# Measuring the Real Output of Services Activities: An Audit of Services Producer Price Indexes.

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### **Economics Statistics Centre of Excellence (ESCoE)**

- Set up after the Bean review, funded by ONS
- provides ONS with research that addresses the challenges of measuring the modern economy
- Fosters collaboration between NSIs, the academic community and users of statistics
- Through research, events and networking, e.g. visitors program
- More information on www.escoe.ac.uk







### Project 2.1. Measuring activity in services sectors

- Requires good measures of prices to construct volume measures
- Deliverable: Audit of methods to measure price change: ONS relative to International practice
- In this audit we decided to let the data speak
- As a starting point we gathered information on SPPIs from data in the public domain for 16 countries and 31 services activities from 2001-2016
- Overall we had a sample of nearly 3000 observations on price changes relative to the change in GDP deflators







#### **Main Results**

- The measurement method appears to matter The preliminary results suggest that growth in prices measured using model pricing (MP) is about 1% lower per annum than that using time based methods (TB).
- A back of the envelope calculation suggests that using MP rather than TB might raise labour productivity in industry M, Professional, Scientific and Technical in the UK, from 0.8% per annum to 1.7%, for the period 2006-2016.
- Future work will attempt to control for other variables that impact on prices, e.g. market structure, regulation and adoption of IT technology
- And then use results for sensitivity analysis of productivity at the industry level







## Request for Help

- We want to get a more precise estimate of the measurement method effect
  - requires access to explanatory documents from NSIs
- We would also like to increase the sample size, by having access to unpublished disaggregated data for some countries/services,
  - e.g. by splitting 73 into 7312: Advertising services and 7320: Market research
- Also welcome comments on the methodology, usefulness of these comparisons, etc.





