers to bring in non-EEA migrants, even if the job is not on a shortage list, if the firm can demonstrate that there are no suitable applicants from within the EEA. While it may at first seem implausible that no suitable candidates can be found among the 500 million or so EEA citizens, the RLMT arguably is an

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<sup>22</sup> The MAC (2011) report on occupation shortages highlights shortages in many vocational (non-graduate) occupations that were subsequently excluded from the shortage list used to determine the allocation of work visas in the UK.

<sup>23</sup> See for example <https://www.gov.uk/government/publications/immigration-statistics-year-ending-march-2019/summary-of-latest-statistics>

alternative way of determining a skill shortage without the need for a dedicated shortage list. Such schemes do, however, need to be continually monitored to prevent abuse of the system. The test would also have to be amended to restrict initial employer search to the UK to accompany Brexit. Combinations of shortage lists and resident labour market tests do perhaps allow governments to select sectors it sees as priorities while at the same time allowing a degree of flexibility among employers. The issue, as ever, is getting the appropriate mix in order to balance the two interests.

Whatever combination of these methods is employed, there are likely to be more shortages than most governments would allow to be filled by immigration without some sort of quotas. The current form of rationing within a set quota makes firms compete on salary, which some businesses may be less able to do than others.<sup>24</sup> This could prove to be anti-competitive in the long run. Similarly, quotas also need to be administered, presumably imposing as little cost and effort on firms and individuals as possible so as to try to ensure that firms without large dedicated teams adept at working in the system do not lose out.

### ***Welfare and work***

One possible model for EU migration after Brexit would be to allow for free entry from the EU after Brexit with a fixed time interval in which to find a job, possibly accompanied by a registration scheme to help enforcement and monitoring of numbers. This would essentially be the status quo, since job seekers from the EU rather than those with a job offer are a minority of work-related entries.<sup>25</sup>

It would not, however, be seen to address any worries over ‘benefit tourism’. Whether real or imagined, this could be seen to be addressed by restricting entry to those with a job offer after Brexit, EU and non-EU alike. If the entry level were set at graduate jobs, the going wage would exclude most of these jobs from tax credit payments, as is done with non-EEA migrants now.<sup>26</sup> Welfare claims could then only be made after any subsequent spell of unemployment or sickness *and* granting of UK residency, again as is done with non-EEA migrants now.<sup>27</sup>

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<sup>24</sup> There will also be an issue about whether to let EU students work in the UK after graduation. At present, non-EEA graduates can stay in the UK two years after graduation in order to try to find a Tier 2 (effectively graduate) job. There are no limits on the numbers of students who can do this. Similarly family members of legally resident EU individuals will almost certainly be allowed to migrate to the UK under international law, like Non-EEA migrants at present. Non-EEA family migrants can work in any sector in the UK.

<sup>25</sup> Job seeking flows have fallen to less than 30% of all job related flows in 2018 q4 from a peak of 41% in 2015q4 (LTIM, 2019). Job seekers from the EEA have been unable to claim Housing benefit in the UK since 2014.

<sup>26</sup> Restricting to graduate jobs, however, means excluding migrants from skilled trades such as plumbers or chefs. A point emphasised by the MAC (2018). A salary threshold is therefore an alternative to a graduate job. This however has implications for certain public sector jobs.

<sup>27</sup> Non-EEA Tier 2 migrants are on a job specific work permit. This means that they are tied to the job with the permit until they have indefinite leave to remain and are hence effectively excluded from the welfare system

But even restricting labour migration to those with job offers in certain occupations does not automatically restrict migration to these sectors. There will be an issue about whether to let EU students work in the UK before and after graduation. At present, non-EEA student entrants can work for up to 20 hours a week in any sector while studying and can then stay in the UK two years after graduation in order to try to find a Tier 2 (effectively graduate) job. There are no limits on the numbers of students who can do this. Similarly, family members of legally resident EU individuals will almost certainly be allowed to migrate to the UK under international law, like non-EEA migrants at present. Non-EEA family migrants can work in any sector in the UK. There were no sector restrictions on self-employment for A2 workers during their transition period. Would something similar apply to all EU workers after any Brexit?<sup>28</sup> There are also firms who can bring in employees from international subsidiaries in occupations not on a shortage list (inter-company transfers). Again, decisions will have to be made on whether to extend or amend these work entry routes to EEA workers after Brexit.

### ***Area-based schemes***

There are also issues of regional or more likely country-specific immigration schemes to consider. At the moment, Scotland has some additional leeway over its work route since it has its own shortage occupation list. Country/regional-based schemes are easier to operate with temporary visas. With permanent residence, individuals can move away from the area that sought to attract migrants, which can then negate the effect of the policy to attract migrants.

But temporary visas bring other problems in the form of monopsony issues. If individuals are tied to a particular employer, this gives the employer more power over a worker than if the worker were free to choose where to work. More temporary working may place more demands on the UK's new Labour Inspectorate to ensure working standards are met and indeed increase the likelihood that some individuals overstay the length of their visas.

### ***Cost of hiring from abroad***

In April 2017, the UK introduced an immigration levy (the 'Immigration Skills Charge') on any firm hiring (graduate) labour from outside the EU. The charge varies by firm size but does add to the existing firm costs of hiring migrant workers and is arguably selective in that more profitable firms may be more likely to be able to afford to pay the levy. It is too early to tell whether this has deterred some firms

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until this time. Should the firm they work for collapse or the individual be laid off during this period, migrants have two months to try to find an alternative sponsor. See <https://www.gov.uk/employee-lose-sponsor-licence>

<sup>28</sup> Ruhs and Wadsworth (2017) show that the ending of transition restrictions in A2 workers in 2015 immediately reduced the numbers of A2 self-employed workers without reducing numbers of A2 employed. This suggests that work patterns adjust to the regulatory environment of the day.

from hiring from outside the EU, but knowledge of this policy and its effects would be welcome in helping decide whether and how to extend to the hiring of workers from the EU.<sup>29</sup>

Other costs of recruiting from abroad include labour market tests whereby would-be employers have to demonstrate that they have tried unsuccessfully to recruit from the domestic labour market. Such tests can be opaque and easily manipulated and could be looked at again in a new policy environment. It is also possible to involve the workforce to try to ensure that working conditions do not change with the advent of migrant labour, as in Norway (OECD, 2014).<sup>30</sup> Does the UK want to try that sort of system?

## **Conclusions**

There are still far too many unknown unknowns to say anything confidently about what will happen in the near future. Immigration still seems to matter much more politically than it does economically. All the empirical work that has been done on UK immigration shows very small labour market effects, either positive or negative. Any reduction in EU immigration would have a negative effect on the public finances since EU migrants pay more in taxes than receive in benefits and public services (whereas UK-born and non-EU migrants receive more in benefits than they pay in taxes), but these net payments are not very big.

The options for future immigration policy are many and varied and there are no easy answers as to what to do or what to prioritise. As such, this makes it hard to design a new migration system.

We can say that restrictions on EU workers after the UK leaves the EU look likely, but any adjustment will not be on the stock of EU migrants but in the numbers flowing in and out of the UK and these flows are much smaller. So any change is likely to be incremental, on average, though undoubtedly some sectors, typically lower paying, high turnover sectors, will be hit more than others.

Brexit does allow the government the opportunity to make a serious consideration of its future immigration policy, but there is not much time to put a studied scheme in place before 2021. While that future almost certainly will place restrictions on numbers of EEA migrants, it may well be that immigration policy, like so many policies in the UK, evolves and reacts to events and the unforeseen consequences of previous actions.

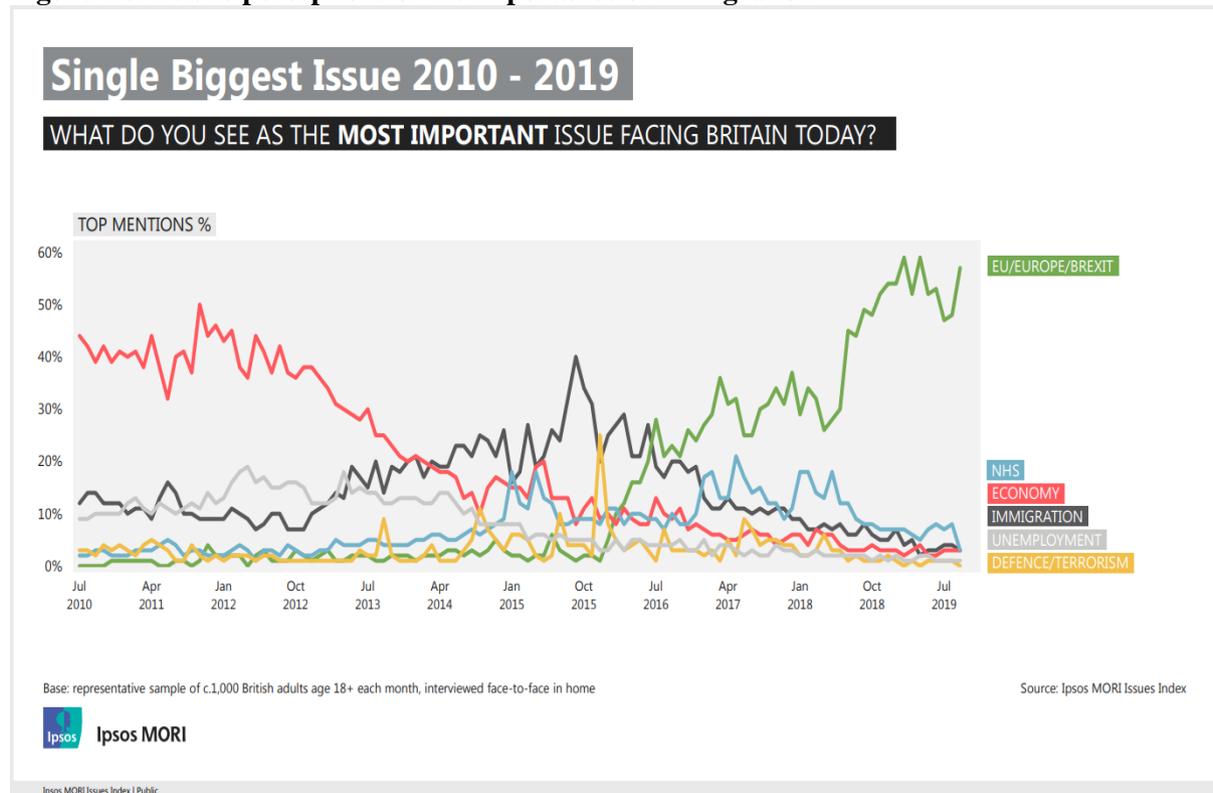
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<sup>29</sup> There have only been two published quarters of inflow data since the policy was implemented. If anything, work-related inflows from outside the EU were up in the quarter (and on the year) after the policy began.

<sup>30</sup> A general requirement for all work-related residence permits from outside the EFTA is that wage and working conditions for the job in question correspond to those for Norwegian workers in similar jobs. There are exemptions from these rules for migrants in temporary work. See Bratsberg et al (2014) for an analysis of immigrant performance in Norway.

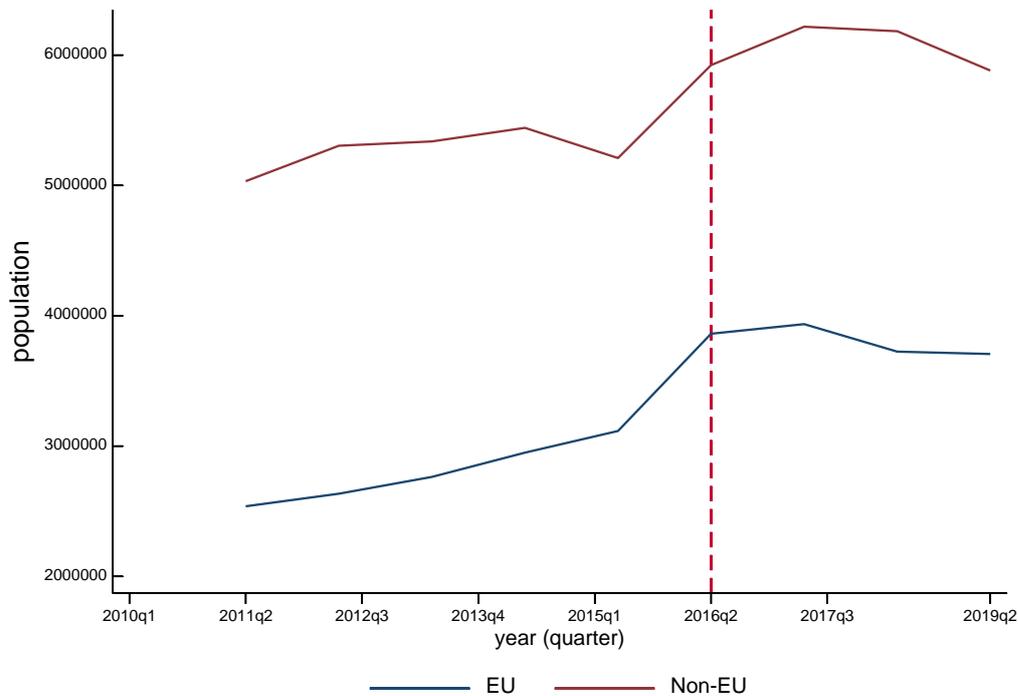
## Appendix

**Figure A0: Public perceptions of the importance of immigration**



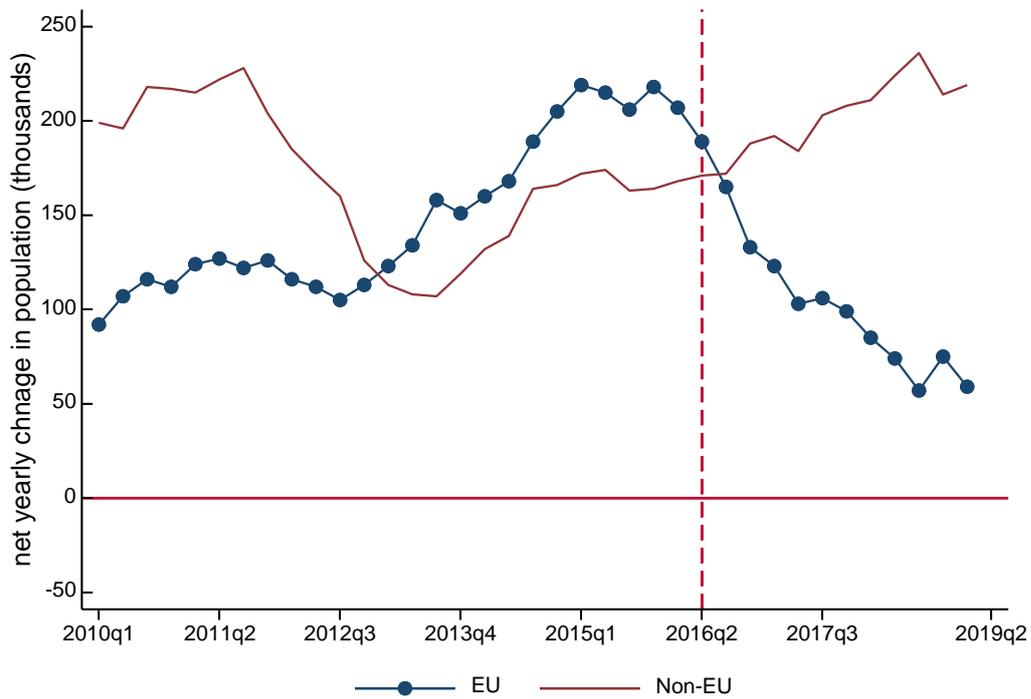
Source: IPSOS/MORI (2019)

**Figure A1: Population by EU and Non-EU country of birth**



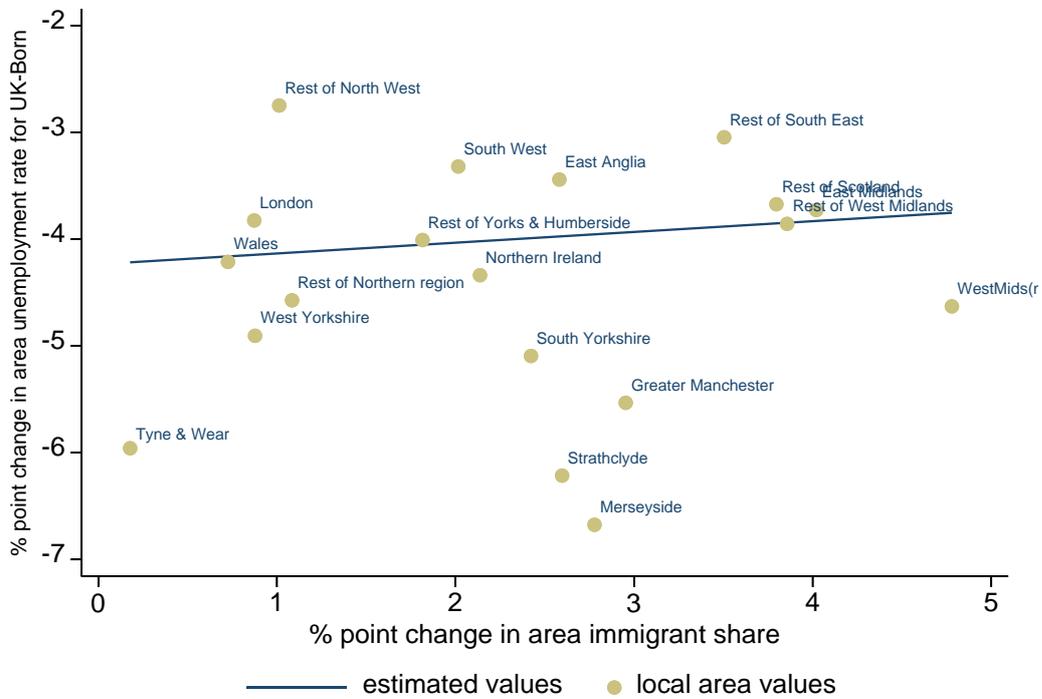
Source: APS; author calculations.

**Figure A2: Net inflows by EU and Non-EU citizenship**



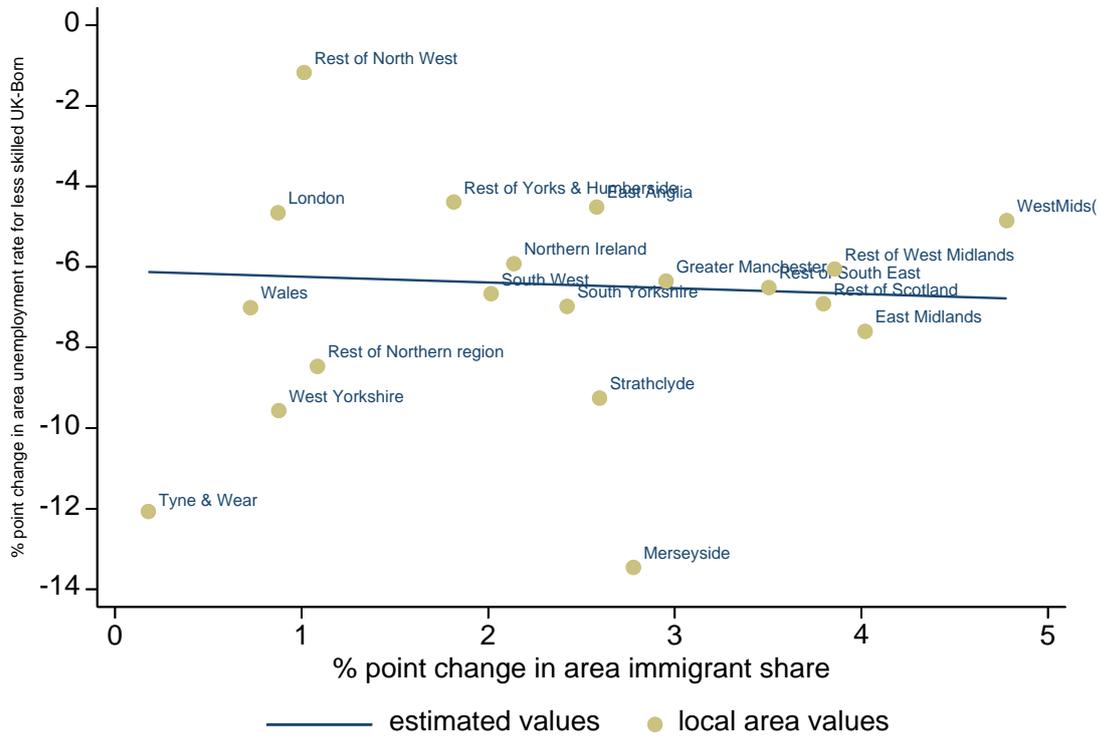
Source: LTIMS (2019); author calculations

**Figure A3: Changes in immigration and the unemployment rate of UK-born by area, 2011-2019**



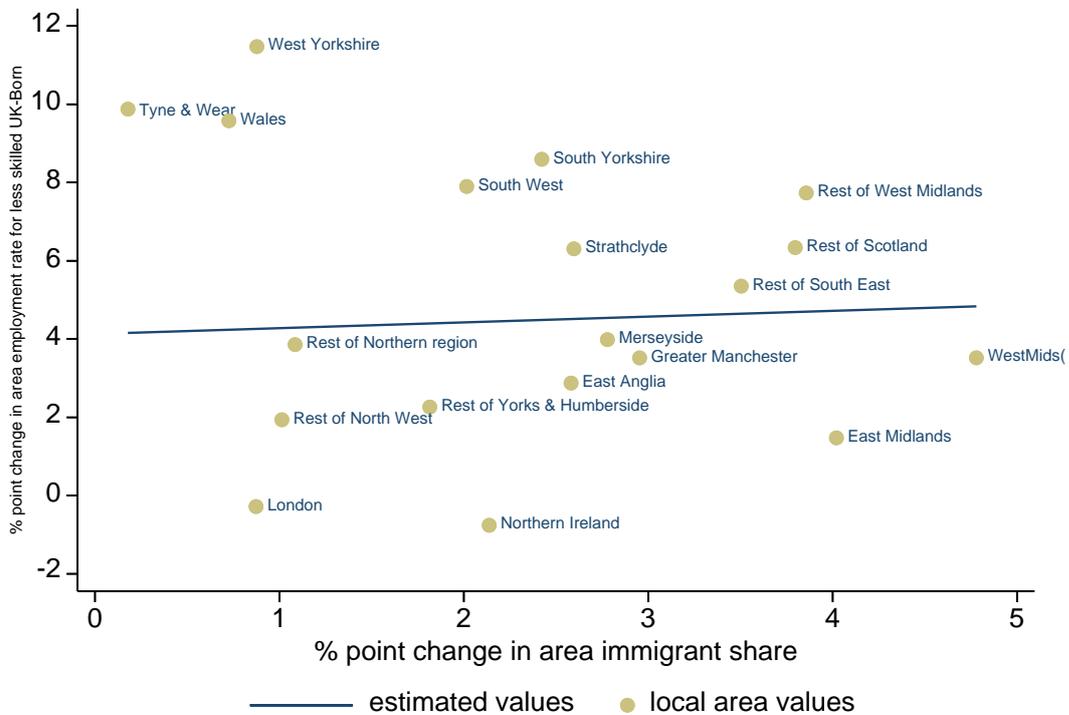
Source: LFS; author calculations.

**Figure A4: Changes in immigration and the unemployment rate of less skilled UK-born by area, 2011-2019**



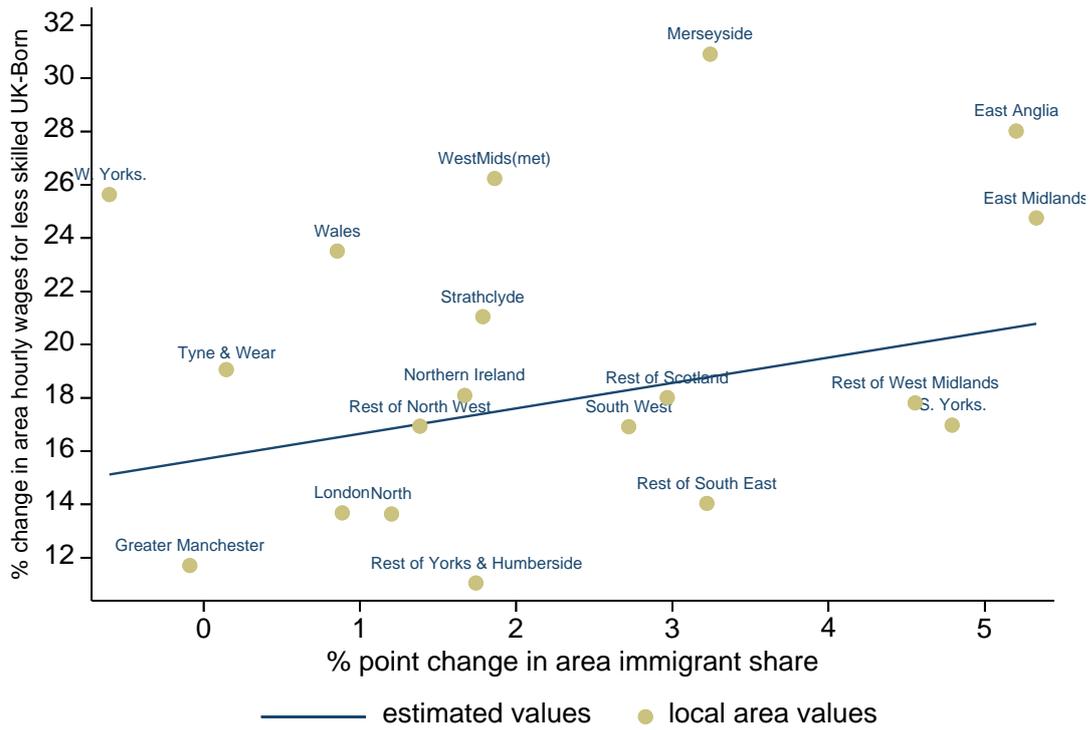
Source LFS; author calculations.

**Figure A5: Changes in immigration and the employment rate of less skilled UK-born by area, 2011-2019**



Source: LFS; author calculations.

**Figure A6: Changes in immigration and hourly wages of less skilled UK-born by area, 2011-2019**



Source: LFS; author calculations.

This paper was prepared for the CEP Election Analysis series. A summary version is available here <http://cep.lse.ac.uk/pubs/download/ea045.pdf>

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