## Index of Production, UK: September 2018

Movements in the volume of production for the UK production industries: manufacturing, mining and quarrying, energy supply, and water and waste management. Figures are seasonally adjusted.

## Table of contents

1. Main points
2. Things you need to know about this release
3. Production in detail
4. What is contributing to the quarter-on-quarter increase?
5. What is contributing to the month on previous month growth?
6. What is contributing to the three months on same three months a year ago increase?
7. Upcoming changes
8. Links to related statistics
9. Quality and methodology

## 1. Main points

- The rise of $0.8 \%$ in total production output for Quarter 3 (July to Sep) 2018, compared with Quarter 2 (Apr to June) 2018, is due primarily to a rise of $0.6 \%$ in manufacturing, supported by upward contributions from the other sectors.
- The quarterly increase in manufacturing output, reverses the fall in Quarter 2 (Apr to June) 2018, due primarily to growth from transport equipment (2.3\%), and basic metals and metal products (1.9\%).
- In September 2018, total production output was estimated to have remained flat at 0.0\%, compared with August 2018, due to a $0.2 \%$ rise in manufacturing being offset by downward contributions from the other main sectors.
- The monthly increase in manufacturing output of $0.2 \%$ was due mainly to strength from basic pharmaceutical products ( $3.9 \%$ ), chemicals and chemical products ( $2.8 \%$ ), and other manufacturing and repair (1.4\%); only 6 of the 13 manufacturing sub-sectors increased.
- In Quarter 3 (July to Sep) 2018, total production output increased by 0.7\% compared with Quarter 3 (July to Sep) 2017, due primarily to a rise in manufacturing of $1.0 \%$ which is the weakest growth in manufacturing output since November 2016.


## 2. Things you need to know about this release

This September 2018 release publishes updated and revised estimates from July 2018 onwards and is consistent with the National Accounts Revisions Policy.

On 11 October 2018, we published an article on the future use of VAT as part of the economic review, which considers the strategic collection model for administrative and survey data for short-term indicators, including the Index of Production.

The Index of Production (loP) is an important economic indicator and one of the short-term measures of economic activity in the UK. It is used in the compilation of gross domestic product (GDP); the production industries' weight accounts for $13.8 \%$ of the output approach to the measurement of GDP.

The current price non-seasonally adjusted estimates of industries collected by the Monthly Business Survey (MBS) can be found in the Monthly Business Survey turnover in production industries dataset, which was published alongside this release. Note that the MBS turnover in production industries dataset does not contain data from VAT returns, which have been included in the loP.

This release includes Value Added Tax (VAT) data for Quarter 1 (Jan to Mar) 2018.

Care should be taken when using the month-on-month growth rates as data can often be volatile; longer-term growth rates and examination of the time series allow for better interpretation of the statistics.

## 3 . Production in detail

Figures 1 and 2 show that both the Index of Production (loP) and Index of Manufacturing (loM) followed a broadly upward trend following the economic downturn. Growth was more pronounced from the beginning of 2010, as the economy recovered, before a downturn during 2012. Production and manufacturing output have risen but remain $5.7 \%$ and $1.6 \%$ lower, respectively, for Quarter 3 (Jul to Sep) 2018 than the pre-downturn gross domestic product (GDP) peak in Quarter 1 (Jan to Mar) 2008.

Figure 1: Index of Production in UK
Seasonally adjusted, January 2008 to September 2018, UK
Economic downturfigure 1: Index of Production in UK
Seasonally adjusted, January 2008 to September 2018, UK


## Source: Monthly Business Survey to Office for National Statistics

## Notes:

1. Quarter 1 (Jan to Mar) 2008 to Quarter 2 (Apr to June) 2009 - UK economic downturn.

Figure 2: Index of Manufacturing in UK
Seasonally adjusted, January 2008 to September 2018, UK
Economic downturgure 2: Index of Manufacturing in UK

## Seasonally adjusted, January 2008 to September 2018, UK



## Source: Monthly Business Survey to Office for National Statistics

## Notes:

1. Quarter 1 (Jan to Mar) 2008 to Quarter 2 (Apr to June) 2009 - UK economic downturn.

Table 1 shows the growth rates and contributions for the loP and sectors for September 2018.

Table 1: Growths and contributions to production, three months-on-previous three months, three months-on-previous three months a year ago, month-on-previous-month, September 2018, UK, seasonally adjusted estimates

|  |  |
| :--- | :--- | :--- | :--- |

## 4 . What is contributing to the quarter-on-quarter increase?

Total production output for Quarter 3 (July to Sep) 2018 increased by $0.8 \%$, reversing the fall in Quarter 2 (Apr to June) 2018 of $0.8 \%$. This is the strongest three-monthly growth since November 2017, when output rose by $1.1 \%$. However, overall strength during the latest quarter should be noted with caution, considering monthly total production output has remained flat since July 2018.

The current three-monthly growth is due primarily to:

- rises in all four main sectors
- a $0.6 \%$ increase in manufacturing output
- an increase of $1.9 \%$ in electricity and gas supply

Strength in total manufacturing ouput is broad-based, with 8 of the 13 sub-sectors increasing, led by transport equipment, which rose by $2.3 \%$. Providing the largest contribution within this sub-sector was motor vehicles, trailers and semi-trailers, which rose by $3.4 \%$, the strongest three-monthly growth since September 2017, when it rose by $3.6 \%$. However, growth within this sub-industry during Quarter 32018 , is due mainly to a comparatively weak Quarter 22018 (Figure 3) allied to strength from exports, which displays a non-seasonally adjusted growth of $7.9 \%$ in nominal export turnover growth for Quarter 3 2018, compared with Quarter 32017.

Figure 3: Index of Motor Vehicles, Trailers and Semi-Trailers (Division 29), UK
Seasonally adjusted, October 2017 to September 2018

# Figure 3: Index of Motor Vehicles, Trailers and Semi-Trailers (Division 29), UK 

Seasonally adjusted, October 2017 to September 2018


Source: Monthly Business Survey - Office for National Statistics

We intend publishing an article exploring recent developments in the motor trades and motor vehicles production industries in the next few months.

Basic metals and metal products provide supporting growth of $1.9 \%$. This is due mainly to a weak Quarter 2 2018, which fell by $4.5 \%$, rather than any notable strength displayed during Quarter 32018.

Food, beverages and tobacco increased by $1.0 \%$, driven by strength within soft drinks, mineral waters and bottles waters, which rose by $9.0 \%$. This was the strongest three-monthly growth since a rise of $10.1 \%$ in July 2014, due mainly to increased demand during the period of sustained hot weather during July 2018.

In contrast, and providing the largest fall in quarterly manufacturing output, is basic pharmaceutical products, which fell by $3.2 \%$, due primarily to strength during June 2018 when monthly output increased by $6.2 \%$, driven by strong nominal export turnover growth of $40.0 \%$. However, it should be noted that growth within this sub-sector can be volatile.

Despite recent signs of a recovery in manufacturing output, following three consecutive periods of three-monthly growth during July, August and September 2018, recent strength is due, in part, to the three-monthly weakness to June 2018 when it fell by $0.7 \%$. Figure 4 shows that the fall in Quarter 22018 was driven primarily by widespread weakness during April 2018, when monthly output fell by $0.9 \%$.

Figure 4: Index of Manufacturing, UK
Seasonally adjusted, January 2018 to September 2018
Figure 4: Index of Manufacturing, UK
Seasonally adjusted, January 2018 to September 2018


Source: Monthly Business Survey - Office for National Statistics

The rise of $1.9 \%$ in electricity and gas supply supports the overall rise in total production output. This is due primarily to weakness during Quarter 2 2018, driven by falls in monthly output during April 2018 of $3.0 \%$ and May 2018 of $4.2 \%$.

## 5. What is contributing to the month on previous month growth?

Monthly total production output remains flat at $0.0 \%$ in September 2018, following $0.0 \%$ growth during August 2018 and a rise of $0.4 \%$ during July 2018. Negligible growth this month is due primarily to:

- total manufacturing output increasing by $0.2 \%$
- decreases from mining and quarrying of $1.6 \%$, water and waste of $0.7 \%$ and electricity and gas supply of $0.3 \%$, which wholly offset manufacturing growth.

Strength within manufacturing is not broad-based, with only 6 of the 13 sub-sectors displaying increased output. Of these, only basic pharmaceutical products (3.9\%), chemicals and chemical products (2.8\%) and other manufacturing and repair (1.4\%), display any notable positive contribution to growth. Strength within basic pharmaceutical products and chemicals and chemical products are export-driven.

In contrast, there was a notable negative contribution from food products, beverages and tobacco, which fell by $1.3 \%$, partially offsetting overall manufacturing growth. Weakness within this sub-sector, although broad-based, is led by notable falls of $5.4 \%$ within soft drinks, mineral waters and bottled water, due to a very high August 2018, and $1.8 \%$ within alcoholic beverages

Mining and quarrying decreased by $1.6 \%$ due mainly to a fall of $1.9 \%$ in oil and gas extraction due to maintenance shutdowns carried over from August 2018.

## 6 . What is contributing to the three months on same three months a year ago increase?

Total production output for Quarter 3 (July to Sep) 2018 has increased by $0.7 \%$, compared with Quarter 32017. Growth is due primarily to:

- rises in three of the four main sectors
- an increase of $1.0 \%$ for total manufacturing output

The strength within manufacturing output is not broad-based, with only 6 of the 13 sub-sectors increasing. Overall growth in this sector is therefore driven by notable increases from:

- computer, electronic and optical products at $13.8 \%$
- food products, beverages and tobacco at 3.0\%.

The strength within computer, electronic and optical products is underpinned by an increase of $10.8 \%$ in nominal total turnover growth for Quarter 3 2018, compared with Quarter 32017.

Within food products, beverages and tobacco, there were notable upward contributions from three sub-industries, bakery and farinaceous products at $5.1 \%$; soft drinks, mineral waters and bottled water at $16.3 \%$; and alcoholic beverages at 6.2\%. These are all underpinned by increases in nominal total turnover growth for Quarter 32017 compared with Quarter 3 2017. Strength in both soft drinks and alcoholic drinks was due primarily to the impact of the sustained period of hot weather this summer, especially during July 2018, where the provisional UK mean temperature was $17.3^{\circ} \mathrm{C}$, which is $2.2^{\circ} \mathrm{C}$ above the 1981-2010 long-term average, making it provisionally the joint second warmest July (alongside 1983, after 2006) in a series from 1910.

Supporting the seasonally adjusted growth in total manufacturing output is a non-seasonally adjusted increase in nominal total manufacturing turnover of $2.7 \%$. This was driven by an increase in nominal total manufacturing export and domestic growth of $4.9 \%$ and $1.6 \%$ respectively, published today ( 9 November 2018) in our Monthly Business Survey turnover in production industries dataset alongside this release.

Partially offsetting overall total production growth is a fall in electricity and gas supply of $1.0 \%$. Within this sector, the fall of $1.2 \%$ from gas distribution and supply is due to reduced demand, again due to higher temperatures, primarily during July 2018, as indicated earlier.

The three months on three months a year ago rate for manufacturing output displays growth for the 28th consecutive period, following a $0.1 \%$ fall in May 2016. However, it is helpful to understand the longer-term trend, which clearly shows that since growth peaked in November 2017 at $3.8 \%$, output has slowed (Figure 5).

Figure 5: Index of Manufacturing three months on three months a year ago growth, UK
Seasonally adjusted, January 2016 to September 2018
Figure 5: Index of Manufacturing three months on three months a year ago growth, UK
Seasonally adjusted, January 2016 to September 2018

Index year, 2016=100


Source: Monthly Business Survey - Office for National Statistics

## 7. Upcoming changes

In the next few months, we intend publishing an article exploring recent developments in the motor trades and motor vehicles production industries.

## 8 . Links to related statistics

Alongside this publication we publish the Index of Services (loS) and Construction output in Great Britain, allowing for an estimate of monthly gross domestic product (GDP), which is also published today (9 November 2018).

The corresponding price indices used to deflate the Index of Production (IoP) are published in the monthly publication of UK producer price inflation. Product sales by manufacturers are published on an annual basis in UK manufacturers' sales by product (ProdCom) statistical bulletins; estimates are in current prices, unlike the chained volume measures published in the loP release.

The data published by the Department for Business, Energy and Industrial Strategy (BEIS) in Energy trends are used to measure the mining and quarrying, electricity and gas, and the manufacture of coke and refined petroleum products sectors within this release.

The loP follows the Eurostat short-term statistics (STS) regulation for measuring output in production. The latest release of industrial production and output in manufacturing are available from Eurostat and are updated monthly. It should be noted that an accurate comparison cannot be made between our publication and the Eurostat publication without re-indexing the data to the same base year, as Eurostat data are calculated on a 2015 equals 100 basis, while UK data are calculated on a 2016 equals 100 basis.

## 9. Quality and methodology

The Index of Production (loP) measures the UK output in the mining and quarrying; manufacturing; energy supply; and water supply and waste management industries. The loP estimates are based mainly on data from the Monthly Business Survey (MBS).

In addition, from the Index of Production, UK: November 2017 bulletin published in January 2018, Value Added Tax (VAT) data have been included across 64 production industries for small and medium-sized businesses. For further information as to the use of VAT turnover within the national accounts, please see VAT turnover data in National Accounts: background and methodology (published on 19 March 2018).

For the mining and quarrying, and energy supply sectors, and two manufacturing industries, namely coke and refined petroleum, and basic iron and steel, we receive volume data from the Department for Business, Energy and Industrial Strategy (BEIS) and the International Steel Statistics Bureau (ISSB) respectively. Unless otherwise stated, all estimates included in this release are based on seasonally adjusted data.

The Monthly Business Survey turnover in production industries dataset produces the proportion of turnover from exports by industry and level of turnover and exports ( $£$ millions). However, this is not always comparable with UK trade statistics, for many reasons. These include, but are not limited to:

- different data sources - MBS are based on a survey of businesses; UK trade in goods uses administrative data collected by HM Revenue and Customs (HMRC)
- different concepts being measured - MBS reports the value of exports as a proportion of the industry's turnover; the UK trade in goods data report the change in ownership between the UK and other countries
- time lag - there can be time lags between the sale of a product reported in MBS and the movements of that product reported by UK trade

Further information on UK trade and how data on it are compiled can be found in the Things you need to know about this release section of the UK trade release.

The data collected on the MBS are turnover excluding VAT and exports for some applicable industries. The data collected on the VAT returns are also turnover excluding VAT. These data are then deflated using Producer Price Indices (PPI). Within the manufacturing sector we also receive direct volume data from BEIS for fuel industries and from the International Steel Statistics Bureau for steel industries.

The mining and quarrying sector is comprised mainly of data from BEIS, including volume of oil and gas extraction and coal extraction. The data used to produce the energy sector are also from BEIS and include energy and gas supply output. A comprehensive list of the loP source data can be found in the Gross domestic product (GDP(O)) source catalogue (XLS, 715 KB ).

Revisions to the Index of Production can be made for a variety of reasons. The most common include:

- late responses to surveys and administrative sources
- forecasts being replaced by actual data
- revisions to seasonal adjustment factors, which are re-estimated every month and reviewed annually
- Her Majesty's Revenue and Customs (HMRC) VAT returns replacing MBS data for small and mediumsized businesses when VAT estimates become available every quarter

Within the suite of datasets published monthly alongside this release, you will find:

- Output of the production industries (IOP5) publication tables
- Revisions to output of the production industries (IOP5R)
- Monthly Business Survey response rates for production industries for this publication
- Revision triangle - monitors the size of monthly and three-monthly revisions
- Index of Production weights 2016 equals 100
- Index of Production and industry sectors to four decimal places
- Monthly Business Survey turnover in production industries
- Export proportions for manufacturing industries

The Index of Production Quality and Methodology Information report contains important information on:

- the strengths and limitations of the data and how it compares with related data
- uses and users of the data
- how the output was created
- the quality of the output including the accuracy of the data

Summary information can be found in the Index of Production Quality and Methodology Information report.

National Statistics

## Office for

National Statistics

Output of the Production Industries, September 2018

| Page 1 | Output by Broad industry groups and Main industrial groupings <br> Percentage change, latest year on previous year <br> Percentage change, latest month on same month a year ago |
| :---: | :---: |
| Page 2 | Percentage change, latest month on previous month |
|  | Percentage change, latest 3 months on same 3 months a year ago |
| Page 3 | Percentage change, latest 3 months on previous 3 months |
| Page 4 | Output by Manufacturing sub-sectors part 1 |
|  | Percentage change, latest year on previous year |
|  | Percentage change, latest month on same month a year ago |
| Page 5 | Output by Manufacturing sub-sectors part 2 |
|  | Percentage change, latest year on previous year |
|  | Percentage change, latest month on same month a year ago |
| Page 6 | Percentage change, latest month on previous month part 1 |
|  | Percentage change, latest 3 months on same 3 months a year ago |
| Page 7 | Percentage change, latest month on previous month part 2 |
|  | Percentage change, latest 3 months on same 3 months a year ago |
| Page 8 | Percentage change, latest 3 months on previous 3 months part 1 |
| Page 9 | Percentage change, latest 3 months on previous 3 months part 2 |
| Enquiries |  |

## IOP5 output ot the Production industries <br> Chained volume indices of gross value added

Seasonally adjusted $2016=100$

|  |  | Broad industry groups |  |  |  |  |  | Main industrial groupings |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Production industries | Mining and quarrying | Manufacturing | Electricity, gas, steam and air conditioning | Water supply, sewerage and waste management | Oil and gas extraction | Consumer durables | Consumer non-durables | Capital goods | Intermediate goods | Energy |
| Sectio |  | B+C+D+E | B | C | D | E | 06 | MIG-CD | MIG-CND | MIG-CAG | MIG-IG | MIG-NRG |
| Latest weight |  | 1000.0 | 75.4 | 726.2 | 126.0 | 72.4 | 52.6 | 49.3 | 204.4 | 240.5 | 267.9 | 219.9 |
|  |  | K222 | K224 | K22A | K248 | K24C | K226 | K24Q | K24R | K24S | K24O | K24T |
| 2013 |  | 96.4 | 91.8 | 96.8 | 103.1 | 90.9 | 86.7 | 93.1 | 98.9 | 95.5 | 97.7 | 96.8 |
| 2014 |  | 97.9 | 92.3 | 99.6 | 96.9 | 91.5 | 85.8 | 99.0 | 99.4 | 98.4 | 102.6 | 93.4 |
| 2015 |  | 99.0 | 99.7 | 99.6 | 97.9 | 94.7 | 95.8 | 98.9 | 99.9 | 97.4 | 102.4 | 97.9 |
| 2016 |  | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| 2017 |  | 102.0 | 100.6 | 102.6 | 98.3 | 103.0 | 99.3 | 103.0 | 98.9 | 106.5 | 102.3 | 98.9 |
| 2017 | Q3 | 102.4 | 102.3 | 102.8 | 99.8 | 102.3 | 101.4 | 102.7 | 98.4 | 107.7 | 102.3 | 100.1 |
|  | Q4 | 102.9 | 97.8 | 104.1 | 99.1 | 103.0 | 95.2 | 105.2 | 99.3 | 109.2 | 103.8 | 98.2 |
| 2018 | Q1 | 103.1 | 100.3 | 104.0 | 100.2 | 101.7 | 99.7 | 111.2 | 99.3 | 110.5 | 102.1 | 99.8 |
|  | Q2 | 102.2 | 101.0 | 103.3 | 96.9 | 102.5 | 99.9 | 113.8 | 100.7 | 108.6 | 100.9 | 97.7 |
|  | Q3 | 103.1 | 102.7 | 103.9 | 98.8 | 102.8 | 101.6 | 113.1 | 100.5 | 109.3 | 102.2 | 99.4 |
| 2017 | Jul | 102.1 | 101.8 | 102.5 | 99.3 | 102.4 | 100.1 | 100.7 | 98.2 | 107.7 | 102.1 | 99.4 |
|  | Aug | 102.0 | 101.4 | 102.4 | 99.6 | 102.1 | 100.4 | 102.9 | 98.8 | 106.9 | 101.7 | 99.7 |
|  | Sep | 103.0 | 103.6 | 103.5 | 100.3 | 102.2 | 103.7 | 104.4 | 98.4 | 108.6 | 103.1 | 101.1 |
|  | Oct | 103.2 | 105.5 | 104.0 | 97.2 | 103.1 | 106.4 | 103.8 | 99.0 | 109.3 | 103.5 | 100.0 |
|  | Nov | 103.3 | 103.8 | 104.1 | 99.2 | 102.6 | 103.4 | 104.9 | 99.8 | 108.5 | 104.1 | 100.1 |
|  | Dec | 102.3 | 84.0 | 104.3 | 100.9 | 103.3 | 75.8 | 106.9 | 99.1 | 109.8 | 103.8 | 94.4 |
| 2018 | Jan | 103.1 | 102.6 | 104.4 | 97.4 | 101.0 | 102.3 | 109.5 | 99.2 | 110.6 | 103.3 | 98.5 |
|  | Feb | 103.2 | 100.6 | 104.0 | 100.7 | 101.7 | 99.7 | 110.8 | 100.1 | 110.4 | 101.8 | 100.1 |
|  | Mar | 103.0 | 97.7 | 103.6 | 102.6 | 102.3 | 97.2 | 113.2 | 98.6 | 110.6 | 101.3 | 100.7 |
|  | Apr | 102.3 | 104.6 | 102.7 | 99.6 | 100.8 | 106.1 | 113.0 | 99.3 | 108.3 | 100.4 | 100.9 |
|  | May | 101.7 | 99.1 | 103.0 | 95.4 | 102.1 | 97.0 | 114.9 | 100.4 | 108.7 | 100.6 | 95.9 |
|  | Jun | 102.7 | 99.2 | 104.0 | 95.8 | 104.5 | 96.5 | 113.4 | 102.4 | 108.9 | 101.6 | 96.2 |
| JulAugSep |  | 103.1 | $102.7{ }^{\text {' }}$ | $103.8{ }^{\prime}$ | $99.1{ }^{\prime}$ | $102.9{ }^{\text {' }}$ | $101.8{ }^{\prime}$ | 113.9 ' | $100.9{ }^{\text {' }}$ | $109.0{ }^{\prime}$ | 102.1 | 99.5 |
|  |  | $103.1{ }^{\text {' }}$ | 103.5 | 103.7 | 98.8 | 103.1 | 102.4 | 112.9 | 100.1 | 109.4 | $102.2{ }^{\text {' }}$ | 99.8 |
|  |  | 103.0 | 101.8 | 104.0 | 98.4 | 102.4 | 100.5 | 112.4 | 100.5 | 109.6 | 102.2 | 98.8 |



IOP5 output ot the proaction industries
Chained volume indices of gross value added'

| continued |  | 兂 | 崖 |  |  |  |  |  |  | Seasonally adju | $2016=100$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Broad industry groups |  |  |  |  |  | Main industrial groupings |  |  |  |  |
|  | Production industries | Mining and quarrying | Manufacturing | Electricity, gas, steam and air conditioning | Water supply, sewerage and waste management | Oil and gas extraction | Consumer durables | Consumer non-durables | Capital goods | Intermediate goods | Energy |
| Section | B+C+D+E | B | C | D | E | 06 | MIG-CD | MIG-CND | MIG-CAG | MIG-IG | MIG-NRG |
| Latest weight | 1000.0 | 75.4 | 726.2 | 126.0 | 72.4 | 52.6 | 49.3 | 204.4 | 240.5 | 267.9 | 219.9 |
|  | K222 | K224 | K22A | K248 | K24C | K226 | K24Q | K24R | K24S | K24O | K24T |


| Percentage change, latest month on previous month |  |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2016 | Jul | 0.2 | 7.0 | -0.5 | -1.2 | 0.4 | 9.4 | 3.6 | -1.3 | -1.2 | 0.6 | 2.3 |
|  | Aug | - | -3.4 | 0.5 | -0.5 | -0.3 | -4.7 | -0.5 | 0.7 | 0.8 | 0.5 | -1.9 |
|  | Sep | - | -3.2 | 0.8 | -2.1 | -0.2 | -4.4 | -0.1 | 1.0 | 0.8 | 0.4 | -2.1 |
|  | Oct | -1.3 | -8.3 | -1.3 | 2.4 | 0.4 | -10.9 | 1.9 | -2.1 | -1.8 | -0.3 | -1.9 |
|  | Nov | 2.3 | 6.5 | 1.5 | 4.9 | 0.7 | 8.8 | -1.3 | 3.0 | 0.6 | 1.3 | 5.4 |
|  | Dec | 1.2 | -1.0 | 2.6 | -5.0 | -0.1 | -0.7 | 2.7 | 2.8 | 3.8 | 1.8 | -3.3 |
| 2017 | Jan | -0.4 | 1.7 | -1.2 | 2.1 | 2.1 | 1.6 | -0.4 | -3.2 | 0.3 | -1.3 | 1.6 |
|  | Feb | -0.8 | -0.6 | -0.5 | -4.0 | 0.6 | -1.4 | 0.8 | -2.3 | 1.0 | -0.5 | -2.8 |
|  | Mar | -0.5 | 2.2 | -0.2 | -4.8 | 0.4 | 3.0 | -4.6 | 1.3 | -1.3 | - | -2.2 |
|  | Apr | 0.4 | -2.1 | 0.3 | 4.2 | -1.4 | -4.2 | 0.5 | 0.4 | -0.1 | 0.8 | 1.3 |
|  | May | 0.6 | 1.7 | 0.2 | 2.6 | -0.1 | 3.0 | 2.6 | -0.2 | 1.1 | -0.3 | 2.6 |
|  | Jun | 0.4 | 4.5 | 0.3 | -0.9 | - | 6.5 | 3.9 | 0.6 | 0.4 |  | 1.1 |
|  | Jul | 0.1 | -3.7 | 0.3 | 1.6 | -0.4 | -5.7 | -5.0 | -1.5 | 2.2 | 0.4 | -1.3 |
|  | Aug | -0.1 | -0.4 | -0.1 | 0.3 | -0.3 | 0.3 | 2.2 | 0.6 | -0.7 | -0.4 | 0.3 |
|  | Sep | 1.0 | 2.2 | 1.0 | 0.6 | 0.1 | 3.3 | 1.5 | -0.3 | 1.6 | 1.4 | 1.4 |
|  | Oct | 0.2 | 1.8 | 0.5 | -3.1 | 0.9 | 2.6 | -0.6 | 0.6 | 0.7 | 0.3 | -1.1 |
|  | Nov | 0.1 | -1.6 | 0.1 | 2.0 | -0.5 | -2.8 | 1.0 | 0.7 | -0.8 | 0.6 | 0.1 |
|  | Dec | -1.0 | -19.0 | 0.2 | 1.7 | 0.7 | -26.7 | 1.9 | -0.6 | 1.2 | -0.3 | -5.6 |
| 2018 | Jan | 0.8 | 22.1 | 0.1 | -3.5 | -2.2 | 35.0 | 2.5 | 0.1 | 0.7 | -0.4 | 4.3 |
|  | Feb | - | -2.0 | -0.4 | 3.4 | 0.7 | -2.6 | 1.2 | 0.9 | -0.1 | -1.5 | 1.5 |
|  | Mar | -0.2 | -2.9 | -0.4 | 1.9 | 0.6 | -2.6 | 2.1 | -1.5 | 0.2 | -0.5 | 0.7 |
|  | Apr | -0.6 | 7.1 | -0.9 | -3.0 | -1.5 | 9.2 | -0.1 | 0.7 | -2.0 | -0.8 | 0.2 |
|  | May | -0.6 | -5.3 | 0.3 | -4.2 | 1.3 | -8.6 | 1.6 | 1.1 | 0.4 | 0.2 | -4.9 |
|  | Jun | 0.9 | - | 1.0 | 0.5 | 2.3 | -0.6 | -1.3 | 2.0 | 0.1 | 1.0 | 0.3 |
|  | Jul | 0.4 | $3.5{ }^{\text { }}$ | -0.2 ${ }^{\text {1 }}$ | $3.4{ }^{\text {' }}$ | -1.5 ${ }^{\text { }}$ | $5.5{ }^{\text { }}$ | $0.4{ }^{\text { }}$ | -1.5 ${ }^{\text { }}$ | $0.2{ }^{\text { }}$ | 0.5 | 3.4 |
|  | Aug | - ${ }^{\top}$ | 0.8 | -0.1 | -0.3 | 0.2 | 0.6 | -0.8 | -0.8 | 0.3 | $0.1{ }^{\top}$ | 0.2 |
|  | Sep | - | -1.6 | 0.2 | -0.3 | -0.7 | -1.9 | -0.4 | 0.4 | 0.3 | -0.1 | -1.0 |



IOP5 $\begin{gathered}\text { output ot the proaction industries }\end{gathered}$
Chained volume indices of gross value added ${ }^{1}$

| continued |  |  |  |  |  |  |  |  |  | Seasonally adju | $2016=100$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Broad industry groups |  |  |  |  |  | Main industrial groupings |  |  |  |  |
|  | Production industries | Mining and quarrying | Manufacturing | Electricity, gas, steam and air conditioning | Water supply, sewerage and waste management | Oil and gas extraction | Consumer durables | Consumer non-durables | Capital goods | Intermediate goods | Energy |
| Section | B+C+D+E | B | C | D | E | 06 | MIG-CD | MIG-CND | MIG-CAG | MIG-IG | MIG-NRG |
| Latest weight | 1000.0 | 75.4 | 726.2 | 126.0 | 72.4 | 52.6 | 49.3 | 204.4 | 240.5 | 267.9 | 219.9 |
|  | K222 | K224 | K22A | K248 | K24C | K226 | K24Q | K24R | K24S | K24O | K24T |


| Percentage change, latest 3 months on previous 3 months ${ }^{2}$ |  |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2016 | Jul | 0.6 | 4.3 | 0.1 | -0.6 | 2.8 | 5.3 | 0.3 | -1.8 | 2.0 | -0.2 | 1.5 |
|  | Aug | -0.1 | 6.0 | -0.5 | -2.4 | 1.0 | 7.6 | -0.5 | -2.7 | 1.1 | -0.4 | 1.0 |
|  | Sep | -0.4 | 5.1 | -0.5 | -3.9 | 0.1 | 6.5 | 0.7 | -2.5 | 0.2 | 0.1 | - |
|  | Oct | -0.5 | -3.2 | 0.1 | -2.1 | -0.5 | -4.4 | 1.3 | -0.9 | 0.3 | 0.7 | -2.4 |
|  | Nov | -0.1 | -6.7 | 0.6 | 0.4 | 0.2 | -9.1 | 1.5 | 0.6 | -0.1 | 1.2 | -2.1 |
|  | Dec | 0.6 | -7.8 | 1.3 | 2.4 | 0.6 | -10.3 | 1.6 | 1.7 | 0.6 | 1.7 | -1.5 |
| 2017 | Jan | 2.1 | -0.8 | 2.3 | 3.0 | 1.5 | -1.0 | 1.5 | 2.7 | 2.3 | 2.1 | 1.7 |
|  | Feb | 1.7 | 1.2 | 2.3 | -1.2 | 2.1 | 1.5 | 2.4 | 1.1 | 4.1 | 1.6 | -0.3 |
|  | Mar | 0.4 | 3.5 | 0.7 | -4.0 | 2.8 | 3.9 | -0.1 | -1.5 | 3.2 | 0.1 | -1.5 |
|  | Apr | -0.9 | 0.9 | -0.4 | -6.2 | 1.7 | -0.1 | -1.5 | -2.5 | 1.4 | -0.5 | -3.8 |
|  | May | -0.7 | 1.5 | -0.6 | -3.3 | 0.5 | 0.7 | -3.0 | -1.2 | -0.3 | -0.3 | -1.8 |
|  | Jun | 0.3 | 1.8 | 0.3 | 0.8 | -1.0 | 1.4 | 0.7 | 0.6 | 0.2 | 0.4 | 1.0 |
|  | Jul | 1.0 | 2.7 | 0.7 | 3.6 | -1.1 | 3.4 | 2.2 | 0.4 | 1.6 | 0.4 | 3.0 |
|  | Aug | 1.0 | 2.2 | 0.7 | 3.3 | -0.9 | 3.1 | 3.1 | -0.2 | 2.3 | 0.2 | 2.5 |
|  | Sep | 0.9 | 0.2 | 0.9 | 2.2 | -0.6 | 0.5 | 0.2 | -0.9 | 2.9 | 0.5 | 0.9 |
|  | Oct | 0.9 | 0.6 | 1.1 | 0.4 | -0.2 | 1.5 | 0.8 | -0.2 | 2.2 | 0.9 | 0.4 |
|  | Nov | 1.1 | 1.3 | 1.4 | \% | 0.2 | 2.2 | 1.2 | 0.2 | 2.0 | 1.7 | 0.5 |
|  | Dec | 0.6 | -4.4 | 1.3 | -0.7 | 0.7 | -6.1 | 2.5 | 0.9 | 1.4 | 1.4 | -1.9 |
| 2018 | Jan | 0.2 | -6.5 | 0.9 | 0.1 | -0.2 | -9.3 | 3.3 | 0.6 | 1.2 | 1.0 | -2.6 |
|  | Feb | -0.3 | -8.2 | 0.4 | 0.8 | -0.6 | -11.4 | 4.5 | 0.4 | 1.3 | -0.5 | -2.7 |
|  | Mar | 0.1 | 2.6 | -0.1 | 1.2 | -1.3 | 4.8 | 5.7 | . | 1.2 | -1.6 | 1.6 |
|  | Apr | -0.1 | 4.3 | -0.8 | 1.8 | -0.7 | 7.6 | 4.9 | - | 0.2 | -2.5 | 3.0 |
|  | May | -0.5 | 5.0 | -1.1 | -0.5 | -0.2 | 8.1 | 4.2 | - | -0.9 | -2.1 | 1.6 |
|  | Jun | -0.8 | 0.7 | -0.7 | -3.3 | 0.8 | 0.1 | 2.3 | 1.4 | -1.7 | -1.2 | -2.1 |
|  | Jul | -0.3 | -0.6 | 0.2 | -4.2 ${ }^{\text { }}$ | $1.5{ }^{\text { }}$ | -2.5 | $1.5{ }^{\text { }}$ | $1.9{ }^{\text { }}$ | -0.8 ${ }^{\top}$ | 0.3 | -3.3 ${ }^{\text { }}$ |
|  | Aug | $0.6{ }^{\top}$ | $1.3{ }^{\top}$ | $0.7{ }^{\top}$ | -1.3 | 1.7 | $0.1{ }^{\top}$ | -0.2 | 1.7 | -0.1 | 1.2 | -0.7 |
|  | Sep | 0.8 | 1.7 | 0.6 | 1.9 | 0.3 | 1.7 | -0.6 | -0.2 | 0.6 | 1.3 | 1.7 |
| 1 | Any apparent inconsistencies between the index numbers and the percentage changes shown in these tables are due to rounding |  |  |  |  | ${ }^{\dagger}$ indicates that data are new or have been revised. The period marked is the earliest in the table to have been revised |  |  |  |  |  |  |
| 2 | Any apparent inconsistencies between these tables and the latest GDP estimate are due to rounding. |  |  |  |  |  |  |  |  |  |  |  |

10 P5 Output of the Production Industries

| Seasonally adjusted $2016=100$ |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Food products, beverages and tobacco | Textiles, wearing apparel and leather products | Wood and paper products and printing | Coke and refined petroleum products | Chemicals and chemical products | Basic pharmaceutical products and preparations |
| Sectio |  | CA | CB | CC | CD | CE | CF |
| Latest weight |  | 111.5 | 29.8 | 53.6 | 9.9 | 48.6 | 55.1 |
|  |  | K22B | K22P | K22T | K22X | K22Z | K239 |
| 2013 |  | 95.4 | 106.4 | 99.9 | 108.6 | 97.7 | 101.9 |
| 2014 |  | 99.4 | 103.6 | 101.0 | 98.9 | 100.4 | 97.0 |
| 2015 |  | 99.3 | 102.7 | 101.7 | 101.4 | 105.9 | 97.8 |
| 2016 |  | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| 2017 |  | 101.0 | 102.8 | 102.2 | 101.3 | 102.4 | 94.6 |
| 2017 | Q3 | 100.8 | 102.6 | 101.5 | 98.8 | 103.2 | 93.8 |
|  | Q4 | 101.3 | 102.9 | 102.9 | 99.6 | 101.2 | 96.7 |
| 2018 | Q1 | 101.8 | 99.4 | 101.9 | 93.3 | 101.8 | 96.2 |
|  | Q2 | 102.7 | 99.9 | 101.3 | 94.5 | 100.4 | 100.3 |
|  | Q3 | 103.7 | 99.6 | 102.3 | 95.8 | 102.4 | 97.2 |
| 2017 | Jul | 101.2 | 104.1 | 100.7 | 94.7 | 102.3 | 92.0 |
|  | Aug | 101.1 | 102.3 | 101.3 | 98.5 | 103.1 | 94.4 |
|  | Sep | 100.0 | 101.3 | 102.5 | 103.3 | 104.0 | 95.1 |
|  | Oct | 101.2 | 101.6 | 102.3 | 102.4 | 100.8 | 97.1 |
|  | Nov | 101.9 | 103.2 | 103.4 | 98.4 | 102.3 | 97.1 |
|  | Dec | 100.7 | 103.9 | 103.0 | 98.1 | 100.4 | 96.0 |
| 2018 | Jan | 101.8 | 101.2 | 102.6 | 94.2 | 101.1 | 95.8 |
|  | Feb | 101.6 | 97.9 | 101.4 | 91.1 | 103.1 | 98.8 |
|  | Mar | 102.1 | 99.3 | 101.8 | 94.7 | 101.0 | 93.9 |
|  | Apr | 102.2 | 99.0 | 100.7 | 97.3 | 99.4 | 96.8 |
|  | May | 102.8 | 100.6 | 101.8 | 93.2 | 100.5 | 99.0 |
|  | Jun | 103.2 | 100.1 | 101.5 | 92.9 | 101.2 | 105.2 |
|  | Jul | 104.3 | 101.3 | 103.7 | 92.6 | 102.4 | 95.3 |
|  | Aug | 104.1 | 100.0 | 101.4 | 97.5 | 101.0 | 96.2 |
|  | Sep | 102.8 | 97.7 | 101.6 | 97.2 | 103.8 | 100.0 |

Percentage change, latest year on previous year

| 2013 | -1.7 | -4.4 | 2.3 | -1.9 | -2.7 |  |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 2014 | 4.2 | -2.6 | 1.1 | -8.9 | -4.8 |  |
| 2015 | -0.1 | -0.9 | 0.8 | 2.5 | 0.9 |  |
| 2016 | 0.7 | -2.6 | -1.7 | -1.4 | 2.4 | -5.2 |
| 2017 | 1.0 | 2.8 | 2.2 | 1.3 | -5.4 |  |

Percentage change, latest month on same month a year ago


[^0]$\xrightarrow{10 \text { Continued }}$ Chatput of the Production Industries


Percentage change, latest year on previous year


[^1]
## 105 Output of the Production Industries

| continued |  |  |  |  | Seasonally adjusted 2016 = 10C |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Food products, beverages and tobacco | Textiles, wearing apparel and leather products | Wood and paper products and printing | Coke and refined petroleum products | Chemicals and chemical products | Basic pharmaceutical products and preparations |
| Section | CA | CB | CC | CD | CE | CF |
| Latest weight | 111.5 | 29.8 | 53.6 | 9.9 | 48.6 | 55.1 |
|  | K22B | K22P | K22T | K22X | K22Z | K239 |

Percentage change, latest month on previous month


Percentage change, latest 3 months on same 3 months a year ago

| 2016 | Jul | 2.0 | -7.9 | -0.9 | 5.0 | -5.4 | -2.1 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Aug | 1.1 | -3.7 | -0.9 | -0.3 | -6.1 | -2.5 |
|  | Sep | 0.7 | -2.0 | -1.3 | -5.3 | -4.8 | -3.1 |
|  | Oct | 0.1 | -2.1 | -1.3 | -5.9 | -4.5 | -3.3 |
|  | Nov | -0.2 | -4.1 | -1.6 | -5.0 | -4.5 | 0.6 |
|  | Dec | -0.1 | -4.3 | -0.5 | -4.9 | -4.1 | 6.1 |
| 2017 | Jan | 0.4 | -4.6 | 0.9 | -3.5 | -2.1 | 10.2 |
|  | Feb | 0.6 | -2.6 | 2.4 | -1.6 | -0.1 | 3.1 |
|  | Mar | 1.5 | 0.3 | 3.3 | 3.9 | 1.9 | -5.6 |
|  | Apr | 1.9 | 2.2 | 3.1 | 9.6 | 3.0 | -12.0 |
|  | May | 1.5 | 3.4 | 2.7 | 10.4 | 4.0 | -10.1 |
|  | Jun | 0.5 | 2.9 | 1.9 | 7.0 | 4.6 | -7.2 |
|  | Jul | 0.4 | 5.4 | 1.6 | 0.5 | 3.8 | -2.1 |
|  | Aug | 1.2 | 4.6 | 1.4 | -0.2 | 4.1 | -0.9 |
|  | Sep | 0.7 | 3.5 | 1.6 | -0.7 | 2.8 | -1.6 |
|  | Oct | 0.8 | 2.5 | 2.1 | 0.7 | 2.1 | -0.2 |
|  | Nov | 1.2 | 3.2 | 2.5 | -2.6 | 1.7 | -2.4 |
|  | Dec | 1.4 | 4.4 | 1.9 | -4.4 | 0.5 | -6.8 |
| 2018 | Jan | 1.2 | 3.4 | 0.9 | -6.7 | -0.5 | -8.3 |
|  | Feb | 0.6 | 0.2 | 0.4 | -7.6 | -0.4 | -3.2 |
|  | Mar | 0.8 | -3.3 | -0.3 | -9.0 | -0.5 | 3.5 |
|  | Apr | 0.5 | -4.5 | -0.6 | -8.3 | -1.1 | 5.6 |
|  | May | 1.2 | -3.8 | -1.0 | -8.3 | -2.5 | 3.3 |
|  | Jun | 1.6 | -2.7 | -0.7 | -9.4 | -2.7 | 5.6 |
|  | Jul | $2.6{ }^{\top}$ | $-2.5{ }^{\top}$ | 0.8 | -8.4 ${ }^{\top}$ | $-1.2{ }^{\top}$ | $5.4{ }^{\top}$ |
|  | Aug | 2.7 | -2.4 | $1.0{ }^{\top}$ | -5.0 | -1.3 | 5.0 |
|  | Sep | 3.0 | -2.9 | 0.7 | -3.1 | -0.7 | 3.5 |




Percentage change, latest month on previous montl

| 2016 | Jul | -0.7 | 1.1 | 2.7 | -2.1 | 1.9 | -2.0 | -1.7 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Aug | 0.4 | 0.1 | -0.4 | -0.2 | 2.1 | 2.3 | -1.2 |
|  | Sep | 1.4 | -1.1 | -0.8 | 2.2 | -0.3 | -1.2 | 3.3 |
|  | Oct | 0.2 | -3.2 | 2.9 | 2.0 | -1.9 | -1.2 | -1.2 |
|  | Nov | 0.6 | 2.3 | -1.2 | 4.1 | 3.4 | 1.2 | -1.7 |
|  | Dec | -0.9 | 7.1 | 6.1 | -1.7 | 3.0 | 1.0 | 3.9 |
| 2017 | Jan | -0.2 | -5.3 | -3.1 | -0.2 | -0.7 | 2.4 | 2.0 |
|  | Feb | -1.0 | -0.7 | -0.2 | 2.5 | 5.9 | -0.4 | 1.9 |
|  | Mar | 1.2 | 0.2 | -5.5 | -4.6 | -4.5 | -1.1 | -0.4 |
|  | Apr | 0.1 | - | 0.9 | 4.3 | -2.1 | 2.3 | -3.1 |
|  | May | 0.5 | 1.0 | 4.5 | -2.4 | 3.8 | -1.1 | 0.7 |
|  | Jun | -2.2 | 2.2 | 6.2 | 4.4 | -3.8 | -3.5 | 4.2 |
|  | Jul | 0.8 | -2.3 | -7.2 | 0.7 | 4.7 | 7.1 | 0.1 |
|  | Aug | 0.2 | 1.9 | 2.8 | -5.4 | 0.7 | -2.6 | -1.3 |
|  | Sep | 1.1 | 0.9 | 2.7 | 4.6 | 3.3 | 0.1 | 2.6 |
|  | Oct | -0.2 | 2.8 | -0.8 | -1.1 | 0.6 | 3.1 | -3.1 |
|  | Nov | 1.7 | -0.2 | 1.4 | -0.7 | 1.4 | -3.9 | 1.3 |
|  | Dec | -2.2 | 3.2 | 2.0 | 1.0 | 0.7 | 1.3 | 0.5 |
| 2018 | Jan | 0.7 | -3.9 | 2.8 | -0.8 | 3.6 | 1.5 | -0.9 |
|  | Feb | -2.3 | 1.6 | 1.8 | -3.6 | -4.1 | 0.3 | -1.7 |
|  | Mar | 0.3 | -1.5 | 2.3 | -2.4 | 3.3 | -2.7 | 2.7 |
|  | Apr | -1.3 | -3.1 | 0.2 | 1.1 | -3.3 | -1.2 | -1.5 |
|  | May | 0.6 | -2.7 | 3.2 | 1.7 | -1.2 | 0.4 | -0.5 |
|  | Jun | 2.7 | 2.6 | -2.6 | -4.2 | - | -0.2 | 2.8 |
|  | Jul | -0.8 ${ }^{\top}$ | $0.9{ }^{\top}$ | $0.7{ }^{\top}$ | $1.7{ }^{\top}$ | $-1.6{ }^{\top}$ | $1.3{ }^{\top}$ | -1.2 ${ }^{\top}$ |
|  | Aug | -0.3 | 0.2 | -0.2 | 0.6 | -0.3 | 1.5 | -1.0 |
|  | Sep | -0.4 | 0.1 | -1.1 | 0.9 | -0.4 | - | 1.4 |

Percentage change, latest 3 months on same 3 months a year ag

| 2016 | Jul | 0.2 | -2.3 | -2.0 | -6.5 | -1.3 | 5.7 | 6.9 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Aug | 0.3 | -2.5 | -2.7 | -6.3 | -0.3 | 4.8 | 8.9 |
|  | Sep | 1.2 | -1.9 | -0.8 | -6.7 | 0.8 | 4.1 | 8.8 |
|  | Oct | 2.3 | -3.3 | 0.5 | -5.8 | 1.2 | 2.4 | 9.7 |
|  | Nov | 3.0 | -3.0 | 1.8 | -2.4 | 2.7 | 2.4 | 7.9 |
|  | Dec | 3.0 | 0.7 | 4.5 | 0.5 | 4.8 | 2.7 | 8.3 |
| 2017 | Jan | 2.3 | 1.2 | 4.8 | 2.2 | 6.7 | 4.6 | 7.1 |
|  | Feb | 0.7 | 0.4 | 5.9 | 2.5 | 9.7 | 6.5 | 9.5 |
|  | Mar | 0.3 | -2.1 | 3.7 | 2.3 | 9.5 | 6.4 | 9.9 |
|  | Apr | -0.4 | -1.2 | 1.4 | 3.3 | 7.7 | 5.2 | 9.1 |
|  | May | 0.1 | -0.2 | 0.2 | 3.8 | 5.8 | 2.7 | 7.5 |
|  | Jun | -0.6 | 1.1 | 3.9 | 6.0 | 6.0 | 0.8 | 6.2 |
|  | Jul | 0.3 | 1.1 | 5.3 | 8.2 | 8.4 | 2.4 | 7.1 |
|  | Aug | 0.2 | 1.5 | 6.0 | 8.3 | 7.9 | 2.8 | 7.8 |
|  | Sep | 0.6 | 1.6 | 4.8 | 8.3 | 9.6 | 4.6 | 8.2 |
|  | Oct | 0.3 | 4.9 | 5.8 | 6.1 | 11.4 | 4.8 | 7.2 |
|  | Nov | 0.4 | 6.8 | 6.6 | 4.1 | 12.9 | 5.0 | 7.3 |
|  | Dec | 0.2 | 6.7 | 4.7 | 2.4 | 12.2 | 4.7 | 6.5 |
| 2018 | Jan | 0.3 | 5.1 | 6.3 | 1.6 | 12.2 | 2.8 | 5.4 |
|  | Feb | -0.3 | 5.2 | 7.8 | 0.2 | 9.2 | 2.8 | 2.0 |
|  | Mar | -0.7 | 5.9 | 13.6 | -1.3 | 10.0 | 2.2 | 0.9 |
|  | Apr | -1.9 | 5.0 | 17.1 | -3.6 | 8.8 | 0.7 | 1.2 |
|  | May | -2.6 | 2.0 | 19.4 | -2.5 | 9.4 | -0.5 | 2.4 |
|  | Jun | -1.4 | -0.2 | 15.1 | -5.0 | 8.5 | - | 2.1 |
|  | Jul | -0.3 | -0.2 ${ }^{\top}$ | $14.5{ }^{\top}$ | -6.1 ${ }^{\top}$ | $5.9{ }^{\top}$ | $-0.3{ }^{\top}$ | 0.7 |
|  | Aug | $0.7{ }^{\text {T}}$ | 0.5 | 13.2 | -6.6 | 4.7 | 0.3 | - |
|  | Sep | -0.6 | 0.8 | 13.8 | -5.6 | 1.0 | -0.2 | -0.8 |

[^2]percentage changes shown in these tables are due to rounding. is the earliest in the table to have been revised.

| contin | inued |  |  |  |  | Seasonally | justed $2016=10 C$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Food products, beverages and tobacco | Textiles, wearing apparel and leather products | Wood and paper products and printing | Coke and refined petroleum products | Chemicals and chemical products | Basic pharmaceutical products and preparations |
| Sectio |  | CA | CB | CC | CD | CE | CF |
| Latest weight |  | 111.5 | 29.8 | 53.6 | 9.9 | 48.6 | 55.1 |
|  |  | K22B | K22P | K22T | K22X | K22Z | K239 |
| Percentage change, latest 3 months on previous 3 months |  |  |  |  |  |  |  |
| 2016 | Jul | 0.8 | -3.1 | 1.2 | 7.4 | -0.6 | -6.9 |
|  | Aug | 0.2 | -1.8 | 0.2 | 6.0 | -0.2 | -8.6 |
|  | Sep | -0.4 | -0.7 | -0.2 | 2.1 | 1.8 | -6.9 |
|  | Oct | -0.5 | 1.3 | - | -0.1 | 1.7 | -1.1 |
|  | Nov | -0.1 | 0.5 | 0.4 | 4.5 | 1.9 | 4.0 |
|  | Dec | -0.3 | -0.6 | 1.1 | 4.7 | 0.3 | 8.8 |
| 2017 | Jan | 0.3 | 0.1 | 2.1 | 3.1 | 1.3 | 9.7 |
|  | Feb | 0.9 | 1.9 | 1.7 | -1.7 | 1.2 | 1.3 |
|  | Mar | 1.2 | 4.3 | 1.2 | -1.6 | 1.5 | -10.5 |
|  | Apr | 1.2 | 4.0 | -0.2 | -0.9 | 0.6 | -13.0 |
|  | May | 0.4 | 2.7 | 0.5 | 1.4 | 1.0 | -6.6 |
|  | Jun | 0.1 | -0.1 | -0.1 | 1.6 | 0.9 | 2.3 |
|  | Jul | -0.6 | -0.1 | -0.3 | -1.5 | 0.2 | 3.6 |
|  | Aug | -0.1 | -0.6 | -1.1 | -4.2 | - | 0.8 |
|  | Sep | -0.3 | -0.1 | -0.5 | -5.2 | - | -1.3 |
|  | Oct | -0.1 | -1.4 | 0.5 | - | 0.1 | 0.8 |
|  | Nov | -0.1 | -0.8 | 1.4 | 2.1 | -0.5 | 2.4 |
|  | Dec | 0.5 | 0.3 | 1.4 | 0.8 | -1.9 | 3.1 |
| 2018 | Jan | 0.7 | 1.0 | 1.0 | -4.5 | -1.3 | 0.8 |
|  | Feb | 0.3 | -1.1 | -0.4 | -6.8 | -0.8 | 0.5 |
|  | Mar | 0.5 | -3.4 | -1.0 | -6.3 | 0.6 | -0.5 |
|  | Apr | 0.5 | -3.9 | -1.7 | -2.6 | -0.1 | 0.2 |
|  | May | 1.0 | -1.3 | -0.9 | 0.7 | -1.2 | -0.3 |
|  | Jun | 0.9 | 0.5 | -0.6 | 1.2 | -1.4 | 4.3 |
|  | Jul | 1.4 | $2.0{ }^{\top}$ | 1.1 | $-1.6{ }^{\top}$ | $0.2{ }^{\top}$ | $3.5{ }^{\top}$ |
|  | Aug | 1.5 | 0.8 | $0.8{ }^{\top}$ | 「 -0.8 | 1.2 | 2.4 |
|  | Sep | 1.0 | -0.3 | 0.9 | 1.4 | 2.0 | -3.2 |
| 1 | Any apparent inconsistencies between the index numbers and the percentage changes shown in these tables are due to rounding. |  |  |  | ${ }^{\dagger}$ indicates that data are new or have been revised. The perioc marked is the earliest in the table to have been revised. |  |  |

##  <br> Chained volume indices of gross value added ${ }^{1}$ <br> continued



Percentage change, latest $\mathbf{3}$ months on previous 3 months

| 2016 | Jul | -1.0 |  | -0.5 |  | 0.9 |  | -2.6 |  | -0.9 |  | 2.7 |  | 3.2 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Aug | -1.4 |  | 0.1 |  | -0.4 |  | -1.5 |  | -0.7 |  | 0.1 |  | 3.0 |
|  | Sep | -1.2 |  | 0.4 |  | -0.1 |  | -1.5 |  | 1.4 |  | -1.3 |  | 1.3 |
|  | Oct | 0.7 |  | -1.2 |  | 0.8 |  | 1.0 |  | 2.2 |  | -0.5 |  | 0.7 |
|  | Nov | 1.8 |  | -2.0 |  | 1.4 |  | 4.1 |  | 1.6 |  | -0.8 |  | 0.5 |
|  | Dec | 1.4 |  | - |  | 3.5 |  | 5.6 |  | 1.9 |  | -0.1 |  | 0.7 |
| 2017 | Jan | 0.6 |  | 2.6 |  | 3.5 |  | 5.0 |  | 3.8 |  | 1.5 |  | 1.8 |
|  | Feb | -0.9 |  | 3.5 |  | 4.1 |  | 2.3 |  | 6.2 |  | 2.8 |  | 4.3 |
|  | Mar | -0.9 |  | -0.6 |  | -1.6 |  | 0.1 |  | 4.8 |  | 2.8 |  | 5.2 |
|  | Apr | -0.6 |  | -1.9 |  | -3.7 |  | 0.1 |  | 2.5 |  | 1.5 |  | 3.2 |
|  | May | 0.7 |  | -1.7 |  | -4.6 |  | -1.1 |  | -1.2 |  | 0.5 |  | -0.3 |
|  | Jun | 0.1 |  | 1.3 |  | 2.1 |  | 1.8 |  | -2.1 |  | -0.5 |  | -0.9 |
|  | Jul | -0.3 |  | 1.7 |  | 4.8 |  | 2.0 |  | -0.3 |  | - |  | 1.3 |
|  | Aug | -1.3 |  | 1.9 |  | 5.4 |  | 2.8 |  | 1.3 |  | 0.2 |  | 3.2 |
|  | Sep | - |  | 1.0 |  | 0.7 |  | 0.6 |  | 4.9 |  | 2.4 |  | 3.1 |
|  | Oct | 0.7 |  | 2.5 |  | 1.2 |  | -1.0 |  | 4.9 |  | 1.8 |  | 0.8 |
|  | Nov | 1.9 |  | 3.1 |  | 1.9 |  | - |  | 6.2 |  | 1.3 |  | - |
|  | Dec | 1.0 |  | 5.0 |  | 3.5 |  | -0.1 |  | 4.2 |  | - |  | -0.9 |
| 2018 | Jan | 0.6 |  | 2.7 |  | 4.1 |  | 0.5 |  | 4.6 |  | -0.6 |  | 0.1 |
|  | Feb | -1.6 |  | 1.8 |  | 5.2 |  | -1.5 |  | 2.8 |  | 0.7 |  | -0.9 |
|  | Mar | -1.8 |  | -1.4 |  | 6.7 |  | -3.5 |  | 2.7 |  | 0.3 |  | -0.4 |
|  | Apr | -2.9 |  | -2.1 |  | 6.0 |  | -5.0 |  | -0.6 |  | -0.5 |  | -0.9 |
|  | May | -1.7 |  | -4.7 |  | 5.7 |  | -3.8 |  | -1.0 |  | -2.7 |  | - |
|  | Jun | -0.5 |  | -4.5 |  | 3.6 |  | -2.0 |  | -3.4 |  | -2.7 |  | 0.2 |
|  | Jul | 1.4 |  | -3.3 | ' | 2.5 | 1 | -0.7 | 1 | -2.9 | 1 | -1.0 | ' | 0.8 |
|  | Aug | 2.0 | T | 0.4 |  | -0.1 |  | -1.5 |  | -3.1 |  | 1.0 |  | 0.8 |
|  | Sep | 0.8 |  | 1.9 |  | -0.5 |  | - |  | -2.3 |  | 2.3 |  | 0.2 |

[^3]\footnotetext{
Office for
National Statistics

| Page 1 | Output by Broad industry groups and Main industrial groupings <br> Percentage change, latest year on previous year <br> Percentage change, latest month on same month a year ago |
| :---: | :---: |
| Page 2 | Percentage change, latest month on previous month |
|  | Percentage change, latest 3 months on same 3 months a year ago |
| Page 3 | Percentage change, latest 3 months on previous 3 months |
| Page 4 | Output by Manufacturing sub-sectors part 1 |
|  | Percentage change, latest year on previous year |
|  | Percentage change, latest month on same month a year ago |
| Page 5 | Output by Manufacturing sub-sectors part 2 |
|  | Percentage change, latest year on previous year |
|  | Percentage change, latest month on same month a year ago |
| Page 6 | Percentage change, latest month on previous month part 1 |
|  | Percentage change, latest 3 months on same 3 months a year ago |
| Page 7 | Percentage change, latest month on previous month part 2 |
|  | Percentage change, latest 3 months on same 3 months a year ago |
| Page 8 | Percentage change, latest 3 months on previous 3 months part 1 |
| Page 9 | Percentage change, latest 3 months on previous 3 months part 2 |
| Enquiries |  |

## Revisions to Output of the Production

Industries, September 2018

## IOP5R

Output of the Production Industries
Chained volume indices of gross value added
Seasonally adjusted $2016=100$

|  |  | Broad industry groups |  |  |  |  |  | Main industrial groupings |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Production industries | Mining and quarrying | Manufacturing | Electricity, gas, steam and air conditioning | Water supply, sewerage and waste management | Oil and gas extraction | Consumer durables | Consumer non-durables | Capital goods | Intermediate goods | Energy |
| Sectio |  | B+C+D+E | B | C | D | E | 06 | MIG-CD | MIG-CND | MIG-CAG | MIG-IG | MIG-NRG |
| Latest weight |  | 1000.0 | 75.4 | 726.2 | 126.0 | 72.4 | 52.6 | 49.3 | 204.4 | 240.5 | 267.9 | 219.9 |
|  |  | K222 | K224 | K22A | K248 | K24C | K226 | K24Q | K24R | K24S | K24O | K24T |
| 2013 |  | - | - | - | - | - | - | - |  | - | - |  |
| 2014 |  | - | - | - | - | - | - | - |  | - | - |  |
| 2015 |  | - | - | - | - | - | - | - |  | - | - |  |
| 2016 |  | - | - | - | - | - | - | - |  | - | - |  |
| 2017 |  | - | - | - | - | - | - | - | - | - | - |  |
| 2017 |  | - | - | - | - | - | - | - | - | - | - |  |
|  | Q3 | - | - | - | - | - | - | - | - | - | - |  |
|  | Q4 | - | - | - | - | - | - | - | - | - | - |  |
| 2018 | Q1 | - | - | - | - | - | - | - |  | - | - |  |
|  | Q2 | - | - | - | - | - | - | - | - | - | - |  |
| 2017 | Jun | - | - | - | - | - | - | - | - | - | - | - |
|  | Jul | - | - | - | - | - | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - | - | - | - | - |  |
|  | Sep | - | - | - | - | - | - | - | - | - | - |  |
|  | Oct | - | - | - | - | - | - | - | - | - | - |  |
|  | Nov | - | - | - | - | - | - | - | - | - | - |  |
|  | Dec | - | - | - | - | - | - | - | - | - | - |  |
| 2018 | Jan | - | - | - | - | - | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - | - | - | - | - |  |
|  | Apr | - | - | - | - | - | - | - | - | - | - |  |
|  | May | - | - | - | - | - | - | - | - | - | - |  |
|  | Jun | - | - | - | - | - | - | - | - | - | - |  |
|  | Jul | - | -0.1 | -0.2 | 1.6 | -1.2 | -0.2 | -0.8 | -0.3 | -0.3 | - | 0.8 |
|  | Aug | -0.3 | -1.4 | -0.1 | -0.5 | -1.7 | -2.2 | -0.9 | -0.4 | 0.3 | -0.1 | -0.7 |
| Percentage change, latest year on previous year |  |  |  |  |  |  |  |  |  |  |  |  |
| 2013 |  | - | - | - | - | - | - | - | - | - | - | - |
| 2014 |  | - | - | - | - | - | - | - | - | . | - |  |
| 2015 |  | - | - | - | - | - | - | - | - | - | - |  |
| 2016 |  | - | - | - | - | - | - | - | - | - | - |  |
| 2017 |  | - | - | - | - | - | - | - | - | - | - | - |
| Percentage change, latest month on same month a year ago |  |  |  |  |  |  |  |  |  |  |  |  |
| 2016 | Jun | - | - | - | - | - | - | - | - | - | - | - |
|  | Jul | - | - | - | - | - | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - | - | - | - | - |  |
|  | Sep | - | - | - | - | - | - | - | - | - | - |  |
|  | Oct | - | - | - | - | - | - | - | - | - | - |  |
|  | Nov | - | - | - | - | - | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - | - | - | - | - | - |
| 2017 |  | - | - | - | - | - | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - | - | - | - | - | - |
|  | Apr | - | - | - | - | - | - | - | - | - | - | - |
|  | May | - | - | - | - | - | - | - | - | - | - |  |
|  | Jun | - | - | - | - | - | - | - | - | - | - | - |
|  | Jul | - | - | - | - | - | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - | - |  | - | - |  |
|  | Sep | - | - | - | - | - | - | - |  | . | - | - |
|  | Oct | - | - | - | - | - | - | - | - | . | - |  |
|  | Nov | - | - | - | - | - | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - | - | - | - | - | - |
| 2018 | Jan | - | - | - | - | - | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - | - | - | - | - | - |
|  | Apr | - | - | - | - | - | - | - | - | - | - | - |
|  | May | - | - | - | - | - | - | - | - | - | - | - |
|  | Jun | - | - | - | - | - | - | - | - | - | - | - |
|  | Jul | - | -0.1 | -0.1 | 1.6 | -1.2 | -0.2 | -0.9 | -0.3 | -0.2 | - | 0.9 |
|  | Aug | -0.3 | -1.4 | - | -0.5 | -1.6 | -2.2 | -0.9 | -0.4 | 0.2 | -0.1 | -0.7 |

## IOP5R

Output of the Production Industries
Chained volume indices of gross value added
Seasonally adjusted 2016 $=100$

| continued | Broad industry groups |  |  |  |  |  |  |  |  | Seasonally adj | $2016=100$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |  |  | Main industrial groupings |  |  |  |  |
|  | Production industries | Mining and quarrying | Manufacturing | Electricity, gas, steam and air conditioning | Water supply, sewerage and waste management | Oil and gas extraction | Consumer durables | Consumer non-durables | Capital goods | Intermediate goods | Energy |
| Section | B+C+D+E | B | C | D | E | 06 | MIG-CD | MIG-CND | MIG-CAG | MIG-IG | MIG-NRG |
| Latest weight | 1000.0 | 75.4 | 726.2 | 126.0 | 72.4 | 52.6 | 49.3 | 204.4 | 240.5 | 267.9 | 219.9 |
|  | K222 | K224 | K22A | K248 | K24C | K226 | K24Q | K24R | K24S | K24O | K24T |



## IOP5R

Output of the Production Industries
Chained volume indices of gross value added ${ }^{1}$
Seasonally adjusted $2016=100$

| continued | Broad industry groups |  |  |  |  |  | Seasonally adjusted 2016=100 |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |  |  |  |  |  |  |  |
|  | Production industries | Mining and quarrying | Manufacturing | Electricity, gas, steam and air conditioning | Water supply, sewerage and waste management | Oil and gas extraction | Consumer durables | Consumer non-durables | Capital goods | Intermediate goods | Energy |
| Section | B+C+D+E | B | C | D | E | 06 | MIG-CD | MIG-CND | MIG-CAG | MIG-IG | MIG-NRG |
| Latest weight | 1000.0 | 75.4 | 726.2 | 126.0 | 72.4 | 52.6 | 49.3 | 204.4 | 240.5 | 267.9 | 219.9 |
|  | K222 | K224 | K22A | K248 | K24C | K226 | K24Q | K24R | K24S | K24O | K24T |


| Percentage change, latest 3 months on previous 3 months |  |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2016 | Jun | - | - | - | - | - | - | - | - | - | - | - |
|  | Jul | - | - | - | - | - | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - | - | - | - | - | - |
|  | Sep | - | - | - | - | - | - | - | - | - | - | - |
|  | Oct | - | - |  | - | - | - | - | - | - | - | - |
|  | Nov | - | - | - | - | - | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - | - | - | - | - | - |
| 2017 | Jan | - | - | - | - | - | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - | - | - | - | - | - |
|  | Apr | - | - | - | - | - | - | - | - | - | - | - |
|  | May | - | - | - | - | - | - | - | - | - | - | - |
|  | Jun | - | - | - | - | - | - | - | - | - | - | - |
|  | Jul | - | - | - | - | - | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - | - | - | - | - | - |
|  | Sep | - | - | - | - | - | - | - | - | - | - | - |
|  | Oct | - | - | 2 | - | - | - | - | - | - | - | - |
|  | Nov | - | - |  | - | - | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - | - | - | - | - | - |
| 2018 | Jan | - | - | - | - | - | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - | - | , | - | - | - |
|  | Apr | - | - | - | - | - | - | - |  | - | - | - |
|  | May | - | - | - | - | - | - | - | - | - | - | - |
|  | Jun | - | - | - | - | - | - | - | - | - | - | - |
|  | Jul | - | - | - | 0.5 | -0.4 | - | -0.3 | -0.1 | -0.1 | - | 0.3 |
|  | Aug | -0.1 | -0.5 | -0.1 | 0.4 | -0.9 | -0.8 | -0.5 | -0.3 | - | - | - |
| 1 | Any apparent inconsistencies between the index numbers and the percentage changes shown in these tables are due to rounding |  |  |  |  |  | s that arliest | w or h to hav | revised <br> sed | marke |  |  |


|  |  | Output of the Production Industries Chained volume indices of gross value added ${ }^{1}$ |  |  |  | Seasonally adjusted $2016=100$ |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Food products, beverages and tobacco | Textiles, wearing apparel and leather products | Wood and paper products and printing | Coke and refined petroleum products | Chemicals and chemical products | Basic pharmaceutical products and preparations |
| Sectio |  | CA | CB | CC | CD | CE | CF |
| Latest weight |  | 111.5 | 29.8 | 53.6 | 9.9 | 48.6 | 55.1 |
|  |  | K22B | K22P | K22T | K22X | K22Z | K239 |
| $\begin{aligned} & 2013 \\ & 2014 \\ & 2015 \\ & 2016 \\ & 2017 \end{aligned}$ |  | - <br>  | - - - - | - <br> - | $\begin{array}{r}- \\ - \\ \hline\end{array}$ | - <br> - <br> - | - - - |
| 2017 | $\begin{aligned} & \text { Q2 } \\ & \text { Q3 } \\ & \text { Q4 } \end{aligned}$ | - | - | - | $\square$ | - | - |
| $2018$ |  | - | - | - | - | - | - |
| 2017 | Jun | - | - | - | - | - | - |
|  | Jul <br> Aug <br> Sep <br> Oct <br> Nov <br> Dec | - <br>  <br>  | - <br> - <br> - <br> - | - <br> - <br> - | $\begin{array}{r}- \\ \hline \\ \hline\end{array}$ | - <br> - <br> - <br> - | - <br>  <br>  |
| 2018 | Jan <br> Feb <br> Mar <br> Apr <br> May <br> Jun | - <br>  <br>  | - <br> - <br> - <br> - | - <br> - <br> - <br> - | - <br> - <br> - <br> - | - - - - - | - <br> - <br> - |
|  | Jul Aug | $\begin{array}{r} 0.2 \\ -0.3 \end{array}$ | $\begin{array}{r} 0.5 \\ -1.6 \end{array}$ | $-0.6$ | -0.8 3.2 | 0.4 1.3 | -2.1 -0.3 |
| Percentage change, latest year on previous year |  |  |  |  |  |  |  |
| $\begin{aligned} & 2013 \\ & 2014 \\ & 2015 \\ & 2016 \\ & 2017 \end{aligned}$ |  |  |  | - - - | $\begin{array}{r}- \\ - \\ \hline\end{array}$ | - - - | - <br>  |
| Percentage change, latest month on same month a year ago |  |  |  |  |  |  |  |
| 2016 | Jun | - | - | - | - | - | - |
|  | Jul <br> Aug <br> Sep <br> Oct <br> Nov <br> Dec | - - - - | - <br>  <br>  | - <br>  <br>  | $\begin{array}{r}- \\ - \\ - \\ \hline\end{array}$ | - <br>  <br>  | - <br>  <br>  |
| 2017 | Jan <br> Feb <br> Mar <br> Apr <br> May <br> Jun | - <br>  <br>  | - <br> - <br> - | - <br> - <br> - | $\begin{array}{r}- \\ - \\ - \\ \hline\end{array}$ | - - - - | - <br>  <br>  |
|  | Jul <br> Aug <br> Sep <br> Oct <br> Nov <br> Dec | $\begin{array}{r}- \\ - \\ - \\ \hline\end{array}$ |  | - <br> - <br> - | $\begin{array}{r}- \\ - \\ - \\ \hline\end{array}$ | - <br>  <br>  | - <br>  <br>  |
| 2018 | Jan <br> Feb <br> Mar <br> Apr <br> May <br> Jun | - <br>  <br>  | - <br> - <br> - <br> - | - <br> - <br> - | - <br> - <br> - | - <br>  <br>  | - <br>  <br> - <br> - |
|  | Jul Aug | $\begin{array}{r} 0.2 \\ -0.3 \end{array}$ | $\begin{array}{r} 0.5 \\ -1.6 \end{array}$ | -0.5 | $\begin{array}{r} -0.9 \\ 3.2 \end{array}$ | 0.3 1.3 | -2.3 -0.4 |
| 1 | Any appa percenta | inconsistencies be anges shown in th | een the index number e tables are due to ro |  | ${ }^{\dagger}$ indicates that data marked is the earlie | w or have been r e table to have b | d. The perioc revised. |

IOP5R
Output of the Production Industries

| contınued |  | vol | dices of gross | Seasonally adjusted $2016=100$ |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Rubber and plastic products and non-metallic mineral products | Basic metals and metal products | Computer, electronic and optical products | Electrical equipment | Machinery and equipment not elsewhere classified | Transport equipment | Other manufacturing and repair |
| Section | CG | CH | Cl | CJ | CK | CL | CM |
| Latest weight | 59.7 | 84.4 | 33.6 | 23.5 | 44.9 | 107.6 | 64.0 |


| 2013 |  | - | - | - | - | - | - | - |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2014 |  | - | - | - | - | - | - | - |
| 2015 |  | - | - | - | - | - | - | - |
| 2016 |  | - | - | - | - | - | - | - |
| 2017 |  | - | - | - | - | - | - | - |
| 2017 | Q2 | - | - | - | - | - | - | - |
|  | Q3 | - | - | - | - | - | - | - |
|  | Q4 | - | - | - | - | - | - | - |
| 2018 | Q1 | - | - | - | - | - | - | - |
|  | Q2 | - | - | - | - | - | - | - |
| 2017 | Jun | - | - | - | - | - | - | - |
|  | Jul | - | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - | - |
|  | Sep | - | - | - | - | - | - | - |
|  | Oct | - | - | - | - | - | - | - |
|  | Nov | - | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - | - |
| 2018 | Jan | - | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - | - |
|  | Apr | - | - | - | - | - | - | - |
|  | May | - | - | - | - | - | - | - |
|  | Jun | - | - | - | - | - | - | - |
|  | Jul | 0.1 | -0.3 | -1.2 | 0.7 | -1.2 | 0.5 | -0.1 |
|  | Aug | -0.3 | -0.9 | -1.4 | 2.2 | 0.1 | 1.3 | -0.5 |

Percentage change, latest year on previous year
2013
2014
2015
2016
2017

Percentage change, latest month on same month a year ago


IOP5R
Output of the Production Industries
Chained volume indices of gross value added ${ }^{1}$

| continued |  |  | Seasonally adjusted $2016=10 C$ |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: |

Percentage change, latest month on previous month

| 2016 | Jun | - | - | - | - | - | - |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Jul | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - |
|  | Sep | - | - | - | - | - | - |
|  | Oct | - | - | - | - | - | - |
|  | Nov | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - |
| 2017 | Jan | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - |
|  | Apr | - | - | - | - | - | - |
|  | May | - | - | - | - | - | - |
|  | Jun | - | - | - | - | - | - |
|  | Jul | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - |
|  | Sep | - | - | - | - | - | - |
|  | Oct | - | - | - | - | - | - |
|  | Nov | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - |
| 2018 | Jan | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - |
|  | Apr | - | - | - | - | - | - |
|  | May | - | - | - | - | - | - |
|  | Jun | - | - | - | - | - | - |
|  | Jul | 0.2 | 0.5 | - | -0.9 | 0.3 | -2.0 |
|  | Aug | -0.4 | -2.1 | -0.5 | 4.2 | 1.0 | 1.9 |

Percentage change, latest 3 months on same 3 months a year ago

| 2016 | Jun | - | - | - | - | - | - |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Jul | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - |
|  | Sep | - | - | - | - | - | - |
|  | Oct | - | - | - | - | - | - |
|  | Nov | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - |
| 2017 | Jan | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - |
|  | Apr | - | - | - | - | - | - |
|  | May | - | - | - | - | - | - |
|  | Jun | - | - | - | - | - | - |
|  | Jul | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - |
|  | Sep | - | - | - | - | - | - |
|  | Oct | - | - | - | - | - | - |
|  | Nov | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - |
| 2018 | Jan | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - |
|  | Apr | - | - | - | - | - | - |
|  | May | - | - | - | - | - | - |
|  | Jun | - | - | - | - | - | - |
|  | Jul | 0.1 | 0.1 | - | -0.3 | 0.1 | -0.8 |
|  | Aug | - | -0.4 | -0.1 | 0.8 | 0.6 | -0.9 |
| 1 | Any perce | cies b m in th | numb ue to | ${ }^{\dagger}$ indicates that data are new or have been revised. The perioc marked is the earliest in the table to have been revised. |  |  |  |


|  | Output of the Production Industries Chained volume indices of gross value added ${ }^{1}$ |  |  |  |  | Seasonally adjusted $2016=100$ |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Rubber and plastic products and non-metallic mineral products | Basic metals and metal products | Computer, electronic and optical products | Electrical equipment | Machinery and equipment not elsewhere classified | Transport equipment | Other manufacturing and repair |
| Section | CG | CH | Cl | CJ | CK | CL | CM |
| Latest weight | 59.7 | 84.4 | 33.6 | 23.5 | 44.9 | 107.6 | 64.0 |
|  | K23B | K23G | K23N | K23P | K23R | K23T | K23Z |

Percentage change, latest month on previous montl

| 2016 | Jun | - | - | - | - | - | - | - |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Jul | - | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - | - |
|  | Sep | - | - | - | - | - | - | - |
|  | Oct | - | - | - | - | - | - | - |
|  | Nov | - | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - | - |
| 2017 | Jan | - | - | - | - | - | - |  |
|  | Feb | - | - | - | - | - | - |  |
|  | Mar | - | - | - | - | - | - | - |
|  | Apr | - | - | - | - | - | - | - |
|  | May | - | - | - | - | - | - | - |
|  | Jun | - | - | - | - | - | - | - |
|  | Jul | - | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - |  |
|  | Sep | - | - | - | - | - | - | - |
|  | Oct | - | - | - | - | - | - | - |
|  | Nov | - | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - | - |
| 2018 | Jan | - | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - | - |
|  | Apr | - | - | - | - | - | - |  |
|  | May | - | - | - | - | - | - | - |
|  | Jun | - | - | - | - | - | - | - |
|  | Jul | 0.1 | -0.3 | -1.1 | 0.7 | -1.1 | 0.4 | -0.1 |
|  | Aug | -0.4 | -0.6 | -0.1 | 1.6 | 1.1 | 0.8 | -0.3 |
| Percentage change, latest 3 months on same 3 months a year agr |  |  |  |  |  |  |  |  |
| 2016 | Jun | - | - | - | - | - | - | - |
|  | Jul | - | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - | - |
|  | Sep | - | - | - | - | - | - | - |
|  | Oct | - | - | - | - | - | - | - |
|  | Nov | - | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - | - |
| 2017 | Jan | - | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - | - |
|  | Apr | - | - | - | - | - | - | - |
|  | May | - | - | - | - | - | - | - |
|  | Jun | - | - | - | - | - | - | - |
|  | Jul | - | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - | - |
|  | Sep | - | - | - | - | - | - | - |
|  | Oct | - | - | - | - | - | - | - |
|  | Nov | - | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - | - |
| 2018 | Jan | - | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - | - |
|  | Apr | - | - | - | - | - | - | - |
|  | May | - | - | - | - | - | - | - |
|  | Jun | - | - | - | - | - | - | - |
|  | Jul | - | -0.1 | -0.4 | 0.3 | -0.4 | 0.1 | -0.1 |
|  | Aug | -0.1 | -0.4 | -0.8 | 1.0 | -0.4 | 0.5 | -0.1 |

[^4]IOP5R
Output of the Production Industries

| Continued | Chained volume indices of gross value added | Seasonally adjusted $2016=100$ |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: |

Percentage change, latest 3 months on previous 3 months

| 2016 | Jun | - | - | - | - | - | - |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Jul | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - |
|  | Sep | - | - | - | - | - | - |
|  | Oct | - | - | - | - | - | - |
|  | Nov | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - |
| 2017 | Jan | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - |
|  | Apr | - | - | - | - | - | - |
|  | May | - | - | - | - | - | - |
|  | Jun | - | - | - | - | - | - |
|  | Jul | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - |
|  | Sep | - | - | - | - | - | - |
|  | Oct | - | - | - | - | - | - |
|  | Nov | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - |
| 2018 | Jan | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - |
|  | Apr | - | - | - | - | - | - |
|  | May | - | - | - | - | - | - |
|  | Jun | - | - | - | - | - | - |
|  | Jul | - | 0.2 | - | -0.3 | 0.1 | -0.7 |
|  | Aug | - | -0.4 | -0.2 | 0.8 | 0.6 | -0.9 |
| 1 | Any apparent inconsistencies between the index numbers and the percentage changes shown in these tables are due to rounding. |  |  |  | ${ }^{\dagger}$ indicates that data are new or have been revised. The perioc marked is the earliest in the table to have been revised. |  |  |


|  | Output of the Production Industries Chained volume indices of gross value added ${ }^{1}$ |  |  |  |  | Seasonally adjusted 2016 = 100 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Rubber and plastic products and non-metallic mineral products | Basic metals and metal products | Computer, electronic and optical products | Electrical equipment | Machinery and equipment not elsewhere classified | Transport equipment | Other manufacturing and repair |
| Section | CG | CH | Cl | CJ | CK | CL | CM |
| Latest weight | 59.7 | 84.4 | 33.6 | 23.5 | 44.9 | 107.6 | 64.0 |
|  | K23B | K23G | K23N | K23P | K23R | K23T | K23Z |

Percentage change, latest 3 months on previous 3 months

| 2016 | Jun | - | - | - | - | - | - | - |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Jul | - | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - | - |
|  | Sep | - | - | - | - | - | - | - |
|  | Oct | - | - | - | - | - | - | - |
|  | Nov | - | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - | - |
| 2017 | Jan | - | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - | - |
|  | Apr | - | - | - | - | - | - | - |
|  | May | - | - | - | - | - | - | - |
|  | Jun | - | - | - | - | - | - | - |
|  | Jul | - | - | - | - | - | - | - |
|  | Aug | - | - | - | - | - | - | - |
|  | Sep | - | - | - | - | - | - | - |
|  | Oct | - | - | - | - | - | - | - |
|  | Nov | - | - | - | - | - | - | - |
|  | Dec | - | - | - | - | - | - | - |
| 2018 | Jan | - | - | - | - | - | - | - |
|  | Feb | - | - | - | - | - | - | - |
|  | Mar | - | - | - | - | - | - | - |
|  | Apr | - | - | - | - | - | - | - |
|  | May | - | - | - | - | - | - | - |
|  | Jun | - | - | - | - | - | - | - |
|  | Jul | - | -0.1 | -0.4 | 0.2 | -0.4 | 0.2 | - |
|  | Aug | -0.1 | -0.4 | -0.7 | 1.0 | -0.3 | 0.5 | -0.2 |
| 1 | Any perce | ncies own in | ex num due | ${ }^{\dagger}$ indicates that data are new or have been revised. The period marked is the earliest in the table to have been revised. |  |  |  |  |

Office for
National Statistics

| Next publication: | 10 December 2018 |
| :---: | :---: |
| Issued by: | Office for National Statistics, Government Buildings, Cardiff Road, Newport NP10 8XG |
| Media contact: |  |
| Tel: | Media Relations Office +44 (0) 8456041858 |
|  | Emergency on-call +44 (0) 7867906553 |
| Email: | press.office@ons.gsi.gov.uk |
| Statistical contact: |  |
| Name: | Mark Stephens |
| Tel: | Mark Stephens +44 (0) 1633456387 |
| Email: | indexofproduction@ons.gsi.gov.uk |
| Contact us: |  |
| Tel: | +44 (0) 8456013034 |
| Email: | info@ons.gsi.gov.uk |
| Website: | www.statistics.gov.uk |
| Twitter: | www.twitter.com/statisticsONS |


[^0]:    1 Any apparent inconsistencies between the index numbers and the
    percentage changes shown in these tables are due to rounding. $\quad \begin{aligned} & \text { indicates that data are new or have been revised. The perioc } \\ & \text { marked is the earliest in the table to have been revised. }\end{aligned}$

[^1]:    1 Any apparent inconsistencies between the index numbers and the indicates that data are new or have been revised. The period
    percentage changes shown in these tables are due to rounding

[^2]:    1 Any apparent inconsistencies between the index numbers and the
    indicates that data are new or have been revised. The period marked

[^3]:    1 Any apparent inconsistencies between the index numbers and the $\quad{ }^{\dagger}$ indicates that data are new or have been revised. The period marked percentage changes shown in these tables are due to rounding
    is the earliest in the table to have been revised.

[^4]:    percentage changes shown in these tables are due to rounding
    the earliest in the table to have been revised.

