

Differences between provisional and final estimates of international migration

Introduction

The Office for National Statistics has published provisional International Passenger Survey (IPS) estimates of long-term international migration to and from the UK at <http://www.statistics.gov.uk/statbase/product.asp?vlnk=15240> This article describes the differences between these provisional IPS estimates and the final estimates of long-term international migration.

Provisional International Passenger Survey (IPS) estimates of long-term international migration

The Office for National Statistics has published estimates of international migration, based solely on the International Passenger Survey (IPS). The IPS is a large, multi-purpose survey which collects information from passengers travelling in and out of the UK via the principal airports, sea routes and the Channel Tunnel. The main sample is over a quarter of a million interviews and about 1.5 per cent of those sampled are long-term migrants.

ONS estimates of international migration use the United Nations (UN) recommended definition of an international long-term migrant. That is someone who changes his or her country of usual residence for at least a year, so the country of destination effectively becomes the country of usual residence.

Published estimates are available disaggregated by citizenship groups and by reason for migration.

The latest data are published each quarter on a rolling year basis, with part of the year using final data from the IPS and part of the year using provisional data from the IPS. The differences between final and provisional data are described in detail below.

Final estimates of international migration

Long-term international migration estimates (formerly identified as Total International Migration or TIM) provide the most comprehensive estimate of long-term international migration. The IPS provides the foundation of these estimates. It is supplemented with a component from the Irish Central Statistics Office that provides data on flows to and from the Irish Republic. Other data sources allow for the estimation of adjustments to these two components. That is, broadly, an adjustment for asylum seekers not captured by the IPS (using data from the Home Office) and an adjustment for visitor switchers (people who stay for more than a year when they were not expecting to, thus becoming migrants) and migrant switchers (people who stay for less than a year when they were not expecting to, thus are no longer migrants). Therefore:

Long-term international migration = International Passenger Survey (IPS) flows + Irish flows + visitor switcher flows + asylum seeker flows - migrant switcher flows

A more detailed methodology document can be seen in [Methodology to estimate Total International Migration since 1991](#). The flows and adjustments used to estimate long-term international migration in 2007 are shown in Table 1.

Table 1: Components of long-term international migration in 2007 (thousands)

	Total International Migration	International Passenger Survey	Irish Republic	Asylum Seekers Adjustment	Visitor Switchers adjustment	Migrant Switchers adjustment
Immigration	577	527	11	23	37	-21
Emigration	340	318	13	11	13	-14
Net migration	237	209	-1	12	24	-8

In 2007, 91 per cent of immigration and 94 per cent of emigration was estimated from the IPS.

Producing long-term international migration estimates is a complex procedure with the number of sources used being delivered at different times and the estimates requiring thorough quality assurance. Currently, long-term international migration estimates are produced twice a year, once with reference to the calendar year and once with reference to the mid-year for mid-year population estimates. Estimates are published 11 months after the reference date for estimates based on a calendar year and 14 months after the reference date for estimates based on the mid-year. The provisional IPS estimates of long-term international migration are published eight months after the reference date. These provisional IPS estimates are also published every three months whereas final long-term international migration estimates are published in August and November each year.

Provisional and final data from the International Passenger Survey

The IPS needs to be representative of all passengers. This is achieved by using a multi-stage weighting system. At airports, seaports and the Channel Tunnel, sample figures are scaled to known passenger flows provided by the Civil Aviation Authority and the Department for Transport. Corrections to individual records and any updated information supplied after provisional estimates have been published are taken on board to create the final estimates.

The differences between provisional and final estimates of long-term international migration from the IPS are minimal. Specifically in the year to mid-2007, the percentage differences were as follows:

- Provisional estimates were 0.8 per cent higher for immigration
- Provisional estimates were 2.3 per cent higher for emigration
- Provisional estimates were 2.5 per cent lower for net migration

Making adjustments for the geographical distribution of immigrants

Immigrants in the IPS are asked about their intended destination within the UK and the response to this question is based on intentions which may or may not be realised. ONS research comparing IPS data with the 2001 Census and Labour Force Survey (LFS) revealed that there are some migrants who will live at the intended destination for only a short time before moving elsewhere.

The LFS provides more reliable data on the geographical distribution of immigrants than the IPS as it is based on where migrants actually live rather than on their initial intentions. However, the IPS is better for estimating the total inflow of migrants coming from abroad. A methodology has been developed that calibrates the IPS data to the geographical distributions in the LFS. This creates an IPS data set with the same total flows as the original, but estimates by geographical area consistent with the most recently available LFS data on where migrants are living. The overall effect is to redistribute migrants geographically between the constituent countries of the UK and English government office regions. This adjustment is made for each contact in the IPS and as a result this calibration procedure can affect other variables. For example, Table 2 shows the number of British and non-British immigrants between mid-2003 and mid-2007, using both uncalibrated data (without the LFS geographical adjustment) and calibrated data (with the LFS geographical adjustment).

Table 2: Calibrated and uncalibrated estimates of British and non-British immigrants, mid-2003 to mid-2007 (thousands)

Year	British			Non-British		
	Uncalibrated	Calibrated	% difference	Uncalibrated	Calibrated	% difference
Mid-2003	101	102	0.7	300	299	-0.2
Mid-2004	91	92	0.3	362	361	-0.1
Mid-2005	85	82	-4.0	439	443	0.8
Mid-2006	83	87	5.3	417	412	-1.1
Mid-2007	68	72	5.8	463	459	-0.9

The provisional IPS estimates of long-term international migration are uncalibrated, whereas the final estimates of long-term international migration use calibrated data. As Table 2 shows, this can have a small effect on other variables such as citizenship, although these differences are within the margins of error associated with the IPS. Calibration does not affect the total estimate of immigration or emigration, just disaggregations of the estimates by other variables, such as citizenship.

Provisional estimates from the International Passenger Survey and final estimates of long-term international migration

In addition to the small differences between the provisional and final estimates from the IPS, the long-term international migration estimates include an allowance for migration between the UK and the Republic of Ireland, asylum seekers and visitor and migrant switchers (people who change their intentions and migration status). The differences between estimates of the IPS (based on provisional data) and long-term international migration (based on final IPS data and the extra components) for all migrants, British citizens and non-British citizens for the periods mid-2002 to mid-2007 are shown in Figures 1 to 3. IPS estimates of immigration and emigration include 95 per cent confidence intervals. A confidence interval provides an estimated range of values in which an actual data value is likely to fall.

Figure 1: Provisional IPS estimates compared with long-term international migration for all migrants, mid-2003 to mid-2007

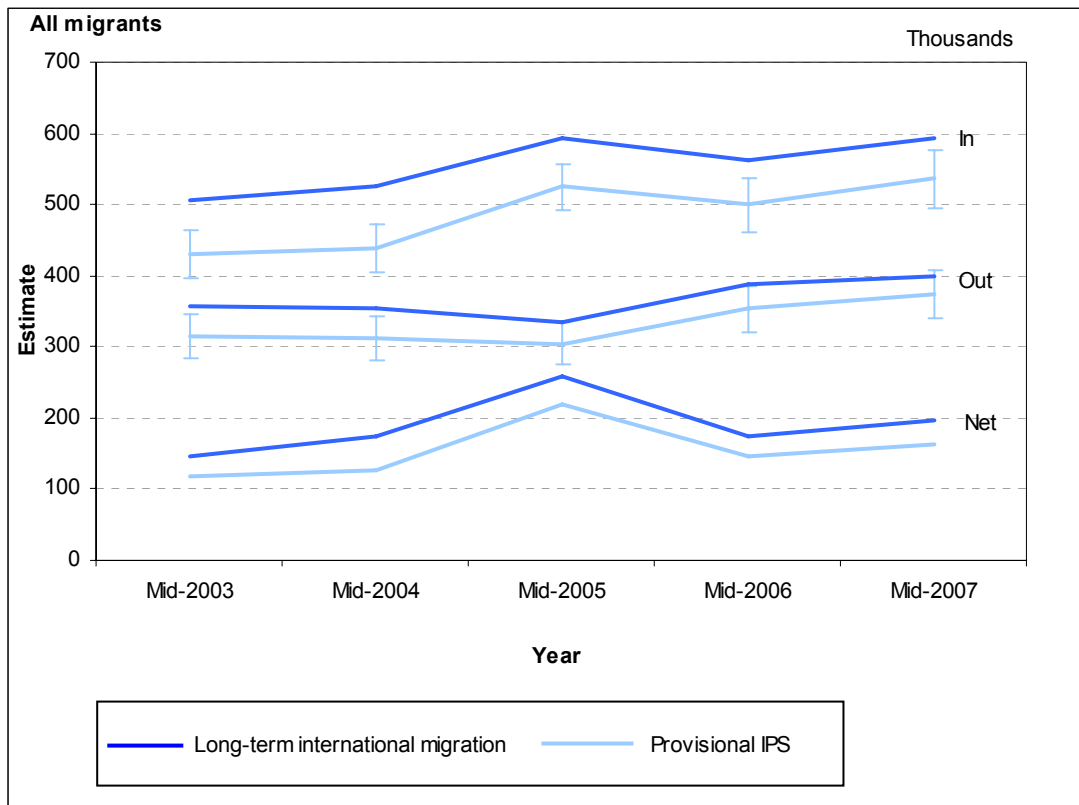


Figure 2: Provisional IPS estimates compared with long-term international migration for British citizens, mid-2003 to mid-2007

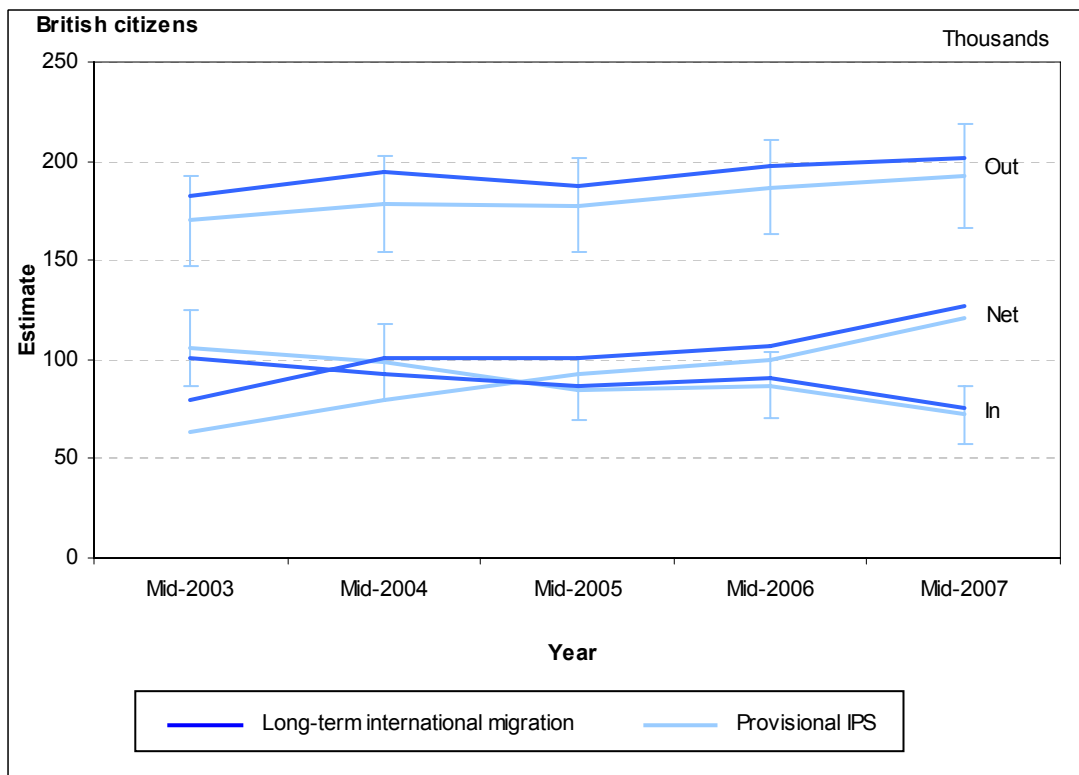
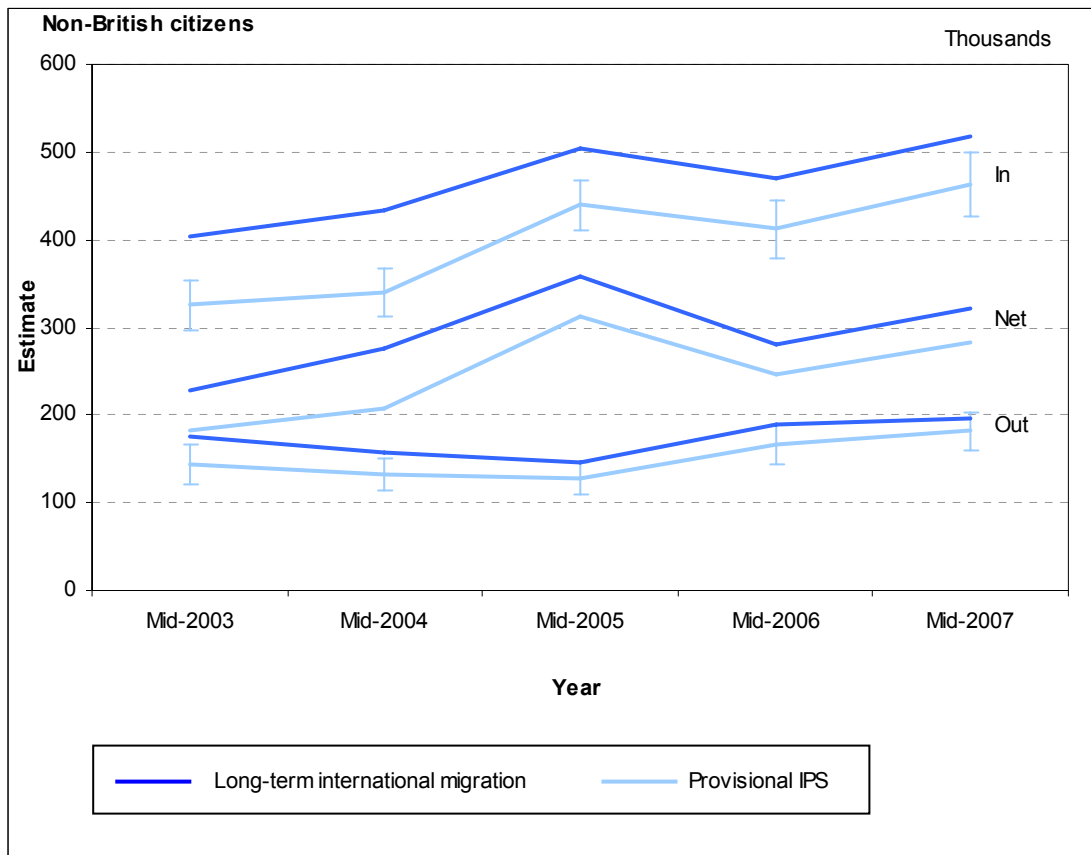


Figure 3: Provisional IPS estimates compared with long-term international migration for non-British citizens, mid-2003 to mid-2007



Figures 1 to 3 show that estimates of net long-term international migration are on average around 35,000 higher than those solely using the IPS. This difference represents the other components which are used to compile long-term international migration. However both sets of estimates closely mirror each other and show the same trend due to the large contribution which the IPS makes to long-term international migration estimates.

Conclusion

The Office for National Statistics has published provisional IPS estimates of long-term international migration. Due to their more timely nature, these provisional IPS estimates exclude some components and adjustments which are made to final estimates of long-term international migration. However, they provide a good indication of recent migration patterns.