

REFUGEES AND THE **UK** LABOUR MARKET

ECONREF 04 2019

Zovanga Kone Isabel Ruiz Carlos Vargas-Silva

Contact:

Carlos Vargas-Silva Centre on Migration, Policy and Society University of Oxford 58 Banbury Road OX2 6QS

T: +44(0)1865 274711 E: <u>carlos.vargas-silva@compas.ox.ac.uk</u> <u>www.compas.ox.ac.uk</u>



Refugees and the UK Labour Market

Authors:

Zovanga Kone

Isabel Ruiz

Carlos Vargas-Silva

Published:

25 April 2019

Contact information:

Carlos Vargas-Silva Centre on Migration, Policy and Society University of Oxford 58 Banbury Road OX2 6QS

T: +44(0)1865 274711

E: <u>carlos.vargas-silva@compas.ox.ac.uk</u>

W: <u>www.compas.ox.ac.uk</u>







Executive summary

Facilitating the integration of refugees is an important objective of civil society organisations and government departments at the local and national level. However, efforts to facilitate integration have been constrained by the lack of information on the short- and long-term outcomes of refugees.

This report uses the best available data to date to explore labour market and other related outcomes of those who migrated to the UK for asylum reasons. These outcomes are compared to those of UK-born individuals and to those of other migrants who moved to the UK for employment, family, and study reasons. For clarity, we refer to the different migrant groups based on their *initial* reason for immigration to the UK as: *asylum migrants, employment migrants, family migrants,* and *study migrants.* These categories do not refer to actual legal status or current main activity. For instance, most asylum migrants included in our analysis have spent many years in the UK and are now British nationals. In addition, 'asylum migrants' should not be confused with 'asylum seekers', who are individuals waiting for a decision on their asylum application and are not the focus of this report.

This report is the concluding summary of *The Economic Integration of Refugees in the UK* (ECONREF) project, a two-year study financed by a grant from The Nuffield Foundation and conducted at the Centre on Migration, Policy and Society (COMPAS), University of Oxford.

The data used in this report covers the period from 2010 to 2017. The following are some of the key findings of the report:

- In 2017, an estimated 374,000 foreign-born individuals who originally migrated for asylum reasons (i.e. asylum migrants) were living in the UK. This represents close to 4% of the foreign-born population of the country. The top-5 countries of birth of asylum migrants are Somalia, Afghanistan, Sri Lanka, Iran, and Zimbabwe. The majority of these individuals are now British nationals.
- Asylum migrants are less likely to be in employment than the UK-born and other migrant groups. The employment rate among asylum migrants is 51%, compared with 73% for the UK-born. Adjusting for socio-demographic characteristics (for example, age, gender, education, ethnicity, and location of residence) reduces the employment gap to 12 percentage points. This gap in employment rates and all other gaps discussed in this executive summary refer to statistically significant differences. The gap in employment rates is smaller for cohorts of asylum migrants who have been longer in the UK, but it takes time for it to narrow. For instance, the gap remains present – albeit smaller – even after more than 25 years of residence in the country.
- Asylum migrants who are employees earn less and work fewer hours than the UKborn and other migrants. Asylum migrants earn an average of £9 per hour and £284 per week. The analysis adjusting for socio-demographic characteristics suggests that asylum migrants earn, on average, 55% less per week than the UK-born and 38% less per hour (excludes those in self-employment) and work 4 fewer hours. Compared to

the UK born, they are also 20 percentage points less likely to work full time and 19 percentage points less likely to be in professional or managerial positions.

- Among those who are in employment, asylum migrants are more likely to be in selfemployment than the UK-born and other migrants. In total, 21% of asylum migrants in employment are self-employed compared to 14% of UK-born. The analysis adjusting for socio-demographic characteristics suggests that asylum migrants in employment are 8 percentage points more likely to be in self-employment than the UK-born.
- Among those in self-employment, asylum migrants are more likely to have employees. Close to 24% of the asylum migrants in self-employment have employees, compared with 18% of the UK-born. Adjusting for socio-demographic characteristics reduces the gap to 2 percentage points. However, asylum migrants are less likely to have a medium- or large- sized business (as measured by number of employees) in comparison to the UK-born.
- Unemployed asylum migrants are more likely to rely on public agencies (e.g. job centres) to look for jobs. In total, 37% of unemployed asylum migrants used public agencies as their main job search method. This is about twice the rate of UK-born unemployed job-seekers. The analysis adjusting for socio-demographic characteristics suggests that unemployed asylum migrants are 17 percentage points more likely to report using this main job search method compared to the UK-born. The analysis also suggests that asylum migrants who found employment during their time in the survey are 12 percentage points less likely to have found jobs via their main search method in comparison to the UK-born.
- Asylum migrants are more likely to report a long-term health condition and to indicate that this condition affects their labour market performance. Close to 37% of asylum migrants report a health condition lasting longer than 12 months. The analysis adjusting for socio-demographic characteristics suggests that the likelihood of reporting this type of condition is 4 percentage points greater among asylum migrants than the UK-born. In addition, asylum migrants are more likely to report that health conditions affect the number of hours that they can work by 9 percentage points. In contrast, all other migrant groups are *less* likely than the UK-born to report a long-lasting health condition or that a health condition affects the type and number of hours worked.
- Asylum migrants are substantially more likely to report mental health problems compared to other migrants. One quarter of asylum migrants with a health condition reported having mental health problems. The analysis adjusting for socio-demographic characteristics suggests that asylum migrants are *more* likely than the UK-born to report such condition by 3 percentage points. In contrast, employment migrants are 7 percentage points *less* likely to report a mental health problem compared to the UK-born.

The results of the report have implications for several areas of concern to policymakers. Examples of these include:

- **Health:** asylum migrants are substantially more likely to report long-lasting health problems than the UK-born and other migrants, and to report that this type of condition affects their ability to work. Policy interventions aimed at improving the labour market integration of this group should consider this. For instance, allocating funding geared towards the economic integration of asylum migrants to first address health issues that impede work performance, including mental health, could lead to better labour market outcomes for this group in the future.
- Access to finance: asylum migrants have a greater tendency to be in self-employment compared to UK-born individuals and other migrants and are more likely to employ other people. However, asylum migrants in self-employment are also more likely to have a small business (vs medium/large) than the other groups. There are several possible explanations for this, including the lack of access to finance in order to expand their business. Policy interventions directed at boosting entrepreneurial potential among asylum migrants (or the migrant population in general) should consider this potentially inhibiting factor.
- Role of public job search agencies (e.g. job centres): the analysis suggests that unemployed asylum migrants rely heavily on public agencies for their job searches. At the same time, their choice of search method does not seem particularly conducive to finding a job. The high reliance on public agencies could relate to the level and type of assistance provided to asylum migrants. Future policy (and academic) analysis could investigate these issues closely in order to reduce dependence on public agencies or help understand how these agencies could serve asylum migrants more effectively.

The research also identified several areas in which future academic work could focus. Examples of these include:

- **Reasons behind the health gaps:** asylum migrants often experience traumatic events before arriving in the host country, many of which can have significant effects on future physical and mental health (e.g. malnutrition, trauma due to exposure to violence). However, factors after arrival in the host country can also play an important role. For instance, in the UK, asylum seekers face lengthy legal restrictions to access the labour market while their claim is being evaluated. This period of inactivity and uncertainty can have adverse long-term consequences for mental health. Future research might be able to provide insights on the relative importance of pre-arrival and post-arrival factors in affecting the health of asylum migrants and their posterior labour market outcomes.
- **Greater likelihood of self-employment:** the greater tendency to enter selfemployment among asylum migrants can relate to positive factors such as greater entrepreneurial ambition, but also to negative ones such as lack of opportunities in the waged sector due to discrimination, for example. Future research can provide insights on the relative importance of these different factors.

• Lower job-finding rates: future research could investigate why we see patterns of lower job-finding rates among unemployed asylum migrants. For instance, is this by choice (e.g. to comply with requirements for welfare assistance) or because of some structural constraints?

Table of contents

Executive summary	2
Table of contents	6
List of tables	8
List of figures	9
Acknowledgements	10
About the authors	11
1. Introduction	12
2. Who counts as a refugee in statistical datasets and this report?	13
3. Numbers and characteristics	14
3.1 Population numbers	14
3.2 Individual characteristics	17
4. Labour market outcomes	19
4.1 Employment and unemployment	19
4.2 Hourly pay and weekly earnings	22
4.3 Hours worked	22
4.4 Occupation	24
4.5 Gender differences	25
4.6 Regional differences	27
5. Self-employment	28
5.1 Likelihood of self-employment	28
5.2 Characteristics of self-employment	30
6. Job search methods	31
6.1 Main job search methods	32
6.2 Job search methods and employment outcomes	33
7. Health outcomes	35
7.1 Long-term health conditions	35
7.2 Health conditions and economic activities	36
7.3 Particular health conditions	37
8. Final remarks	38
9. More information	39
References	40
Technical appendix	44
A.1 The LFS and its limitations	44
A.2 Definitions	44

A.3 Conditional versus unconditional differences	45
A.4 Regression equations	46

List of tables

Table 1 – Distribution of the UK population by reason for immigration, 201714
Table 2 – Top 10 countries of birth of asylum migrants15
Table 3 – Estimates of employment and unemployment differences 20
Table 4 – Estimates of hourly pay and weekly earnings differences
Table 5 – Estimates of hours worked differences
Table 6 – Estimates of differences in the likelihood of working full time
Table 7 – Estimates of occupation differences 24
Table 8 – Estimated differences in employment, hourly pay and hours worked by gender26
Table 9 – Estimates of occupation differences by gender27
Table 10 – Estimated differences in employment for London and rest of the UK28
Table 11 – Estimates of differences in the likelihood of self-employment
Table 12 – Estimates of differences in the likelihood of having employees
Table 13 – Share using a given main job search method32
Table 14 – Estimates of differences in the share using a given main job search method33
Table 15 – Estimates of differences in the likelihood of finding a job via a given search method 34
Table 16 – Estimates of differences in the likelihood that the search method that led toemployment is the main job search method
Table 17 – Estimates of differences in the likelihood of having a long-term health condition 35
Table 18 – Estimates of differences in the impact of health problems on economic activities
Table 19 – Share reporting a given health condition among those with a health problem37
Table 20 – Estimates of differences in the likelihood of reporting a given condition amongthose with a health problem
Table A1: Description of samples used in the regression analyses 47
Table A2: Occupational grouping and corresponding skill levels 48
Table A3: Search methods categories 49

List of figures

Figure 1 – Period of arrival in the UK	15
Figure 2 – Region of residence	16
Figure 3 – Gender distribution	17
Figure 4 – Age distribution	17
Figure 5 – Educational distribution	18
Figure 6 – Ethnicity breakdown	19
Figure 7 – Employment gap and length of residence	21
Figure 8 – Occupation type and length of residence	25
Figure 9 – Self-employment gap and length of residence	30

Acknowledgements

This report is an output of *The Economic Integration of Refugees in the UK* (ECONREF), a twoyear study conducted at the Centre on Migration, Policy and Society (COMPAS) at the University of Oxford.

The Nuffield Foundation is an endowed charitable trust that aims to improve social well-being in the widest sense. It funds research and innovation in education and social policy and also works to build capacity in education, science and social science research. The Nuffield Foundation has funded this project, but the views expressed are those of the authors and not necessarily those of the Foundation. More information is available at www.nuffieldfoundation.org.

The report has benefited from insights from consultations with multiple government departments and organisations working with migrants, asylum seekers and refugees. These departments and organisations include: Ashley Community Housing, British Future, City of Cardiff Council, East Midlands Strategic Migration Partnership, Home Office (several units), IOM, London Strategic Migration Partnership, Red Cross, Refugee Council, South East Strategic Migration Partnership, South West Strategic Migration Partnership, TERN, UNHCR, Wales Strategic Migration Partnership, Welsh Refugee Council, and Yorkshire Strategic Migration Partnership. These consultations took place at different stages of the project and we are thankful to those who participated. In addition, we have received continuous feedback and insights from the ECONREF advisory board members, which include Theresa Beltramo (UNHCR), Marta Foresti (ODI), Peter Grady (UNHCR), Tim Hatton (University of Essex), Roy Millard (SESMP), Jackie Wahba (University of Southampton), Maurice Wren (Refugee Council) and Roger Zetter (University of Oxford). We also received feedback from Francesco Fasani and Tommaso Frattini who lead a related project, also financed by The Nuffield Foundation. Additional particular thanks go to Alex Beer, Jackeline Broadhead, Rosaleen Cunningham, Madeleine Sumption and Sarah Spencer who also provided feedback on an earlier version of this report. The feedback and collaboration of all these individuals and organisations does not necessarily imply the endorsement of the views expressed in this report.

The authors also received feedback at multiple academic presentations of the research, including the European Association of Labour Economists, Netherlands Bureau for Economic Policy Analysis, Refugee Studies Centre, and the final joint conference of the project "Forced Displacement, Asylum Seekers and Refugees: Economics Aspects and Policy Issues" at Queen Mary University of London.

The data used in the report come from the secured access version of the UK Labour Force Survey produced by the Office for National Statistics (ONS) and supplied by the UK Data Service. The use of the data in this work does not imply the endorsement of ONS or the Secure Data Service at the UK Data Archive in relation to the interpretation or analysis of the data.

About the authors

Zovanga Kone is a Post-Doctoral Researcher at COMPAS, University of Oxford.

Isabel Ruiz is Associate Professor of Political Economy at the University of Oxford, where she is also Director of Studies in Economics at the Department for Continuing Education and an Official Fellow of Kellogg College.

Carlos Vargas-Silva is Research Director and Associate Professor at COMPAS, University of Oxford. He was the Principal Investigator for *The Economic Integration of Refugees in the UK* (ECONREF) project.

1. Introduction

While the majority of the forcibly displaced stay within the borders of their countries of birth or migrate to neighbouring countries, many travel long distances to seek protection and some reach European countries. In the UK, for example, there were 29,830 applications for asylum in 2018, an increase of 11% from the previous year (Home Office, 2018). Many of these applications will be successful, enabling the applicants to remain in the country and enter the UK labour market. The UK Government has also committed to accept thousands of Syrian refugees for resettlement, a process that started several years ago (Home Office, 2015). These developments have spurred a growing interest in the labour market and related outcomes of refugees in the UK and exploring how those outcomes compare to those of other residents of the country. Understanding these differences can help in the development of policies and approaches to better serve the refugee population.

This report explores differences in labour market and related outcomes between those who migrated to the UK to seek asylum, those who migrated for other reasons (employment, family, study) and those born in the UK. While there is a rich literature on the economic outcomes of migrants in the UK (e.g. Clark and Lindley, 2009; Drinkwater et al., 2009; Dustmann and Fabbri, 2003), there is a scarcity of studies looking at the specific case of refugees. The main reason for this is the lack of datasets that recorded if migrants had moved to the UK for asylum. This changed in 2010 when a question about main reason for initial migration to the country was added to the UK Labour Force Survey (LFS). We make use of this question and dataset in this report.

There are several reasons why we could expect refugees to have worse outcomes than other migrants, particularly those who migrate for employment reasons. First, refugees' skills may be less readily transferable across countries than those of other migrants and differences in the main motivation to migrate suggest that refugees may be less favourably selected for labour market success in the host country (Cafferty et al., 1983; Chiswick, 1999; Constant and Zimmermann, 2005). Second, asylum seekers in many countries face lengthy legal restrictions to access the labour market while their claim is being evaluated (Allsopp et al., 2014) and periods of labour market inactivity can have adverse long-term consequences (Chin, 2005; Fransen et al., 2017). Third, many refugees have experienced traumatic events that affect their mental and physical health and ability to work (Bhui, 2003; Giuntella et al., 2018; Turner et al., 2003; Warfa et al., 2006).

Other factors suggest that refugees could have better outcomes compared to other migrants over the long run. Refugees are often less likely to return home than other migrants, as they face a higher risk of harm or persecution in their country of origin. The smaller likelihood of return results in a greater incentive to invest in host country human capital, such as language skills (Borjas, 1982; Cortes, 2004). As such, refugees could catch up and perhaps even outperform other migrants over time. It could also be the case that refugees from some countries represent a selected group with particular entrepreneurial or other valuable skills. The typical example is entrepreneurs who experience confiscation of land and other assets in their home country (Borjas, 1987; Kone et al., 2019). The skills of these entrepreneurs could be more valuable in a more market-oriented economy, than in the economic system of their home country.

The analysis and results in this report pertain to different waves of migrants, including some individuals who have spent decades in the country, many of whom are now UK nationals. This long-term perspective allows us to explore outcomes beyond the first few years of arrival in the country which has been the focus of previous work on refugees in the UK (Cheung and Phillimore, 2014; Ruiz and Vargas-Silva, 2017).

While refugees only account for a small proportion of the UK's foreign-born population, a majority of the public thinks about 'asylum seekers' when considering migrants coming to and living in the UK (Blinder et al., 2011). Issues related to asylum, which range from the right to work of asylum claimants to the type of assistance they should be provided with, also have substantial importance in political debates in the country. These public and policy debates, as well as efforts to facilitate economic integration, have been constrained by the lack of information on the short- and long-term outcomes of refugees. This report presents evidence that may help inform these debates and efforts.

2. Who counts as a refugee in statistical datasets and this report?

There are several different ways of defining and measuring refugee populations. Before exploring the outcomes of refugees and other groups, it is important to highlight how the classification of these groups in statistical datasets differs from some other possible definitions elsewhere. This section outlines the definitions we use in this report.

The analysis in this report uses 2010-2017 data from the UK Labour force Survey (LFS) and draws on information about main motivation for original immigration to categorise the foreign-born population into five distinct groups: asylum, employment, family, study, and other. Information on motivation for immigration is not available in the regular LFS dataset. As such, the analysis relies on the secured access version of the LFS. See Office for National Statistics (2018) for further details.

Our main group of interest is individuals who reported having come to the UK for asylum. The statistical analysis includes other migrant groups and the UK-born for comparison purposes. The discussion below uses the terms 'asylum migrants', 'employment migrants', 'family migrants', and 'study migrants' when referring to the different groups of migrants looked at. This categorisation does not refer to the actual legal status or main activity of the respondents. Instead, it refers to the main motive for coming to the UK as declared by the foreign-born respondent. For instance, most asylum migrants included in our analysis have spent many years in the UK and have acquired British nationality. Also, note that the term 'asylum migrants' refers to a different group from the term 'asylum seekers'.

Someone who requests asylum in the UK and is waiting for a decision on that claim is denoted an asylum seeker. Following a successful application, the individual will have some type of protection status. Those who received protection in the UK can apply for permanent settlement after a few years and can subsequently apply for British nationality. Individuals with permanent settlement or British nationality are no longer under 'refugee status', but would still be identified as 'asylum migrants' for the purposes of this report (because of their original reason for coming to the UK).

These distinctions between reason for immigration and actual legal status or current main activity also apply to the other migrant groups. For instance, the majority of 'study migrants' are no longer students. These individuals originally came to the UK to study and many decided to stay in the UK after finishing their studies.

The LFS has several advantages over alternative datasets, such as the Survey of New Refugees (Cheung and Phillimore, 2014; Ruiz and Vargas-Silva, 2017). First, the LFS includes information on individuals who migrated for different reasons to the country, which allows clear comparisons of labour market and other outcomes across different groups. Second, the data is collected continuously throughout the year, and this makes it possible to conduct up-to-date comparisons over time. Third, the data includes different cohorts of migrants, which facilitates the exploration of long-term trends.

The LFS data has limitations for exploring issues related to asylum. For instance, it is not possible to distinguish between those who arrived via resettlement and those who apply for asylum in-country, or based on type of protection granted. Likewise, there is no information on the process of asylum application (e.g. dispersal, number of decisions and appeals).

3. Numbers and characteristics

3.1 Population numbers

As reported in Table 1, there were close to 9.4 million foreign-born residents in the UK in 2017. Of these, an estimated 374,000 reported *asylum* as their main reason for migrating to the UK. In other words, asylum migrants account for a small portion of the total foreign-born population of the country (4%). Family (44%) and employment (29%) migrants account for the large majority of the country's foreign-born population.

Table 1 – Distribution of the OK population by reason for miningration, 2017				
	Total	Percentage		
Total	65,195,000	100%		
UK-born	55,828,000	86%		
Foreign-born	9,367,000	14%		
Foreign-	Foreign-born by reason for immigration			
Asylum	374,000	4%		
Employment	2,756,000	29%		
Study	1,157,000	12%		
Family	4,136,000	44%		
Other	888,000	10%		
Reason not reported	57,000	1%		

Table 1 – Distribution of the UK population by reason for immigration, 2017

Notes: These are weighted estimates using the 2017 LFS data. Figures rounded to the nearest 1,000. See Appendix for details.

Table 2 reports the top-10 countries of birth of asylum migrants. These 10 countries account for close to two-thirds of asylum migrants in the UK; Somalia and Afghanistan account for one-quarter of asylum migrants. Note that the political status of some key countries of birth of asylum migrants has changed over time and that the estimates in Table 2 are based on the information provided by respondents.

Table 2 – Top 10 countries of birth of asylum migrants			
	Total	Percentage	
Somalia	48,000	13%	
Afghanistan	45,000	12%	
Sri Lanka	34,000	9%	
Iran	21,000	6%	
Zimbabwe	19,000	5%	
Eritrea	15,000	4%	
Iraq	15,000	4%	
Syria	14,000	4%	
Kosovo	14,000	4%	
Uganda	11,000	3%	

Notes: These are weighted estimates using the 2017 LFS data. Figures rounded to the nearest 1,000. See the Appendix for details.

As shown in Figure 1, close to 40% of the asylum migrants in the UK arrived between 2001 and 2010. This is also the main period of arrival for the remaining migrant groups. However, in contrast to the overall foreign-born population, the 1990s was a key period of arrival for asylum migrants. In total, 30% of asylum migrants in the UK arrived during this period. This is likely the result of major conflicts afflicting several of the countries in Table 2 during that period.



Figure 1 – Period of arrival in the UK

Notes: Estimates use the 2017 LFS data. See the Appendix for details.

Figure 2 presents the region of residence of the different groups of migrants in the UK. London is presented separately as it is by far the main region of residence of all foreign-born, albeit with differences in proportions across groups. About half of all asylum migrants (53%) reside in London, a higher share than the other groups. Other regions with higher concentration of asylum migrants are the North West (11%), the West Midlands (8%), and Yorkshire and the Humber (6%).







Notes: Estimates use the 2017 LFS data. See the Appendix for details.

3.2 Individual characteristics

Figure 3 reports the gender distribution for each of the migrant groups. Asylum migrants are slightly more likely to be male (54% male). The gender differences are larger for some of the other groups. For instance, 60% of the employment migrants are male, while 62% of the family migrants are female.



Figure 3 – Gender distribution

The migrant population of the UK is concentrated in the 25 to 44 years age range (Figure 4). Asylum migrants, however, exhibit a greater concentration in the 45 to 54 years age range compared to others. Close to one quarter of the asylum migrants are in that age range.



Notes: Estimates use the 2017 LFS data. See the Appendix for details.

We also compare education levels across the different groups. Many migrants obtained their qualifications in their home countries and it is difficult to compare these different qualifications. In order to create a variable that is broadly comparable across countries we use the age at which the person left continuous full-time education, a measure commonly used in the literature looking at migrants in the UK. Using this information we create three categories as: high level of education (left education at age 21 or later), medium level of education (left education at age 18 to 20), and low level of education (left education before age 18). Note that this variable is an approximation and does not capture differences in education perfectly. As shown in Figure 5, asylum migrants are more concentrated in the low and medium levels of education, while work and study migrants are more concentrated in medium and high levels of education.





Notes: Estimates use the 2017 LFS data. See the Appendix for details.

The last demographic characteristic we look at is ethnicity. Figure 6 reports on this characteristic. Asylum migrants are substantially more likely than the other groups to select the "other ethnicity" category (46%). The second most common ethnicity group among the asylum migrant group is Black African or Black Caribbean (34%). The third most common ethnicity group is White (11%).



Figure 6 – Ethnicity breakdown

Notes: Estimates use the 2017 LFS data. See the Appendix for details.

4. Labour market outcomes

The labour market integration of refugees often emerges as an important issue in policy debates. A key objective of the ECONREF project has been to provide quantitative analysis and evidence to inform these discussions. We do so by exploring how the labour market outcomes of asylum migrants compare to those of other migrants and the UK-born. This section focuses on four key sets of labour market outcomes: (1) employment and unemployment rates; (2) earnings; (3) hours worked; and (4) occupation. In the discussion below, we first present the overall average values of these variables (i.e. means) for each of the groups. We then report differences between each of the migrant groups and the UK-born (the benchmark). The sample for this analysis is limited to individuals of working age – that is those between the ages of 16 and 64.

The tables with results include a column containing the estimates of unconditional differences and a column containing the conditional differences. The latter estimates are adjusted for factors such as age, gender, education, ethnicity, and location of residence using multivariate regression analysis. The former do not make such adjustments. Please refer to the Appendix for details about the estimations. Those interested in an extended discussion of these labour market differences may refer to Ruiz and Vargas-Silva (2018).

4.1 Employment and unemployment

Table 3 reports employment and unemployment estimates across subgroups of the population. The employment figures refer to the proportion of the working age population that has a job, while unemployment refers to those who are not in work, but are actively seeking employment.

The employment rate among asylum migrants is 51%. This is substantially lower than that of the other migrant groups and that of UK-born individuals. For instance, those who migrated for employment reasons have an employment rate of 88% and the UK-born have an employment rate of 73%. However, the gap between employment migrants and others decreases once differences in socio-demographic characteristics between groups are accounted for. This socio-demographic adjustment includes factors such as differences in education, age, gender, ethnicity, and location of residence, which have key implications for labour market outcomes. In particular, the employment gap between asylum migrants and the UK-born decreases from 22 percentage points to 12 percentage points. This nevertheless still represents a considerable employment gap, and it remains larger for asylum migrants compared to other groups. Ruiz and Vargas-Silva (2018) show that this employment gap is still present even after controlling for country of origin in the estimation (that is, comparing across individuals from the same country of origin who migrated for different reasons).

There is a similar story regarding unemployment (panel (b) of Table 3). The unemployment rate is 18% for asylum migrants, which is three times that of the UK-born. This unemployment gap with the UK-born decreases from 12 percentage points to 7 percentage points once we account for differences in socio-demographic characteristics between groups.

	3 – Estimates of employment and unemployment differences Differences with UK-born (in percentage points)		
	Mean value (%)	No controls	Controls
	(1)	(2)	(3)
		(a) Employment	
 Asylum	50.8	-21.8***	-12.0***
Employment	87.9	15.3***	11.7***
Study	68.1	-4.5***	-6.9***
Family	56.1	-16.4***	-9.7***
UK-born	72.6		
Observations	1,890,353	1,890,353	1,866,361
-		(b) Unemployment	
Asylum	18.1	11.9***	7.2***
Employment	3.8	-2.5***	-2.5***
Study	6.9	0.7***	0.1
Family	9.9	3.7***	2.6***
UK-born	6.2		
Observations	1,460,898	1,460,898	1,444,812

Table 3 – Estimates of employment and unemployment differences

Notes: *** indicates that the estimate is statistically different from that of the UK-born at the 1% level of significance. Else, the estimate is not statistically different from that of the UK-born. 2010-2017 LFS data. Columns (2) and (3) report coefficients from a regression equation. Controls in the regression include age, education, gender, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details.

A question of interest is how differences in employment rates between the UK-born and asylum migrants, as well as other migrant groups, evolve over time. Figure 7 plots estimates of these gaps for asylum and employment migrants who have been in the UK for different lengths of time, controlling for socio-demographic characteristics. In this figure, the zero line represents the UK-born. The analysis suggests that the likelihood of employment of asylum migrants converges to that of the UK-born over time. The gap starts at more than 30 percentage points, with those who have been in the UK for up to 5 years. It then decreases to below 3 percentage points when we look at cohorts who have been in the UK for 10 to 15 years. However, it takes over 25 years in the country for the gaps of asylum and employment migrants to converge.

An important caution regarding Figure 7 is that the analysis is comparing different cohorts of migrants from the same group, not the exact same migrants over time. That is, the analysis does not adjust for factors such as selective return migration to countries of origin across the different groups, a factor for which there is scarce information in the UK. In addition, the different cohorts of asylum migrants are likely to have faced different restrictions to enter the labour market. For instance, until mid-2002, those seeking asylum in the UK could apply for permission to work if they had been waiting for six months for an initial decision (Ruiz and Vargas-Silva, 2018). From mid-2002 to early 2005, this concession was eliminated and granting permission to work was at the discretion of case workers. From early 2005, asylum seekers could apply for permission to work if they had been waiting for twelve months for an initial decision on their claim (Gower, 2016). In 2010, the right to work for asylum seekers was further restricted to jobs in the Shortage Occupation List. The degree to which these policy changes affected the individuals in the sample depends on the length of time that they waited for an asylum decision (if any), but information on this is not recorded in the LFS dataset.



Notes: 2010-2017 LFS data. The figure plots coefficients from a regression with controls. Controls in the regression include age, education, gender, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details.

4.2 Hourly pay and weekly earnings

We look at how those in employment fare in the labour market in this section. Because the LFS data contains information on weekly earnings and hourly pay for employees only, the self-employed are excluded from the analysis. Section 5 of the report explores issues related to self-employment.

As reported in Table 4, asylum migrants earn an average of £9 per hour and £284 per week. This is substantially less than the other groups. The UK-born earn an average of £14 per hour and £486 per week. Furthermore, the gap in hourly pay and weekly earnings between the asylum group and the UK-born increases when we control for socio-demographic differences between the groups (column (3) of Table 4). The estimates suggest that asylum migrants have an hourly pay 38% lower than the UK-born and weekly earnings that are 55% lower.

	Moon value (f)	Differences with	UK-born (in %)
	Mean value (£)	No controls	Controls
	(1)	(2)	(3)
		(a) Hourly pay	
- Asylum	9.12	-33.9***	-37.7***
Employment	14.13	-0.3	-18.7***
Study	15.32	11.2***	-18.5***
amily	11.40	-17.1***	-26.3***
JK-born	13.69		
bservations	330,397	330,397	328,387
-		(b) Weekly earnings	
sylum	284	-47.7***	-55.0***
mployment	554	15.2***	-7.2***
tudy	556	14.1***	-17.6***
amily	377	-24.1***	-27.6***
JK-born	486		
bservations	332,738	332,738	330,668

Notes: *** indicate that the estimate is statistically different from that of the UK-born at the 1% level of significance. Else, the estimate is not statistically different from that of the UK-born. 2010-2017 LFS data. Columns (2) and (3) report coefficients from a regression equation. Controls in the regression include age, education, gender, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details.

4.3 Hours worked

The differences in weekly earnings discussed in Section 4.2 could be due, at least in part, to differences in the number of hours worked by each of the groups. The analysis suggest that,

controlling for relevant factors, those in the asylum group work, on average, 4 hours less per week than the UK-born (column 3 of Table 5). This is the largest gap among all the migrant groups.

		Differences with UK-born (hours)	
	Mean value (hours)	No controls	Controls
	(1)	(2)	(3)
Asylum	28.61	-2.842***	-3.998***
Employment	35.91	4.457***	2.876***
Study	32.29	0.834***	-0.090
Family	29.10	-2.354***	-0.684***
UK-born	31.46		
Observations	1,160,108	1,160,108	1,148,766

Notes: *** indicate that the estimate is statistically different from that of the UK-born at the 1% level of significance. Else, the estimate is not statistically different from that of the UK-born. 2010-2017 LFS data. Columns (2) and (3) report coefficients from a regression equation. Controls in the regression include age, education, gender, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details.

Table 6 shows that close to 59% of asylum migrants who are in employment are working fulltime. The corresponding figure is 64% for family migrants and 73% for the UK-born. The estimated gap in the likelihood of full-time employment between the asylum migrants and the UK-born increases to 20 percentage points once we account for socio-demographic differences across groups.

Table 6 – Estimates of differences in the likelihood of working full time			
		Differences with UK-bo	rn (percentage points)
	Mean value (%)	No controls Controls	
	(1)	(2)	(3)
Asylum	58.7	-14.4***	-19.8***
Employment	85.6	12.5***	7.6***
Study	74.2	1.1***	-1.7***
Family	64.4	-8.8***	-3.6***
UK-born	73.1		
Observations	1,365,637	1,365,637	1,350,715

Observations1,365,6371,365,6371,350,715Notes: *** indicate that the estimate is statistically different from that of the UK-born at the 1% level of
significance. Else, the estimate is not statistically different from that of the UK-born. 2010-2017 LFS data.
Columns (2) and (3) report coefficients from a regression equation. Controls in the regression include age,
education, gender, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further
details.

4.4 Occupation

A key question is whether asylum migrants in the UK do different jobs than other types of migrants and the UK-born. The Labour Force Survey includes different occupational categories, which are based on the typical skills required for the jobs. For example, occupations categorised as *professional* require 'a degree or equivalent qualification, with some occupations requiring postgraduate qualifications and/or a formal period of experience-related training', while occupations categorised as *elementary* require 'a minimum general level of education (that is, that which is acquired by the end of the period of compulsory education)' (Office for National Statistics, 2010).

Panel (a) of Table 7 shows the likelihood that those in employment in the different groups are in professional or managerial positions. Only about 10% of asylum migrants in employment are in these types of jobs. The analysis controlling for socio-demographic factors confirms that, among all groups, asylum migrants are the least likely to be in these positions, with a gap of 19 percentage points compared to the UK-born. Panel (b) of Table 7 shows the likelihood that those in employment in the different groups are in routine or elementary positions. Consistent with the previous results, asylum migrants in employment are 26 percentage points more likely to be in these positions (column 3).

		Differences with UK-bo	rn (percentage points)
	Mean value (%)	No controls	Controls
	(1)	(2)	(3)
		(a) Professional or managed	gerial
Asylum	9.5	-17.3***	-18.7***
Employment	28.7	1.8***	-11.4***
Study	41.7	14.8***	-9.3***
Family	19.7	-7.2***	-17.0***
UK-born	26.9		
Observations	1,363,458	1,363,458	1,348,758
-		(b) Routine or element	ary
Asylum	69.3	24.5***	26.0***
Employment	47.9	3.1***	15.9***
Study	36.6	-8.3***	11.9***
Family	60.6	15.7***	18.8***
UK-born	44.8		
Observations	1,363,458	1,363,458	1,348,758

Table 7 – Estimates of occupation differences

Notes: *** indicate that the estimate is statistically different from that of the UK-born at the 1% level of significance. Else, the estimate is not statistically different from that of the UK-born. 2010-2017 LFS data. Columns (2) and (3) report coefficients from a regression equation. Controls in the regression include age, education, gender, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details. The complementary set of occupations to (a) and (b) are made up of semi-professional and skilled trade occupations; the shares of employment in these three groups of occupations add up to 100%.

It is also possible to explore whether the likelihood of doing professional/managerial and routine/elementary jobs changes with length of residence in the country. This question provides insights on whether asylum migrants are acquiring valuable skills over time, relative to other migrants and the UK-born. As shown in Figure 8, shortly after arrival, the gap between employment and asylum migrants and the UK-born is similar. However, as length of residence in the country increases the gap closes for employment migrants, but not for asylum migrants.





Notes: 2010-2017 LFS data. The figure plots coefficients from a regression with controls. Controls in the regression include age, education, gender, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details.

4.5 Gender differences

One key aspect of the analysis in ECONREF is to understand gender differences across the groups. We do not include separate gender estimations for each of the variables discussed in the report for reasons of space. However, we illustrate these interesting gender dynamics using selected outcomes. Table 8 reports differences in employment, hourly pay and hours worked across genders. For instance, column 1 of panel (a) provides the average employment rates of female migrants and UK-born females. Female asylum migrants have a relatively low employment rate of 35%, compared to the one for UK-born females (69%). The estimates, controlling for socio-demographic factors, suggests that the employment gap between these two groups is 23 percentage points. On the other hand, there is a smaller, although still substantial, gap in the employment rates between male asylum migrants and UK-born males (3 percentage points).

The pattern is different when looking at hourly pay and hours worked. There is a smaller gap between female asylum migrants and UK-born females than the gap between male asylum migrants and UK-born males. In particular, female asylum migrants earn 32% less than their

UK-born counterparts (column 3, panel (b)), while male asylum migrants earn 39% less than UK-born males.

	Mean value		Differences v	vith UK-born
			(with controls)	
	Females	Males	Females Ma	
	(1)	(2)	(3)	(4)
_	(a) Employm	ent (mean indicates	5 % in employment,	differences in
		percent	tage points)	
Asylum	34.5	63.6	-23.2***	-3.1***
Employment	82.8	91.6	9.5***	13.6***
Study	64.3	72.0	-9.6***	-4.2***
Family	48.1	80.6	-15.3***	8.1***
UK-born	68.7	76.7		
Observations	991,416	898,937	979,472	886,889
_	(b) H	ourly pay (mean ind	icates £, difference	es in %)
Asylum	9.44	8.94	-32.3***	-38.8***
Employment	12.39	15.46	-18.4***	-18.5***
Study	14.43	16.19	-14.8***	-20.7***
Family	11.29	11.65	-25.4***	-29.2***
UK-born	12.14	15.41		
Observations	173,822	156,575	172,815	155,572
—	(c) Hours v	vorked (mean indica	ites hours, differen	ces in hours)
Asylum	24.15	30.95	-3.54***	-3.62***
Employment	31.57	39.16	3.32***	2.78***
Study	28.91	35.54	-0.03	0.18
Family	26.34	34.78	-1.43***	-0.10
UK-born	26.71	36.63		
Observations	602,658	557,450	597,015	551,751

Notes: *** indicate that the estimate is statistically different from that of the UK-born at the 1% level of significance. Else, the estimate is not statistically different from that of the UK-born. 2010-2017 LFS data. Columns (3) and (4) report coefficients from a regression equation. Controls in the regression include age, education, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details.

Table 9 zooms in on gender differences across occupations. Consistent with the previous results the estimates suggests that there is a somewhat smaller gap for female asylum migrants relative to the one of male asylum migrants. In this case, employed female asylum migrants are 15 percentage points less likely to be in professional or managerial positions relative to UK-born females, while employed male asylum migrants are 19 percentage points less likely to UK-born males.

	Mean v	alue (%)	Differences v	
			(with co	ontrols)
	Female	Male	Female	Male
	(1)	(2)	(3)	(4)
	(a) Prof	fessional or manag	erial positions (perc	entage points)
 Asylum	13.2	8.0	-15.3***	-19.2***
Employment	28.3	29.0	-10.0***	-12.2***
Study	39.7	43.6	-7.8***	-9.7***
Family	20.9	17.4	-16.6***	-17.4***
UK-born	25.1	28.7		
Observations	670,617	692,841	664,023	684,735
	(b) rc	outine or elementa	ary positions (percen	tage points)
 Asylum	77.2	66.0	23.5***	25.6***
Employment	57.5	41.4	16.2***	14.7***
Study	40.8	32.7	10.5***	11.5***
Family	63.7	54.8	20.8***	19.8***
UK-born	56.6	33.3		
Observations	670,617	692,841	664,023	684,735

Table 9 – Estimates of occupation differences by gender

Notes: *** indicate that the estimate is statistically different from that of the UK-born at the 1% level of significance. Else, the estimate is not statistically different from that of the UK-born. 2010-2017 LFS data. Columns (2) and (3) report coefficients from a regression equation. Controls in the regression include age, education, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details.

4.6 Regional differences

The analysis in the regressions in the report controls for local authority of residence. That is, the estimated coefficients indicate differences between asylum migrants, other migrants and UK-born individuals residing in the same local authority. In addition to these controls, it is interesting to explore whether the patterns that we observe are different across regions of the UK. Given the sample sizes, we conduct this analysis by exploring the dynamics in London and the rest of the UK separately. The results in Table 10 suggest that the gap between the asylum migrants and the UK-born is smaller in London than the rest of the UK. However, the difference across regions is relatively small.

	Mea	n value		Differences with UK-born (with controls)		
	London	Rest of the UK	London	Rest of the UK		
	(1)	(2)	(3)	(4)		
	(a) Employment (mean indicates % in employment, differences in					
		percenta	age points)			
Asylum	51.6	50.0	-11.0***	-13.8***		
Employment	86.9	88.3	12.3***	11.2***		
Study	72.3	65.3	-0.9***	-11.0***		
Family	52.4	57.7	-12.1***	-8.9***		
UK-born	71.1	72.7				
Observations	195,806	1,694,547	192,553	1,673,808		

Table 10 – Estimated differences in employment for London and rest of the UK

Observations195,8061,694,547192,5531,673,808Notes: *** indicate that the estimate is statistically different from that of the UK-born at the 1% level of significance. Else, the estimate is not statistically different from that of the UK-born. 2010-2017 LFS data.Columns (3) and (4) report coefficients from a regression equation. Controls in the regression include age, education, gender, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details.

5. Self-employment

Self-employment can be an alternative source of income to individuals who have at a disadvantage in the labour market (i.e. have lower salaries and/or fewer opportunities). Given the substantial labour market disadvantage of asylum migrants discussed in the previous section, it is particularly likely that members of this group may have a strong incentive to rely on self-employment. A number of studies have explored the role of ethnicity in self-employment patterns across subgroups of the UK population (Clark and Drinkwater, 2000, Levie, 2007). However, the link between self-employment and reason for immigration, and the role of migration for asylum reasons in particular, remains largely unexplored. This section examines these connections by looking at propensities of self-employment among the employed, across the different groups. This means that the estimates are all conditional on being in employment. Please refer to the Appendix for technical details about the estimations. Those interested in an extended discussion of these differences in self-employment may refer to Kone et al. (2019).

5.1 Likelihood of self-employment

Table 11 reports estimates of the likelihood of being self-employed across the different groups. In total, 21% of the asylum migrants in employment are self-employed. This is a substantially higher share than that of the UK-born and the other migrant groups. Asylum migrants remain 8 percentage points more likely to be in self-employment than the UK-born even after including controls in the estimations.

Kone et al. (2019) suggest that asylum migrants living close to compatriot networks in the UK have an even higher likelihood to enter into self-employment compared to employment

migrants. The evidence from other countries suggests that compatriot concentration at the local level may affect the likelihood of engaging in self-employment for several reasons, including possible consumer discrimination (Borjas and Bronars, 1989). For instance, consumers could prefer buying goods and/or services from compatriots due to unobserved reasons such as perceived quality or reliability. In addition, self-employment often depends on the availability of capital, and access to compatriot networks may alleviate constraints to accessing finance (Martín-Montaner et al., 2018; Volery, 2007).

	Estimates of unfere	inces in the likelihood of s	
	Mean value	Differences with UK-bo	rn (percentage points)
	(%)	No controls	Controls
	(1)	(2)	(3)
Asylum	21.2	7.8***	7.9***
Employment	14.6	1.2***	1.4***
Study	14.1	0. 6***	1.7***
Family	16.0	2.5***	3.8***
UK-born	13.5		
Observations	1,368,720	1,368,720	1,353,615

Table 11 – Estimates of differences in the likelihood of self-employment

Notes: *** indicate that the estimate is statistically different from that of the UK-born at the 1% level of significance. Else, the estimate is not statistically different from that of the UK-born. 2010-2017 LFS data. Columns (2) and (3) report coefficients from a regression equation. Controls in the regression include age, education, gender, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details.

Figure 9 plots estimates of the gap in self-employment between asylum and employment migrants who have been in the UK for different lengths of time, controlling for sociodemographic characteristics. The zero line represents the UK-born. The analysis suggests that for the first decade of residence in the UK, both groups have a similar likelihood of self-employment compared to the UK-born. This is expected as the evidence suggests that while some migrants move to a country to become self-employed and/or entrepreneurs, most move for other reasons and engage in these activities after several years of residence in the host country (Kerr and Kerr, 2017). In fact, the likelihood increases substantially for asylum migrants over time before gradually declining to the level of the UK-born. This increasing reliance in self-employment over time could relate to the scarcity of opportunities for waged employment experienced by asylum migrants are 10 percentage points more likely to be in self-employment than the UK-born.



Figure 9 – Self-employment gap and length of residence

Notes: 2010-2017 LFS data. The figure plots coefficients from a regression with controls. Controls in the regression include age, education, gender, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details.

5.2 Characteristics of self-employment

Table 12 explores differences in the likelihood of having employees and the number of workers employed among those engaged in self-employment. The second column of the table shows that asylum migrants are 6 percentage points *more* likely to have employees than the UK-born. This difference decreases to 2.4 percentage points once we account for socio-demographic characteristics. This is noteworthy given that all other migrant groups are *less* likely than the UK-born to have employees.

The results in Panel (b) indicate that asylum migrants are less likely than the UK-born to have more than 10 employees. Although there might be differences by industry and other definitions, in general, a business of 10 or fewer employees is considered to be a small business (vs a medium/large business). Put together, these two results suggest that asylum migrants are more likely than other groups to have employees, but that they are also more likely to have a relatively small business.

	Mean value (%)	Differences with UK-born (percentage point	
	ivieali value (70)	No controls	Controls
	(1)	(2)	(3)
		(a) Has employee(s)	
Asylum	24.1	6.1***	2.4*
Employment	13.8	-4.2***	-3.8***
Study	20.6	2.6***	-2.1***
Family	17.0	-1.0**	-4.1***
UK-born	18.0		
Observations	187,338	187,338	184,943
_		(b) Has more than 10 empl	oyees
Asylum	2.0	-2.4***	-3.0***
Employment	3.0	-1.5***	-2.8***
Study	4.5	0.1	-3.5***
Family	2.2	-2.3***	-3.3***
UK-born	4.5		
Observations	187,032	187,032	184,670

Table 12 – Estimates of differences in the likelihood of having employees

Notes: ***, **, * indicate that the estimate is statistically different from that of the UK-born at the 1%, 5% and 10% level of significance, respectively. Else, the estimate is not statistically different from that of the UK-born. 2010-2017 LFS data. Columns (2) and (3) report coefficients from a regression equation. Controls in the regression include age, education, gender, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details.

6. Job search methods

As shown in Section 4, asylum migrants have a greater likelihood of unemployment than other migrant groups and the UK-born. Our particular interest in this section concerns the job search methods of the different groups of migrants. We therefore focus on individuals who are unemployed, that is, those not currently in employment who are looking for a job. The analysis looks at five possible main job search methods: public agencies (e.g. job centres), private agencies, advertisements (ads), direct inquiries with employers, and networks (i.e. using friends and family).

Differences in job search behaviours can partly explain why migrants coming via particular routes integrate faster than others into the labour market, as each search method gives access to a particular pool of jobs (Weber and Mahringer, 2008). Different job search methods also vary in their effectiveness, with public employment agencies being typically less effective and networks more effective in leading to employment (Addison and Portugal, 2002). As suggested by Daneshvary et al. (1992), the real test of labour market integration might pertain to the process of job search, and the convergence of earnings might just be the result of this process.

6.1 Main job search methods

Table 13 presents the share of unemployed individuals that use a given job search method as their main method. Asylum migrants are substantially more likely than others to rely on public agencies: 37% of unemployed asylum migrants relied on this method compared to just 18% of the UK-born. On the other hand, only 42% of asylum migrants relied on ads as their main search method, compared with 62% of the UK-born.

	Table 13 –	Share using	a given r	nain job searcł	n method	
		Main job	search m	nethod (%)		
	Public agency	Private agency	Ads	Contacting employer	Network	Observations
	(1)	(2)	(3)	(4)	(5)	
Asylum	36.9	3.3	42.1	7.9	7.2	1,084
Employment	21.4	9.0	51.2	7.4	8.2	2,182
Study	9.0	5.3	67.5	8.3	5.1	1,427
Family	15.1	5.1	59.0	7.9	9.4	3,408
UK-born	18.3	2.5	62.3	8.2	5.0	68,173

Notes: 2010-2017 LFS data. Row sums do not add up to 100 due to omitting the "other" category of job search method.

The results in Table 14 indicate that even after controlling for other relevant factors, asylum migrants are 17 percentage points more likely to rely on public agencies and 21 percentage points less likely to rely on ads than the UK-born. In both cases, the asylum migrant group has the largest difference with the UK-born.

	N	lain job search met	thod (percen	tage points)	
	Public agency	Private agency	Ads	Contacting employer	Network
	(1)	(2)	(3)	(4)	(5)
	_	(a)	No controls		
Asylum	18.6***	0.8	-20.3***	-0.3	2.2***
Employment	3.1***	6.5***	-11.1***	-0.8	3.2***
Study	-9.3***	2.8***	5.1***	0.1	0.1
Family	-3.3***	2.6***	-3.4***	-0.3	4.4***
Observations	77,153	77,153	77,153	77,153	77,153
		(b) Controls		
Asylum	16.6***	0.5	-20.7***	2.4**	1.7*
Employment	8.1***	4.8***	-17.2***	1.8***	3.4***
Study	1.1	0.8	-5.6***	1.8**	1.1*
Family	3.1***	1.5***	-11.3***	1.8***	5.0***
Observations	76,365	76,365	76,365	76,365	76,365

Table 14 – Estimates of differences in the share using a given main job search method

Notes: ***, **, * indicate that the estimate is statistically different from that of the UK-born at the 1%, 5% and 10% level of significance, respectively. Else, the estimate is not statistically different from that of the UK-born. 2010-2017 LFS data. Columns (1) to (5) report coefficients from a regression equation. Controls in the regression include age, education, gender, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details.

6.2 Job search methods and employment outcomes

The results in Section 6.1 suggest that asylum migrants are substantially more likely than other migrants to rely on public agencies. In order to explore the potential implications of this for employment outcomes, this section explores which methods lead to employment among those who recently started a new job (by group). The results in panel (b) of Table 15 suggest that asylum migrants are as likely to get jobs via public agencies as the UK-born. This is noteworthy given that asylum migrants are much more likely to use these agencies than the UK-born and provides suggestive evidence that public agencies deliver limited success as a job search method for asylum migrants. On the other hand, despite the fact that asylum migrants are 21 percentage points less likely to use job ads to find a job, they are only 8 percentage points less likely to get a job via this method. This is indicative evidence that this method is more effective.

In order to explore this further, Table 16 estimates the likelihood that the main search method was the one which led to employment for each of the groups. We can follow unemployed individuals for five consecutive quarters. For those who found employment during that period, we have information on their job search methods as well as the method that led to employment. The regression results suggest that those in the asylum group are 12 percentage points less likely to find employment via their main job search method compared to the UK-born. This is a larger mismatch than that of the other migrant groups.

		method			
	Ν	lain job search met	thod (percen	tage points)	
	Public agency	Private agency	Ads	Contacting employer	Network
	(1)	(2)	(3)	(4)	(5)
		(a)	No controls		
Asylum	2.1**	3.0***	-11.7***	-1.0	8.8***
Employment	1.2***	7.9***	-7.6***	-1.5***	0. 2
Study	-0.8**	1.8***	-0.2	2.5***	-4.8***
Family	1.1***	4.2***	-4.0***	-1.3**	2.3***
Observations	177,304	177,304	177,304	177,304	177,304
		(b) Controls		
Asylum	-0.4	1.5	-8.2***	-0.9	9.9***
Employment	1.9***	6.1***	-8.5***	-2.2***	4.4***
Study	0.4	0.5	-3.2***	-0.2	3.2***
Family	1.8***	3.5***	-6.6***	-2.1***	6. 7***
Observations	175,837	175,837	175,837	175,837	175,837

Table 15 – Estimates of differences in the likelihood of finding a job via a given search method

Notes: *** (**) indicate that the estimate is statistically different from that of the UK-born at the 1% (5%) level of significance. Else, the estimate is not statistically different from that of the UK-born. 2010-2017 LFS data. Columns (1) to (5) report coefficients from a regression equation. Controls in the regression include age, education, gender, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details.

Table 16 – Estimates of differences in the likelihood that the search method that led to employment is the main job search method

	Percentage	e points
	No controls	Controls
	(1)	(2)
Asylum	-10.1**	-11.6**
Employment	-4.9*	-4.8*
Study	4.3	2.6
Family	0.5	0.2
Observations	10,326	9,979

Notes: ** (*) indicate that the estimate is statistically different from that of the UK-born at the 5% (1%) level of significance. Else, the estimate is not statistically different from that of the UK-born. 2010-2017 LFS data. Columns (1) and (2) report coefficients from a regression equation. Controls in the regression include age, education, gender, ethnicity, local authority, quarter, and year dummies. See the Appendix for further details.

7. Health outcomes

This section explores the interaction of health and labour market outcomes for the different migrant groups. Health status could be a key difference between asylum migrants and other migrants and could therefore be a potential explanation for a portion of the substantial gap in labour market outcomes. While there is a large literature exploring the health outcomes of migrants in the United Kingdom, including several studies focusing on refugees (Turner et al., 2003; Warfa et al., 2006), studies comparing refugees with other migrant groups are scarce. For an extended discussion of these health differences, please refer to Giuntella et al. (2018).

7.1 Long-term health conditions

Table 17 reports the likelihood of having a long-term health condition, defined as *a condition that is expected to last over 12 months*. The literature on this topic has repeatedly shown that migrants are healthier than the UK-born and the results confirm this previous finding for all groups except for asylum migrants. The differences are substantial. While asylum migrants are 4 percentage points *more* likely to report a health problem than the UK-born, employment migrants are 10 percentage points *less* likely to do so (column 3 of Table 17).

Giuntella et al. (2018) show that asylum migrants have poorer health outcomes than the UKborn in the first years of residence in the country and that this gap remains present for decades. On the contrary, other migrant groups have better health outcomes than the UKborn in the first years of residence and their health outcomes converge to those of the UKborn over time. Giuntella et al. (2018) also show that the overall health differences are similar if the analysis controls for country of origin (that is, comparing across individuals from the same country of origin who migrated for different reasons).

	Maan value (%)	Differences with UK-born (percentage points)	
	Mean value (%)	No controls	Controls
	(1)	(2)	(3)
Asylum	37.3	4.6***	3.8***
Employment	16.6	-16.1***	-9.7***
Study	15.1	-17.6***	-6.1***
Family	25.8	-6.9***	-5.5***
UK-born	32.7		
Observations	1,881,781	1,881,781	1,860,605

Table 17 – Estimates of differences in the likelihood of having a long-term health condition
--

Notes: *** indicate that the estimate is statistically different from that of the UK-born at the 1% level of significance. Else, the estimate is not statistically different from that of the UK-born. 2010-2017 LFS data. Columns (2) and (3) report coefficients from a regression equation. Controls in the regression include age, education, gender, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details.
7.2 Health conditions and economic activities

Table 18 suggests that close to a quarter of the asylum migrants report that they have a health condition that limits the number of hours that they can work and the type of work that they can engage in. The analysis controlling for socio-demographic factors suggests that asylum migrants are 9 percentage points more likely than the UK-born to report having a health condition that affects the number of hours that they can work. In comparison, employment migrants are 3 percentage points less likely than the UK-born to report this.

Ruiz and Vargas-Silva (2018) suggest that health status is one of the key variables explaining the labour market outcomes of individuals in the UK. Their estimates suggest that those reporting a long-term health problem are 19 percentage points less likely to be in employment and earn 9% less per week. However, they also show that the labour market gaps estimated above between asylum migrants and others do not disappear after controlling for health status.

		activities				
	Mean value (%)	Differences with UK-born (percentage points)				
		No controls	Controls			
	(1)	(2)	(3)			
		(a) Problem limits work h	nours			
Asylum	24.7	10.9***	9.0***			
Employment	6.5	-7.3***	-2.9***			
Study	5.1	-8.7***	-0.7***			
Family	13.1	-0.6***	0.5***			
UK-born	13.8					
Observations	1,881,781	1,881,781	1,860,605			
_		(b) Problem limits work type				
Asylum	25.7	10.0***	8.3***			
Employment	7.1	-8.6***	-3.9***			
Study	5.6	-10.1***	-1.6***			
Family	14.0	-1.7***	0.9***			
UK-born	15.7					
Observations	1,881,781	1,881,781	1,860,605			

Table 18 – Estimates of differences in the impact of health problems on economic activities

Notes: *** indicate that the estimate is statistically different from that of the UK-born at the 1% level of significance. Else, the estimate is not statistically different from that of the UK-born. 2010-2017 LFS data. Columns (2) and (3) report coefficients from a regression equation. Controls in the regression include age, education, gender, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details.

7.3 Particular health conditions

For policy interventions related to health issues of the asylum migrants, it is important to understand whether the health problems that affect this group are different from those affecting other migrant groups and the UK-born. Table 19 reports the long-term conditions that affect the different groups. Of those in the asylum group with a long-lasting condition, 38% reported problems with arms and/or legs, 35% problems with back and/or neck, 29% reported cardiovascular problems, and 25% reported mental health problems.

	Long-lasting health condition (%)					
	Arms and/or	Back and/or	Sensory	Skin	Cardiovascular	
	legs	neck	Sensory	condition	Cardiovascular	
Asylum	38.0	34.5	9.2	4.8	28.7	
Employment	24.8	24.7	6.4	6.4	27.6	
Study	21.2	18.7	6.5	8.7	26.1	
Family	32.5	27.2	8.0	6.0	31.0	
UK-born	31.3	25.1	10.5	8.9	26.0	
	Gastrointestinal	Diabetes	Mental	Progressive	Breathing	
Asylum	17.1	17.7	24.6	3.6	15.7	
Employment	11.3	15.4	11.9	4.1	14.0	
Study	11.0	14.5	14.8	4.1	15.6	
Family	12.8	18.3	15.9	4.1	16.0	
UK-born	14.2	9.6	23.0	5.7	22.6	

Table 19 – Share reporting a given health condition among those with a health problem

Notes: 2010-2017 LFS data.

The asylum migrants differ substantially from the UK-born and other migrants in their likelihood to report these conditions. The incidence of mental health is noteworthy as not only it is a problem frequently reported in qualitative studies but also there is a substantial difference with other migrants. As reported in Table 20, even after controlling for relevant socio-demographic differences, asylum migrants are 3 percentage points *more* likely to report a mental health condition than the UK-born. In contrast, employment migrants are 7 percentage points *less* likely than the UK-born to report mental health problems.

Long-lasting health condition (percentage points, with controls)						
	Arms and/or legs	Back and/or neck	Sensory	Skin condition	, Cardiovascular	
	(1)	(2)	(3)	(4)	(5)	
Asylum	6.7***	11.0***	-1.3***	-4.1***	-2.2***	
Employment	-1.2***	4.6***	-3.0***	-2.3***	1.9***	
Study	0.2	2.4***	-1.7***	-0.9**	2.1***	
Family	-0.3	2.0***	-1.9***	-3.1***	1.9***	
Observations	585,811	585,811	585,811	585,811	585,811	
	Gastrointestinal	Diabetes	Mental	Progressive	Breathing	
	(6)	(7)	(8)	(9)	(10)	
Asylum	4.6***	3.4***	2.9***	-1.1***	-8.8***	
Employment	-1.0***	3.6***	-6.8***	-1.0***	-7.9***	
Study	0.0	3.4***	-0.8	-0.6*	-7.0***	
Family	-0.5*	2.5***	-4.1***	-1.2***	-6.7***	
Observations	585,811	585,811	585,811	585,811	585,811	

Table 20 – Estimates of differences in the likelihood of reporting a given condition among those with a health problem

Notes: *** (*) indicate that the estimate is statistically different from that of the UK-born at the 1% (10%) level of significance. Else, the estimate is not statistically different from that of the UK-born. 2010-2017 LFS data. Columns (1) to (10) report coefficients from a regression equation. Controls in the regression include age, education, gender, ethnicity, local authority, quarter and year of survey dummies. See the Appendix for further details.

8. Final remarks

The findings in this report suggest that there are substantial labour market outcome gaps between asylum migrants and the UK-born/other migrants. In light of this, several aspects can benefit from further attention from academics and policymakers. First, asylum migrants are substantially more likely to report having long-lasting health problems than the UK-born and other migrants, and to report that these conditions affect their ability to work. Policy interventions which intend to improve the labour market integration of this group should take this into consideration. For instance, from a policy perspective, it might be effective, when allocating funding geared towards the economic integration of asylum migrants, to first address health issues that impede labour market performance. The reasons behind these health gaps can be also the subject of further research. Asylum migrants often experience traumatic events before arriving in the host country, many of which can have significant effects on future physical and mental health (e.g. malnutrition, trauma resulting from exposure to violence). However, factors after arrival in the host country can also play an important role. For instance, in the UK, asylum seekers face lengthy legal restrictions to access the labour market while their claim is being evaluated. This period of inactivity and uncertainty can have adverse long-term consequences for mental health. Future research might be able to provide insights on the relative importance of pre-arrival and post-arrival factors in affecting the health of asylum migrants and their posterior labour market outcomes.

Second, asylum migrants have a greater likelihood of being self-employed compared to the UK-born and other migrant groups – and are also more likely to employ other people. The greater tendency to enter self-employment can relate to positive factors such as greater entrepreneurial ambition, but also to negative ones such as lack of opportunities in the labour market due to discrimination. Future research can provide insights on the relative importance of these different factors. From the policy perspective, it is interesting that asylum migrants in self-employment are more likely to have a small business (vs medium/large) than the other groups. One possible reason for this could be lack of access to finance in order to expand the business. Policy interventions directed at boosting entrepreneurial potential among asylum migrants (or the migrant population in general) should consider this factor.

Third, the analysis suggests that unemployed asylum migrants rely heavily on public agencies (e.g. job centres) for their job searches. At the same time, it seems that the use of these agencies is not particularly effective in delivering jobs for this group. The high reliance on public agencies could relate to the level and type of assistance provided to asylum migrants (while they are asylum seekers and after obtaining protection). Exploring these issues closely could reduce dependence on public agencies or help understand how these agencies could serve asylum migrants more effectively.

9. More information

There are several academic papers written by the authors of this report that provide further insights on all the issues discussed in it (see Giuntella et al. 2018, Kone et al., 2019; Ruiz and Vargas-Silva, 2017; 2018). In addition, there are multiple qualitative and smaller sample studies which have provided important insights on issues related to refugees in the UK (e.g. Allsopp et al., 2014; Bakker et. al, 2016; Bloch, 2004, 2007; Gibney, 2008; Gower, 2016; Phillimore and Goodson, 2006; Platts-Fowler and Robinson, 2015; Stewart, 2012; Warfa et al., 2006; Zetter et al., 2005). While only limited discussion of these interesting insights is contained in this report for reasons of space, this literature has informed the overall approach of ECONREF and readers are encouraged to engage with it. Finally, NGOs working with asylum seekers and refugees have also produced reports than can be of interest to readers (e.g. Lift the Ban Coalition, 2018; Refugee Council, 2017). More information can also be found in The Economics of Forced Migration website: www.econforced.com

References

Addison, J. T., and Portugal, P. (2002). Job search methods and outcomes. Oxford Economic Papers, 54: 505-533.

Allsopp, J., Sigona N., and Phillimore, J. (2014). Poverty among refugees and asylum seekers in the UK: An evidence and policy review. IRIS Working Paper Series, No. 1/2014.

Bakker, L., Cheung S. Y., and Phillimore, J. (2016). The asylum-integration paradox: comparing asylum support systems and refugee integration in the Netherlands and the UK. International Migration, 54: 118–132.

Bhu,i K., Abdi, A., Abdi, M., Pereira, S., Dualeh, M., Robertson. D., Sathyamoorthy, G., andIsmail H. (2003). Traumatic Events, Migration Characteristics and Psychiatric Symptoms among Somali Refugees--Preliminary Communication. Social Psychiatry and Psychiatric Epidemiology, 38: 35–43.

Blinder, S., Ruhs, M. and Vargas-Silva, C. (2011). Thinking Behind the Numbers: Understanding Public Opinion on Immigration in Britain. Migration Observatory Report, University of Oxford.

Bloch, A. (2004). Labour market participation and conditions of employment: a comparison of minority ethnic groups and refugees in Britain. Sociological Research Online, 9(2).

Bloch A. (2007). Refugees in the UK labour market: the conflict between economic integration and policy-led labour market restriction. Journal of Social Policy, 37: 21–36.

Borjas, G.J. (1982). The earnings of male Hispanic immigrants in the United States. Industrial and Labor Relations Review, 35: 343-353.

Borjas, G.J. (1987). Self-selection and the earnings of immigrants. The American Economic Review, 77: 531–553.

Borjas, G. J. and Bronars, S. G. (1989). Consumer discrimination and self-employment. Journal of Political Economy, 97: 581-605.

Cafferty P.S.J., Chiswick B.R., Greeley A.M., Sullivan, T.A. (1983). The dilemma of American immigration: Beyond the Golden Door. Transaction Publishers.

Cheung SY, Phillimore J. (2014). Refugees, social capital, and labour market integration in the UK. Sociology, 48: 518–536.

Chin, A. (2005). Long-run labor market effects of Japanese American internment during World War II on working-age male internees. Journal of Labor Economics, 23: 491-525.

Chiswick, B.R. (1999). Are immigrants favorably self-selected? The American Economic Review, 89: 181–185.

Clark, K. and Drinkwater, S. (2000). Pushed in or pulled out? Self-employment among ethnic minorities in England and Wales. Labour Economics, 7: 603-628.

Clark, K., and Lindley, J. (2009). Immigrant assimilation pre and post labour market entry: Evidence from the UK Labour Force Survey. Journal of Population Economics, 22: 175-198.

Constant, A. and Zimmermann, K. (2005). Legal status at entry, economic performance, and self-employment proclivity: A bi-national study of immigrants. IZA Discussion Paper 1910.

Cortes, K.E. (2004). Are refugees different from economic immigrants? Some empirical evidence on the heterogeneity of immigrant groups in the United States. The Review of Economics and Statistics, 86: 465–480.

Daneshvary, N., Herzog Jr, H. W., Hofler, R. A., and Schlottmann, A. M. (1992). Job search and immigrant assimilation: An earnings frontier approach. The Review of Economics and Statistics, 74: 482-492.

Drinkwater, S., Eade, J., and Garapich, M. (2009). Poles apart? EU enlargement and the labour market outcomes of immigrants in the United Kingdom. International Migration, 47: 161-190.

Dustmann, C. and Fabbri, F. (2003). Language proficiency and labour market performance of immigrants in the UK. Economic Journal, 113: 695–717.

Fransen, S., Ruiz, I. and Vargas-Silva, C. (2017). Return migration and economic outcomes in the conflict context. World Development, 95: 196–210.

Gibney M. J. (2008). Asylum and the expansion of deportation in the United Kingdom. Government and Opposition , 43: 146–167.

Giuntella, O., Kone, Z., Ruiz, I. and Vargas-Silva, C. (2018). Reason for immigration and immigrants' health. Public Health, 158: 102-109.

Gower M. (2016). Should asylum seekers have unrestricted rights to work in the UK? Briefing Paper, 1908. House of Commons Library.

Home Office (2015). Syrian Vulnerable Person Resettlement (VPR) Programme. Guidance for Local Authorities and Partners. Home Office: London.

Home Office (2018). Immigration Statistics, year ending December 2018. Available at: https://www.gov.uk/government/publications/immigration-statistics-year-ending-december-2018/how-many-people-do-we-grant-asylum-or-protection-to

Kerr, S.P. and Kerr, W.R. (2017). Immigrant entrepreneurship. Harvard Business School, Working Paper 17-011.

Kone, Z., Ruiz, I. and Vargas-Silva, C. (2019). Self-employment and reason for immigration. Social Science Research Network.

Levie, J.D. (2007). Immigration, in-migration, ethnicity and entrepreneurship in the United Kingdom. Small Business Economics, 28: 143–169.

Lift the Ban Coalition (2018). Lift the ban: Why people seeking asylum should have the right to work. Lift the Ban Coalition Report.

Martín-Montaner, J., Serrano-Domingo, G. and Requena-Silvente, F. (2018). Networks and self-employed migrants. Small Business Economics, 51: 735-755.

Office for National Statistics. (2010). SOC2010 volume 1: structure and descriptions of unit groups. Available at: https://www.ons.gov.uk/methodology/classificationsandstandards/standardoccupationalclasificationsoc/soc2010/soc2010volume1structureanddescriptionsofunitgroups

Office for National Statistics. (2018) Social Survey Division, Northern Ireland Statistics and Research Agency. Central Survey Unit. Quarterly Labour Force Survey, 1992-2018: Secure Access. [data collection]. 13th Edition. UK Data Service. SN: 6727, http://doi.org/10.5255/UKDA-SN-6727-14

Phillimore J. and Goodson L. (2006). Problem or opportunity? Asylum seekers, refugees, employment and social exclusion in deprived urban areas. Urban Studies, 43: 1–22.

Platts-Fowler D. and Robinson D. (2015). A place for integration: refugee experiences in two English cities. Population, Space and Place, 21: 476–491.

Refugee Council (2017). Refugees without refuge: Findings from a survey of newly recognised refugees. Refugee Council Report.

Ruiz, I. and Vargas-Silva, C. (2017). Are refugees' labour market outcomes different from those of other migrants? Evidence from the United Kingdom in the 2005–2007 Period. Population, Space and Place, 23: e2049.

Ruiz, I. and Vargas-Silva, C. (2018). Differences in labour market outcomes between natives, refugees and other migrants in the UK. Journal of Economic Geography, 18: 855-885.

Stewart ES. (2012). UK dispersal policy and onward migration: mapping the current state of knowledge. Journal of Refugee Studies, 25: 25–49.

Turner, S.W., Bowie, C., Dunn, G., Shapo, L., and Yule, W. (2003). Mental health of Kosovan Albanian refugees in the UK. The British Journal of Psychiatry, 182: 444-448.

Volery, T. (2007). Ethnic entrepreneurship: A theoretical framework. Handbook of Research on Ethnic Minority Entrepreneurship, 1: 30-41.

Warfa N., Bhui K., Craig T., Curtis S., Mohamud S., Stansfeld S., McCrone P., Thornicroft G. (2006). Post-migration geographical mobility, mental health and health service utilisation among Somali refugees in the UK: a qualitative study. Health & Place, 12: 503–515.

Weber, A., and Mahringer, H. (2008). Choice and success of job search methods. Empirical Economics, 35: 153-178.

Zetter R, Griffiths D, and Sigona N. (2005). Social capital or social exclusion? The impact of asylum-seeker dispersal on UK refugee community organizations. Community Development Journal, 40: 169–181.

Technical appendix

A.1 The LFS and its limitations

The analysis in this report is based on data from the UK's quarterly Labour Force Survey (LFS). The LFS is the UK's largest sample survey and it is intended to be representative of the population. Whilst primarily designed for looking at labour market related issues such as quarterly employment figures, the survey also collects information on a broad range of sociodemographic factors. The data used are from the first quarter of 2010 through to the fourth quarter of 2017 (32 quarters total). The selection of this period is due to the fact that it was not until 2010 that the LFS included a question which asks foreign-born respondents about their main reason for migrating to the UK continuously in every quarterly survey, and full data for 2018 were not yet available at the time of writing this report. Respondents born outside the UK broadly have the following categories to choose from as their main reason for migrating to the UK: (1) employment; (2) study; (3) family re-unification; (4) asylum; (5) visit; and (6) other. We have grouped (5) and (6) into one for the purpose of the analysis. Although statistics on these two groups are presented in the overview section, we do not refer to them in the remaining discussion.

While the LFS is intended to be representative of the UK's population, it has some limitations. For example, the survey does not capture those who do not live in private households, such as in hotels, caravan parks and other communal establishments. In addition, recently arrived foreign-born residents of the UK are likely to be underrepresented. It is also worth noting that the reasons for migration we have used in our analysis are those reported by respondents and do not necessarily represent their current migration status in the UK. Relatedly, respondents only report one reason for immigration to the UK, although this does not exclude the possibility that someone could migrate for multiple reasons.

The overview of the demography in 2017 (Section 1) covers all ages, but the regression analyses are restricted to individuals between the ages of 16 and 64. This is because the latter analyses mostly pertain to individuals of working age. The definitions and samples used in these analyses are outlined below.

A.2 Definitions

- 1. Employed: individuals working as an employee, unpaid family worker, those on a government employment and training programme, or those working as self-employed.
- 2. Self-employed: those who work on their own account they may or may not have employees working for them.
- 3. Unemployed: those of working age who were not in employment, carried out activities to seek employment in a recent period (comprising the previous 4 weeks) and were currently available to take up employment. Note that this definition differs from someone who is just not in employment, a category that includes those who do not have a job and are not looking for one.

- 4. Economically active: those who are either in employment or who are unemployed. Someone who is not economically active is said to be economically inactive.
- 5. Woking part-time: someone who works less than 35 hours a week.
- 6. Job search methods: respondents currently seeking employment are asked to list their job search methods and indicate the main method used. Also, respondents who have been with their current employer for less than a year are asked which job search method led to obtaining their current job. We group these job search methods into the following six categories: using public agencies, using private agencies, responding to ads, directly contacting employers, using networks, and others. The detailed constituents of these categories are reported in Table A3.
- 7. Health condition: we use responses to following questions as indicative of whether an individual has a health condition that affects their economic activities: (1) "Do you have any health problems or disabilities that you expect will last for more than a year?"; (2) "Does this health problem affect the kind of paid work that you might do?"; and (3) "Does this health problem affect the amount of paid work that you might do?". Questions (2) and (3) are asked of the economically active who responded yes to question (1). We consider responding "yes" to (1) as having a long-lasting condition; responding "yes" to (2) as having health condition that affect work type; and responding "yes" to (3) as having health condition that affect work hours.

Respondents with a long-lasting health problem (i.e. those who answered yes to question (1)) are asked to specify whether they were suffering from any the following 12 health problems:

- (a) Cardiovascular (including heart, blood pressure, blood circulation, other)
- (b) Respiratory (including breathing problems, asthma, bronchitis, other)
- (c) Diabetes
- (d) Mental (including phobias, panics, depression, bad nerves, anxiety, other)
- (e) Back and/or neck
- (f) Sensory (e.g. seeing, hearing, speaking, other)
- (g) Skin (severe disfigurement, skin conditions, allergies, other)
- (h) Gastrointestinal (stomach, liver, kidney, digestive, others)
- (i) Arms/legs (arms, hands, legs, feet, includes arthritis or rheumatism)
- (j) Epilepsy
- (k) Learning difficulties
- (I) Progressive (cancer, multiple sclerosis, symptomatic HIV, Parkinson's disease, muscular, other)

A.3 Conditional versus unconditional differences

It is possible to compare various outcomes across UK-born and asylum migrants (or any other migrant group) by looking at how the mean values of these outcomes differ across groups. There are, however, various socio-demographic characteristics that would be correlated with

being an asylum migrant and the particular outcome of interest. If this is not accounted for, it is possible to over-estimate or under-estimate the difference between the groups. For example, if most asylum migrants are younger than the UK-born and still in education, they would by implication face a relative lower rate of employment. One way to address this is to use a multi-variate analysis which accounts for socio-demographic factors such as age, education, ethnicity and gender. Section A.4 outlines how we do this.

A.4 Regression equations

We start the analysis by estimating the following equation:

$$y_{i,t} = \alpha + \beta_1 Asylum_{i,t} + \beta_2 Employment_{i,t} + \beta_3 Study_{i,t} + \beta_4 Family_{i,t} + \beta_5 Other_{i,t} + \varepsilon_{i,t}$$
(1)

y denotes our outcome of interest, which ranges from being in employment to main job search method. These outcomes and the sample used for the estimations are detailed in Table A1. Our key independent variables of interest are dummies capturing reason for migrating to the UK amongst the foreign-born. These are *asylum, employment, study, family* and *other*; they respectively take the value of 1 if the foreign-born individual indicates having migrated to the UK for the corresponding reason. In all estimations the base category is UK-born, such that β_1 , β_2 , β_3 , β_4 , β_5 provides estimated differences in mean outcomes between the UKborn and the migrant groups of interest and allow us to test if these differences are statistically significant.

To account for socio-demographic factors, we also estimate the following equation:

$$y_{i,t} = \alpha + \beta_1 Asylum_{i,t} + \beta_2 Employment_{i,t} + \beta_3 Study_{i,t} + \beta_4 Family_{i,t} + \beta_5 Other_{i,t} + \beta_6 LA_{i,t} + \beta_7 Quarter_t + \beta_8 Year_t + \theta X_{i,t} + \varepsilon_{i,t}$$
(2)

X stands for the socio-demographic controls we include in the estimation: age, education, gender and ethnicity. *LA* accounts for local authority of residence. *Quarter* accounts for the quarter of survey the observation comes from. *Year* accounts for the year of survey the observation comes from.

Outcome of interest	Sample
Probability of being employed	All those of working age
Probability of being unemployed, given active	All those of working age who are economically active
Probability of self-employment, given employed	All those of working age in employment
Probability of working full-time, given an employee	All those of working age in employment
Earnings (annual, weekly and hourly)	All employees of working age, data from waves 1 & 5 only
Hours worked	All employees of working age
Occupation of employment	All employees of working age
Long lasting health problem	All those of working age
Whether long-lasting problem limits activities (hours worked/type of work)	All those of working age
Specific long-lasting health problem	All those of working age with a long lasting health problem
Main search method	All those of working age who are unemployed
Search method that led to employment	Recent employees - i.e. those who have been with current employer for at most a year
Efficiency of job search method	Recent employees - i.e. those who have been with current employer for at most a year

Table A1: Description of samples used in the regression analyses

SOC 2010 2-digit occupations	Skill leve			
Managerial and professional				
Corporate managers and directors	4			
Science, research, engineering and technology professionals	4			
Health professionals	4			
Teaching and educational professionals	4			
Business, media and public service professionals	4			
Routine and elementary				
Administrative	2			
Secretarial and related	2			
Caring personal service	2			
Leisure, travel and related personal service	2			
Sales	2			
Customers service	2			
Process, plant and machine operatives	2			
Transport and mobile machine drivers and operatives	2			
Elementary trades and related	1			
Elementary administrative and service	1			

Table A2: Occupational grouping and corresponding skill levels

Source: Office for National Statistics (2010).

Public	Private agencies	Ads	Contacting	Network	Others
agencies			employer		
Visit a jobcentre	On books of private employment	Advertise in newspapers or journals	Apply directly to employers	Ask friends, relatives, colleagues,	Waiting
	agency	-		trade unions	
Visit a careers		Answer ads in			Anything
office		newspapers and journals			else
Visit a job-		Study situations			
club		vacant in			
		newspapers or			
		journals			



COMPAS + University of Oxford + 58 Banbury Road + Oxford + OX2 6QS