

Article

# UK productivity flash estimate: October to December 2017

Flash estimate of productivity for Quarter 4 (Oct to Dec) 2017 based on preliminary gross domestic product and labour market data.

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# 1 . UK productivity flash estimate: October to December 2017

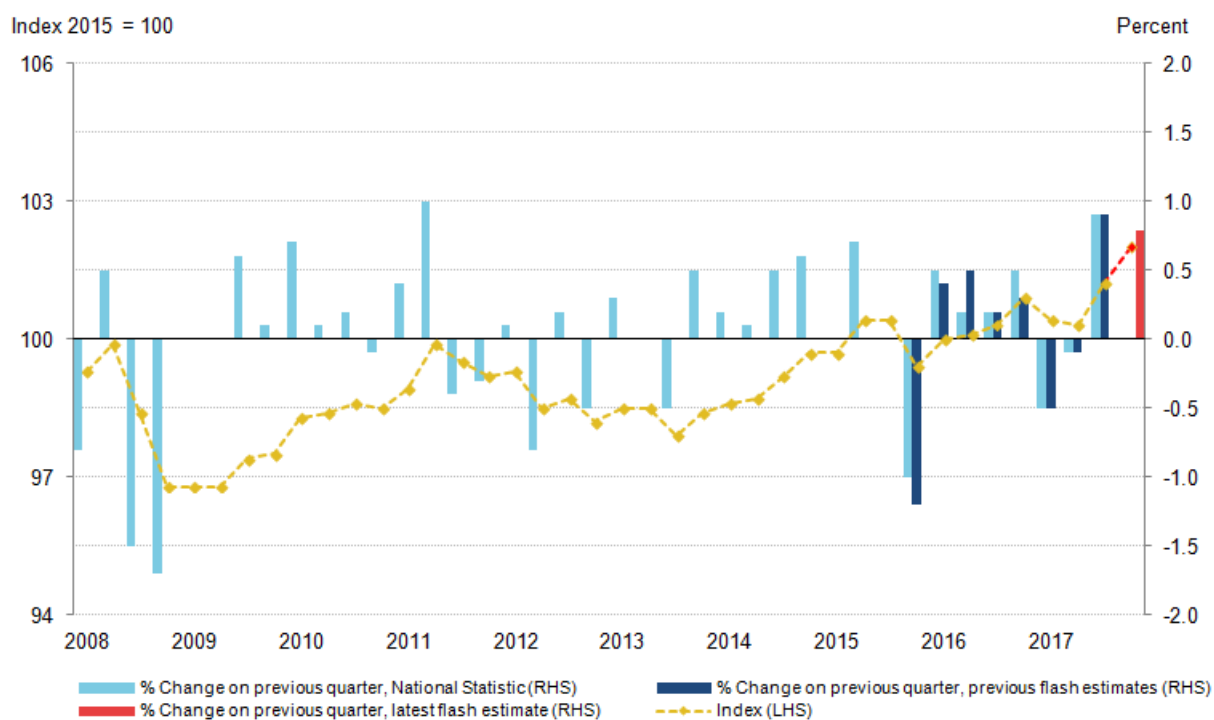
Output per hour – Office for National Statistics' (ONS's) main measure of labour productivity – increased by 0.8% in Quarter 4 (Oct to Dec) 2017. This follows a 0.9% increase in the previous quarter (July to Sept) 2017 (see Figure 1). Output per worker grew at a slower rate of 0.2% (see Figure 2).

Growth in Quarter 4 was the result of a 0.5% increase in gross value added (GVA) (using the preliminary gross domestic product (GDP) estimate) accompanied by a 0.3% fall in total hours worked (using the latest Labour Force Survey data).

This flash estimate of UK productivity uses the first available information on output and labour input for the quarter. These data may be revised in subsequent months. In particular, new estimates of GVA will be published by ONS on 22 February 2018. As such, ONS releases the more detailed [Labour productivity bulletin](#) after the third estimate of GDP for the quarter is published, consistent with the quarterly national accounts.

**Figure 1: Percentage change on previous quarter and index of output per hour**

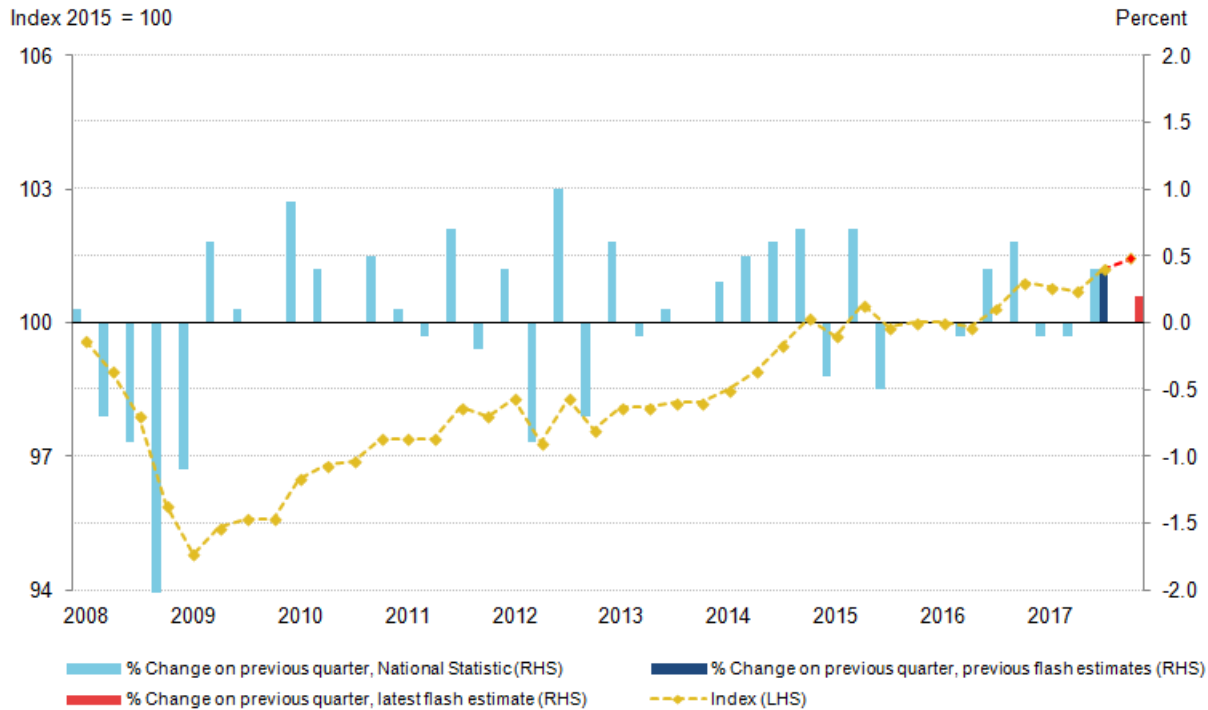
Seasonally adjusted, Quarter 1 (Jan to Mar) 2008 to Quarter 4 (Oct to Dec) 2017, UK



This is the second consecutive quarter of growth in output per hour in 2017 and is the second-highest rate of growth since Quarter 2 (Apr to June) 2011. As a consequence, output per hour growth in the second half of 2017 was stronger than any two consecutive quarters since the economic downturn. However, over a longer period, UK productivity growth has been relatively weak – in particular, since the onset of the economic downturn in Quarter 1 (Jan to Mar) 2008 – because of the relative strength of the labour market as compared with GDP.

**Figure 2: Percentage change on previous quarter and index of output per worker**

Seasonally adjusted, Quarter 1 (Jan to Mar) 2008 to Quarter 4 (Oct to Dec) 2017, UK



Both employment – which captures the total number of people in work – and total hours – which captures both changes in employment and working patterns – fell in the course of the economic downturn, but total hours fell further reflecting falls in the average hours of those in employment. However, as GDP fell by a larger proportion in the economic downturn than either hours or employment and has grown slowly by historical standards during the recovery, productivity growth has been subdued since the downturn and has recovered more slowly than following previous downturns.

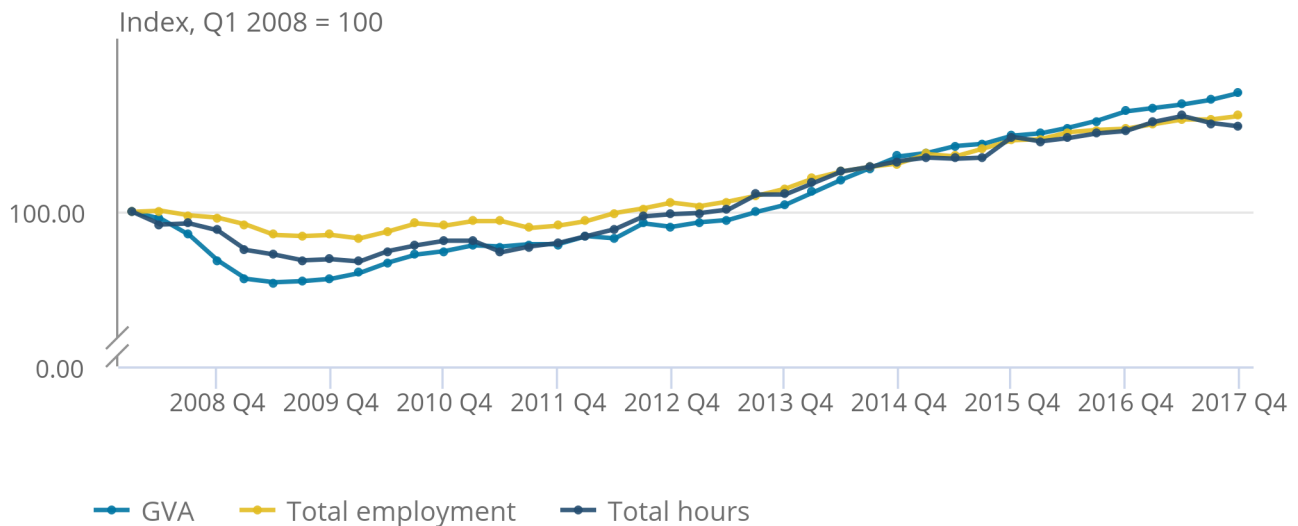
The increase in productivity in Quarter 4 2017 was a result of both a fall in total hours worked and growth in GVA. The most recent estimate of GDP indicated that the UK economy grew by 0.5% in Quarter 4 2017, which contrasts with a fall of 0.3% in total hours worked and outpaces the increase in employment of 0.3% over the same period. The fall in total hours worked arose because of a further fall in average hours worked – particularly among full-time workers. Figure 3 shows these relative movements over the post-downturn period. It indicates that in Quarter 4 2017, the economy was around 10.3% larger than the pre-downturn level of output in Quarter 1 2008, while employment and total hours worked were around 8.3% and 7.4% above their pre-downturn levels respectively.

**Figure 3: Index of gross value added (chained volume measure), employment level (age 16 and over) and total hours worked (weekly)**

Quarter 1 (Jan to Mar) 2008 to Quarter 4 (Oct to Dec) 2017, UK

Figure 3: Index of gross value added (chained volume measure), employment level (age 16 and over) and total hours worked (weekly)

Quarter 1 (Jan to Mar) 2008 to Quarter 4 (Oct to Dec) 2017, UK



Source: Office for National Statistics

Services GVA grew by 0.6% in Quarter 4 2017, compared with 0.4% in the previous quarter. The business services and finance industry continued to be the main driver of GVA growth in the latest quarter, growing by 0.8% over the same period. Of services industries, the largest contributors to whole economy GVA growth came from employment activities (0.04 percentage points) and warehousing and support activities for transportation (0.04 percentage points).

In production, manufacturing output grew by around 1.3%, unchanged from the previous quarter and contributed 0.13 percentage points to GVA growth in Quarter 4 2017. In addition, electricity, gas, steam and air conditioning supply output increased by 0.4% and water supply, sewerage, waste management and remediation activities increased by 0.3%.

Increases in manufacturing and services GVA were partially offset by mining and quarrying output falling by 3.9%, due to the well-publicised shut-down of the Forties oil pipeline for a large part of December 2017. Construction output decreased by 1% over this period.

Industry and regional breakdowns of labour input and labour productivity were published in the [UK productivity analytical release of February 2018](#).

## 2 . Data sources

Gross domestic product (GDP) data are from the [Gross domestic product, preliminary estimate: \(Quarter 4\) October to December 2017 statistical bulletin](#), published on 26 January 2018.

Labour market data are from the [Labour market statistics – February 2018 statistical bulletin](#), published on 21 February 2018.

Details of the [policy governing the release of new data](#) are available from the [UK Statistics Authority](#).