

Sub-national service exports methodology and initial results

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About this consultation

In July 2016, the Office for National Statistics published the [first estimated values of service exports from each region and country](#) of the UK covering the period 2011 to 2014. We followed this up in May 2017 by [publishing figures for 2015](#), and finally in July we published additional analysis breaking down [by country of destination](#) of exports.

This new set of statistical outputs is designed to support local-level decision and policy making, particularly in light of recent events including the [UK's declaration to leave the EU](#), the publication of the [Consultation to the Industrial Strategy](#), and continued devolution negotiations.

This is the first time estimates of service exports at sub-national level have been created, and in order to calculate them we had to devise a new methodological approach. This consultation seeks feedback from you, our users, about the results generated thus far, specifically:

1. Whether you make use of these estimates, and sufficiently understand what is being presented.
2. The design of the methodology and any specific proposals for changes or improvement.
3. Whether the estimates should continue to be developed and, if so, what further developments you would like to see in future.

This document contains information about why the estimates have been calculated in the section [Background to NUTS1 service exports](#), followed by a brief explanation of what the outputs have shown to-date in the section [Headline results](#), then a very brief summary of the methodology used to calculate those outputs in the section [The methodology used](#), and concludes with the questions, aims and outcomes we would like as feedback from you in the section [Questions for users](#).

Background to NUTS1 service exports

Services generate the majority of economic output in the UK, and exports of services have been growing in recent years. There has been increasing demand for more detailed estimates of UK trade data, particularly for sub-national breakdowns. This demand arises from many sources, most notably the devolved administrations of Scotland, Wales and Northern Ireland, from the Greater London Authority, and from the new English [Combined Authorities](#).

As part of the [UK trade development plan](#), and also part of the [ONS Supporting Devolution programme](#), we have carried out experimental analysis to calculate estimates of service exports from the UK split by region or country of origin (known as 'NUTS1 area'¹), functional category of output, and destination of export. This new set of statistical outputs is designed to support local-level decision making and policy making.

The [UK Balance of Payments](#), known as the Pink Book, shows the value of goods exports and of service exports, separately, from the UK overall to other countries. HM Revenue and Customs' [Regional Trade Statistics](#) provide estimates of the value of goods exports from the NUTS1 areas of the UK. In July 2016, we published the [first estimated values of service exports from each NUTS1 area](#) of the UK covering the period 2011 to 2014, then followed this up in May 2017 with [figures for 2015](#), and finally in July we published additional analysis breaking down [by country of destination](#) of exports. This is the first time such estimates of sub-national trade have been created, and for the time being this completes our analysis. We now ask for feedback from our users on progress to-date, and considerations for the future of this analysis.

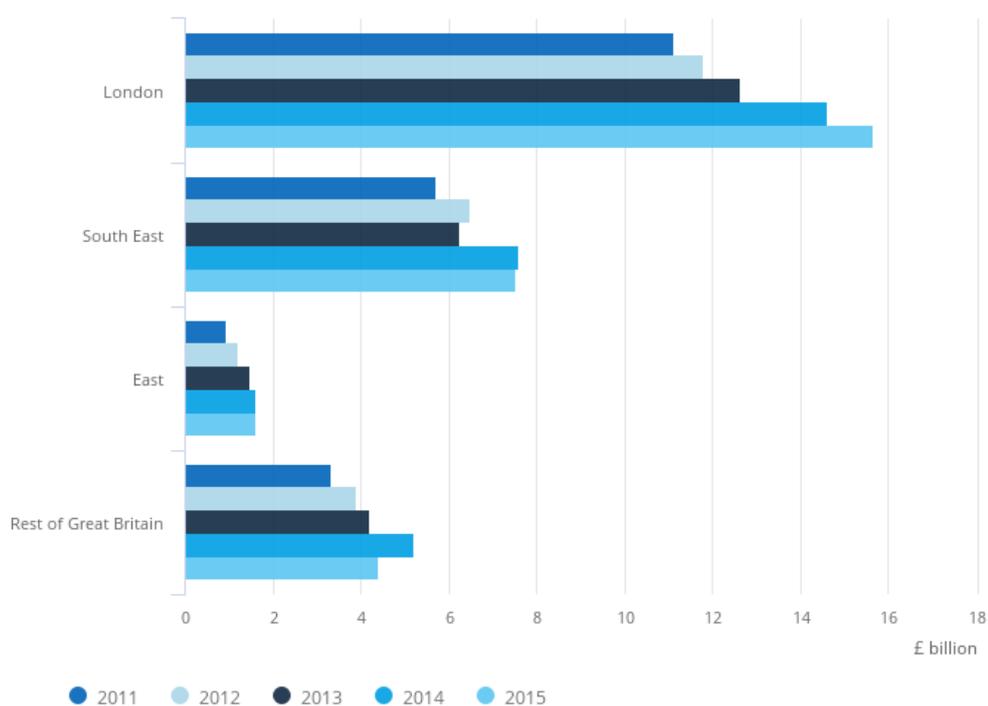
¹ The [Nomenclature of Units for Territorial Statistics \(NUTS\)](#) is a hierarchical classification of administrative areas, used across the EU for statistical purposes. There are 12 NUTS1 areas in the UK: Scotland, Wales, Northern Ireland, and the nine former English Government Office Regions.

Headline results

In this section, we present some headline findings from our sub-national exports work thus far, to give you an indication of the conclusions that can be drawn from our analysis. In our [2015 NUTS1 service exports publication](#), we found that across the UK we exported £217 billion of services.² London generated £100 billion of those service exports, with financial services producing the largest contribution of £28 billion toward London's service exports, followed by real estate, professional, scientific and technical industries contributing £17 billion, then travel with £16 billion. In fact, the £28 billion from finance in London accounted for 13% of total service exports from across the UK.

The next largest exporting region was the South East, which generated £34 billion of service exports in total, then the North West with £18 billion. We find that information and communication services were geographically focused in southern eastern England, where almost 85% of exports of these services came from London, the East, and the South East, as we can see in Figure 1 below. Interesting patterns also emerge in relation to specific functional categories, such as exports of insurance and pension services having fallen by one third between 2014 and 2015 across Great Britain, and exports of travel services having grown by one third between 2011 and 2015 across Great Britain. London contributed 55% of Britain's total growth in travel service exports.

Figure 1: Total value of exports of information and communication services from Great Britain by selected NUTS1 area, 2011 to 2015



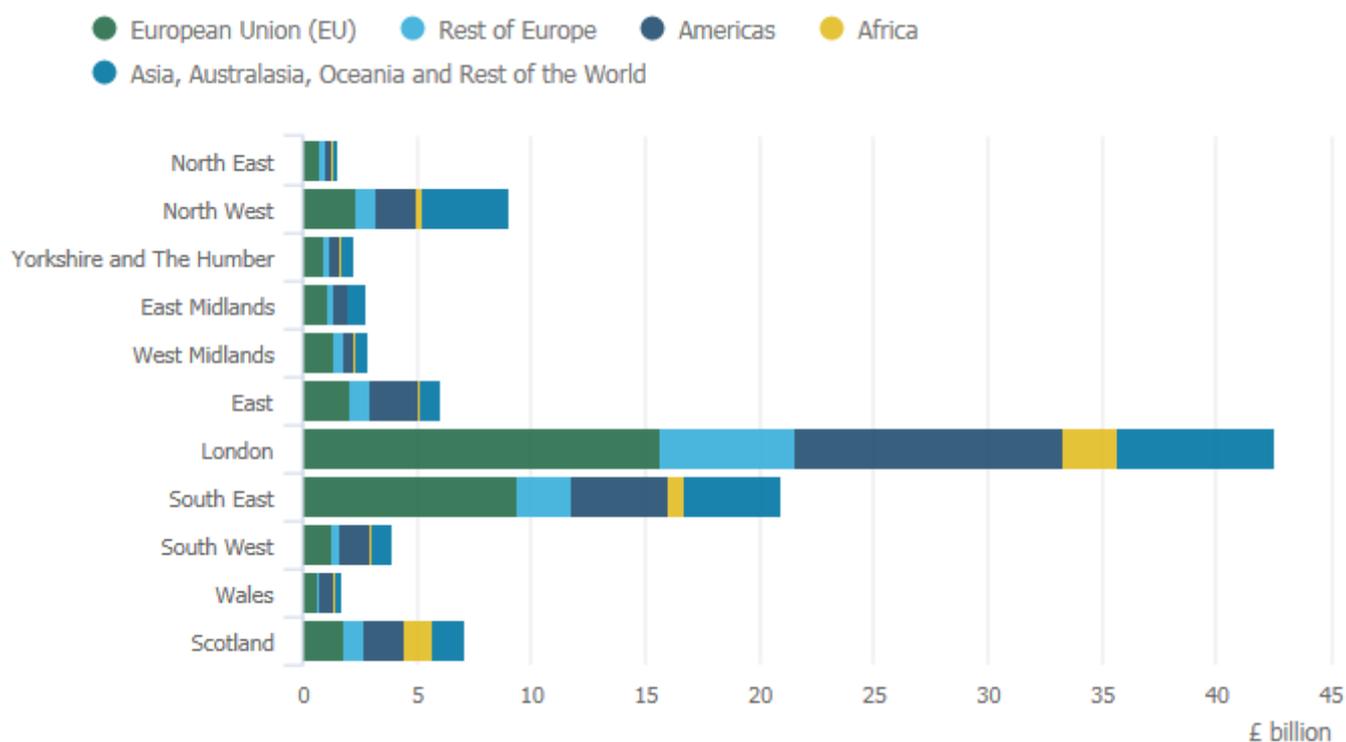
Source: Office for National Statistics International Trade in Services

When we conducted [further analysis looking at destinations of trade](#), we found that London dominated values of trade in services to the EU, contributing £15.6 billion (42%) of Great Britain's industrial service exports to the EU in 2015, as we can see in Figure 2. However, the North East and the West Midlands were

² While we use many of the same sources and definitions as are used to compile the UK Balance of Payments, there are still small differences to the total values as a result of: differences in the methodology to calculate some functional categories, in the use of Annual Business Inquiry data for Northern Ireland, and in final balancing adjustments carried out to align the UK Balance of Payments with the National Accounts.

proportionally more dependent upon the EU for trade in services, each sending about half of their service exports to the EU, compared with London which sent 37% of its total industrial service exports to the EU.

Figure 2: Total value of service exports from NUTS1 areas by continent, Great Britain, 2015



Source: Office for National Statistics International Trade in Services

The industries contributing most to service exports to the EU from across Great Britain were information and communications which generated £13 billion, followed by the real estate, professional, scientific and technical services industries contributing £11 billion, and services connected to manufacturing industries contributing £5 billion. We must note that financial services were excluded from the analysis by destination.

We found that 10% of Great Britain's total service exports went to Commonwealth countries, half of which was generated in London, followed by 20% from the South East, then 11% from Scotland. However, the largest single destination for service exports from Great Britain was the US, which received 21% of GB total service exports. The US was followed by Germany, Switzerland, the Netherlands, Ireland, Saudi Arabia, France, Italy, Sweden and Belgium as the top 10 countries receiving GB industrial service exports.

The methodology used

In order to calculate estimates of service exports at sub-national level, we had to devise a new methodological approach. For more details of the methodology used, please refer to our initial publication [Estimating the value of service exports abroad from different parts of the UK: 2011 to 2014](#).

To support known user requirements, we present our results on a "functional category" basis. These functional categories are a combination of industries and products. The Pink Book presents results compiled on a commodity (product) basis at the UK level. However, the main data source used in our methodology, the International Trade in Services (ITIS) survey, has been analysed on an industry basis based upon the [Standard Industrial Classification 2007](#). Most results are presented on this industrial basis, but the categories of transport, travel, financial and insurance and pension services remain on a product basis as they come

from different data sources. This combination of industries and products allows us to analyse total international exports using the most appropriate sources. For further information on the functional categories, please refer to our published articles.

In broad terms, the methodology can be summarised by the following steps:

1. Take micro-data on exporting only from ITIS.
2. Merge information from ITIS with data from the Inter-Departmental Business Register thereby allocating enterprise-level information about business activity to the business units doing that activity.
3. Apportion out the ITIS data from enterprise-level to local unit level³ using the proportion of employees in each local unit compared to its enterprise. This is done separately for the value for each country of destination of exports.
4. Sum these broken-down values according to the NUTS1 area in which local units are located, the Standard Industrial Classification category local units belong to, and the country grouping receiving the exports.
5. For functional categories not covered by the ITIS survey, data are taken from the UK Balance of Payments. An adjustment is made to subtract estimates for Northern Ireland to create GB-level estimates, then those GB-level estimates are broken down by NUTS1 area using alternative data sources (specifically: the Business Register and Employment Survey, the International Passenger Survey, and banking data from the Bank of England).

This approach assumes that each local unit of a business contributes to the total enterprise trading activities proportionately according to the number of employees at each unit. We have used the lowest level of information available to break the export figures down as accurately as possible, and made use of a variety of data sources best suited to their respective functional categories.

Confidentiality and data protection

As someone who is interested in ONS statistics, we welcome your views. We may use your contact details to get in touch about future surveys or consultations, or to clarify details of your response to this specific consultation. You can opt out at any time by emailing ons.communications@ons.gsi.gov.uk.

To show that we are being open and honest, responses to this consultation will be made public. This will include the name of your organisation, and with your permission, also your name. We will not publish your contact details.

Questions for users

Based upon the work carried out on estimates of sub-national trade thus far, which are summarised in the earlier sections of this document, we would like to ask for feedback from you, our users. This feedback can be about any aspect of the NUTS1 area service exports; however, there are some specific questions for which answers would be most appreciated:

1. Are you responding on behalf of yourself as an individual, or on behalf of your organisation?
2. Do you think this new set of statistics is a useful addition to the suite of UK Trade data?
3. Do you sufficiently understand the outputs being presented? Please specify if there are features, details or graphics that need better or clearer explanation.
4. What uses are you making of these outputs? Please include specific examples of evidence-based policy making, documented reporting or published articles if possible.

³ Local unit is the statistical term for the individual physical locations that make up an organisation, the branches, offices, warehouses, factories, and any other individual location that forms part of an organisation.

5. Do you consider the methodology to be appropriate to achieve the desired results?
6. Are the functional categories used in the analysis appropriate, or should an alternative approach to the industrial or product breakdowns be considered? Examples include: an entirely industry-based approach, or an entirely product-based approach.
7. Are these outputs sufficiently aligned with other ONS products, such as the UK Balance of Payments, or should there be additional constraining applied to ensure a full match?
8. Thus far the work on exports by destination only covers the industrial breakdowns, not the product-based functional categories of transport, travel, finance and insurance and pension services. Data sources for the breakdown by destination in those categories are very limited. Should the destination outputs be extended to cover those additional categories? If so, do you have specific suggestions of data sources that could be used to achieve this?
9. Can you propose alternative approaches to the methodology, or parts of the methodology, that may prove more effective than the current approach? In particular regarding data sources used for the breakdowns, and the employee-based apportionment.
10. Should these estimates of sub-national service exports continue to be produced in future years?
11. Estimates for Great Britain are sourced mainly from ITIS, whereas results for Northern Ireland come from the Annual Business Inquiry. As a result of this difference in sources, it may not be possible to break down figures for Northern Ireland into as much detail as those for GB, and may be delivered up to six months later than GB figures. Do you require results for the whole UK including results for Northern Ireland, or would you prefer GB-only figures excluding Northern Ireland which would be available earlier?
12. Are there any improvements or additional breakdowns that you would find useful for these outputs? Examples include, but are not limited to: the use of alternative geographies, or further industrial breakdowns, or additional breakdowns by alternative categories of analysis.

This information will help us establish whether we are using sufficiently sound methods, ensure we are meeting your needs, affirm the necessity of continuing this strand of work, and help us mould the future direction of any work to better target your requirements. This consultation marks the first stage toward making the estimates of sub-national service exports into an official statistic, then a National Statistic, should there be sufficient demand and interest from users.

Final decisions on the future of the estimates, and the outputs possible, will be subject to resource constraints and further discussions with data suppliers and methodologists.

Consultation timetable

This consultation will run from Thursday 13 July until Friday 8 September 2017.

We will publish a summary of the comments made approximately 6 weeks after the consultation closes, as well as indications of actions and/or proposals that have arisen through the consultation process.

Getting in touch

If you wish to ask for further details about the service exports methodology, results or publications, please contact the project lead James Harris on +44 (0) 1329 44 4656, or by email to:

james.p.harris@ons.gsi.gov.uk

If you have any queries or comments about the consultation process, please email the ONS Communications team at: ons.communications@ons.gsi.gov.uk or call +44 (0) 845 601 3034.

You can alternatively write to us at the following address:

Consultation Coordinator,
Room 1.101
Office for National Statistics,
Government Buildings,
Cardiff Road,
Newport,
South Wales,
NP10 8XG.

For further information on ONS consultations, please visit <https://consultations.ons.gov.uk/>

Accessibility

All material relating to this consultation can be provided in braille, large print or audio formats on request. British Sign Language interpreters can also be requested for any supporting events.