

Statistical bulletin

Index of Production, UK: December 2019

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.



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1 . Main points

- Total production output decreased by 0.8% for Quarter 4 (Oct to Dec) 2019, compared with Quarter 3 (July to Sept) 2019; this was led by manufacturing output, which fell by 1.1%.
- The quarterly fall in manufacturing is because of widespread weakness, with 11 of the 13 subsectors providing downward contributions; this was led by transport equipment, which fell by 1.9%.
- Production output rose by 0.1% between November 2019 and December 2019, with manufacturing providing the largest upward contribution, rising by 0.3%.
- The monthly increase of 0.3% in manufacturing output was because of transport equipment, which rose by 3.2%; only 4 of the 13 subsectors displayed upward contributions.
- For Quarter 4 2019, production output decreased by 2.0%, compared with Quarter 4 2018; this was led by a fall in manufacturing of 2.5%.
- Production output fell by 1.3% in the 12 months to December 2019, compared with the 12 months to December 2018; this is the largest annual fall since 2012 and was led by manufacturing output, which fell by 1.5%.

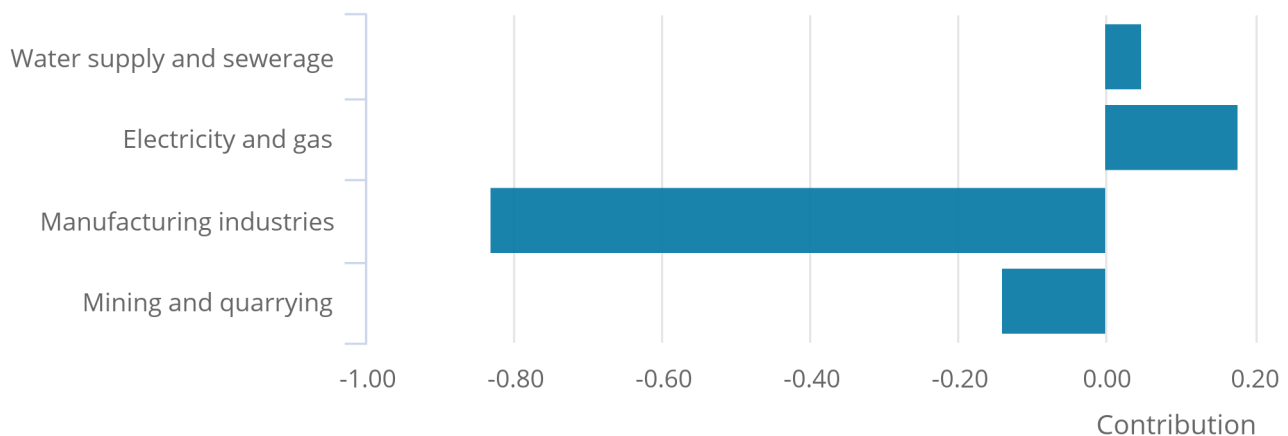
2 . Production

Figure 1: Widespread weakness within manufacturing underpins the strong negative contribution from this sector

Contributions to the Index of Production quarter on quarter, seasonally adjusted, UK, December 2019

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Contributions to the Index of Production quarter on quarter, seasonally adjusted, UK, December 2019



Source: Office for National Statistics – Index of Production

Notes:

1. Weights for main Index of Production sectors are: Sector B – Mining and quarrying (4.7); Sector C – Manufacturing (74.9); Sector D – Electricity and gas (10.9); and Sector E – Water and waste (9.5).

Total production output for Quarter 4 (Oct to Dec) 2019 fell by 0.8%, compared with Quarter 3 (July to Sept) 2019.

Manufacturing output provided by far the largest downward contribution (Figure 1), falling by 1.1%; this was led by widespread weakness throughout the sector, with negative contributions from 11 of the 13 subsectors. The downward contribution from mining and quarrying, which fell by 2.8%, was offset by positive contributions from electricity and gas, which rose by 1.8%, and water and waste, which rose by 0.5%.

Table 1: Growths and contributions to production, seasonally adjusted estimates, UK, December 2019

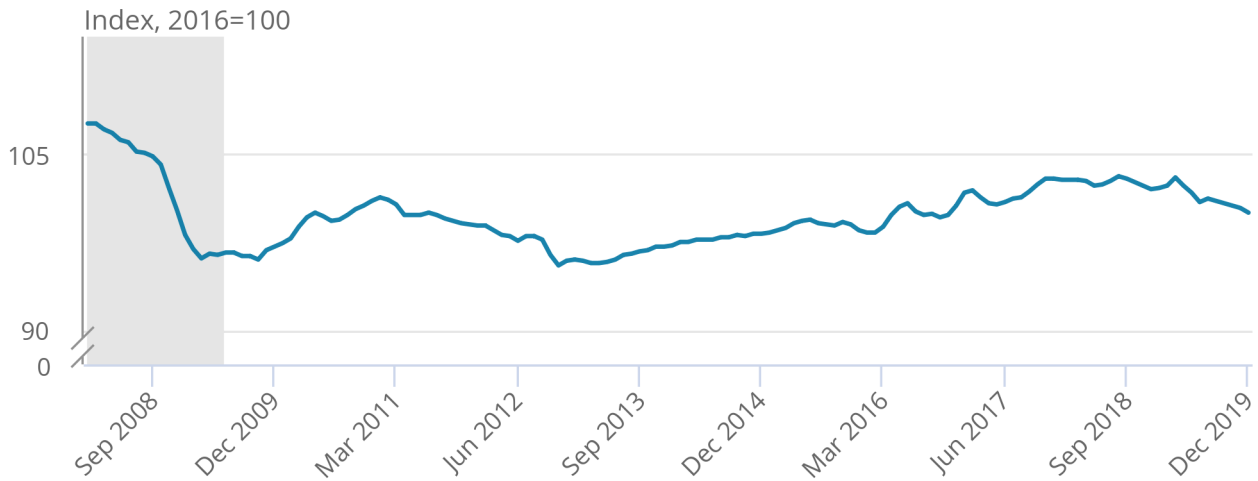
Sector	Summary description	Three months on previous three months		Three months on same three months a year ago		Month on previous month	
		Growth (%)	Contribution to production (% points)	Growth (%)	Contribution to production (% points)	Growth (%)	Contribution to production (% points)
IoP	Index of Production	-0.8	-0.8	-2.0	-2.0	0.1	0.1
Sector B	Total mining and quarrying	-2.8	-0.14	-3.7	-0.19	-2.7	-0.14
5	Coal and lignite	-10.1	0.00	-7.3	0.00	-4.4	0.00
6	Crude petroleum and natural gas	-3.1	-0.12	-4.3	-0.16	-2.2	-0.08
789	Other mining and quarrying	-1.9	-0.02	-1.9	-0.02	-4.3	-0.05
Sector C	Total manufacturing	-1.1	-0.83	-2.5	-1.88	0.3	0.25
CA	Food, beverages and tobacco	-0.3	-0.04	-0.1	-0.01	-0.9	-0.11
CB	Textiles and leather products	-1.5	-0.03	-0.1	0.00	-0.5	-0.01
CC	Wood, paper and printing	-2.0	-0.11	-3.0	-0.16	0.0	0.00
CD	Coke and petroleum	5.3	0.04	-0.1	0.00	-0.2	0.00
CE	Chemical products	-0.4	-0.02	-7.9	-0.39	3.2	0.15
CF	Pharmaceutical products	-2.4	-0.14	0.5	0.03	-2.4	-0.14
CG	Rubber and plastic products	-0.2	-0.01	-4.2	-0.22	2.2	0.12
CH	Metal products	-1.1	-0.09	2.6	0.20	1.6	0.13
CI	Computer, electronic and optical	1.2	0.08	-0.3	-0.02	-0.3	-0.02
CJ	Electrical equipment	-2.4	-0.04	-4.0	-0.07	-0.4	-0.01
CK	Machinery and equipment	-2.4	-0.14	-8.9	-0.55	-1.7	-0.10
CL	Transport equipment	-1.9	-0.20	-3.4	-0.36	3.2	0.32
CM	Other manufacturing and repair	-2.0	-0.13	-4.8	-0.33	-1.1	-0.08
Sector D	Total electricity and gas	1.8	0.18	-0.8	-0.08	-1.2	-0.13
35.1	Electric power generation, transmission and distribution	1.8	0.14	1.2	0.09	-1.2	-0.09
35.2-3	Manufacture of gas; distribution of gaseous fuels through mains; steam and aircon supply	1.6	0.04	-7.1	-0.18	-1.5	-0.03
Sector E	Total water and waste	0.5	0.05	2.0	0.19	1.0	0.10
36	Water collection, treatment and supply	1.0	0.03	2.1	0.06	0.6	0.02
37	Sewerage	1.1	0.04	1.0	0.03	0.7	0.02
38	Waste collection, treatment and disposal activities; materials recovery	-0.7	-0.02	2.9	0.09	1.5	0.05
39	Remediation activities and other waste management services	-1.2	0.00	2.6	0.00	3.0	0.00

Figure 2: The current three-monthly rolling index level is the lowest since November 2016

Index of Production rolling three months on previous three months, seasonally adjusted, UK, January 2008 to December 2019

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Index of Production rolling three months on previous three months, seasonally adjusted, UK, January 2008 to December 2019



Source: Office for National Statistics – Index of Production

Notes:

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

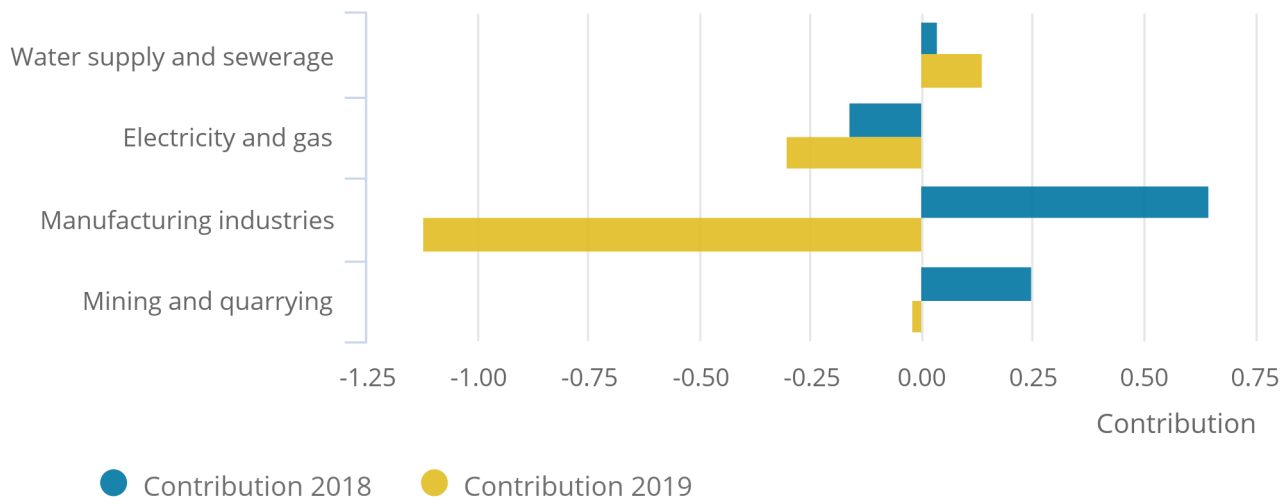
Growth for the Index of Production (IoP) was more pronounced from the beginning of 2010, as the economy recovered from the 2008 economic downturn, before a downturn during 2012. Production output in the UK was 6.6% lower for Quarter 4 2019 than the pre-downturn peak for Quarter 1 (Jan to Mar) 2008. Additionally, the current three-monthly rolling index level is the lowest since November 2016.

Figure 3: Manufacturing displays the largest difference in contribution to the Index of Production when comparing 2019 with 2018

Contributions to the Index of Production 12 months on 12 months, seasonally adjusted, UK, December 2019

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Contributions to the Index of Production 12 months on 12 months, seasonally adjusted, UK, December 2019



Source: Office for National Statistics – Index of Production

Notes:

1. Weights for main Index of Production sectors are: Sector B – Mining and quarrying (4.7); Sector C – Manufacturing (74.9); Sector D – Electricity and gas (10.9); and Sector E – Water and waste (9.5).

Total production output for the 12 months to December 2019 compared with the 12 months to December 2018 fell by 1.3%; this is the largest annual fall since 2012. Figure 3 shows that manufacturing drives the weakness year on year, led by notable falls from transport equipment and machinery and equipment not elsewhere classified of 6.2% and 7.7% respectively (Figure 5).

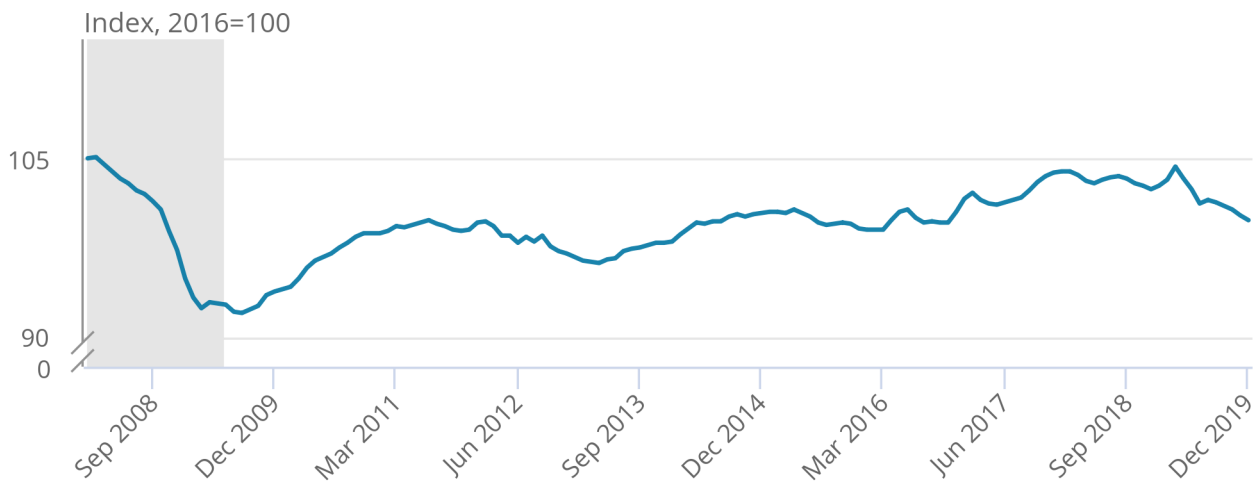
3 . Manufacturing

Figure 4: The current three-monthly rolling index level is the lowest since November 2016

Index of Manufacturing rolling three months on previous three months, seasonally adjusted, UK, January 2008 to December 2019

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Index of Manufacturing rolling three months on previous three months, seasonally adjusted, UK, January 2008 to December 2019



Source: Index

Notes:

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

Growth for the Index of Manufacturing (IoM) was more pronounced from the beginning of 2010, as the economy recovered from the 2008 economic downturn, before a downturn during 2012. Manufacturing output in the UK remained 4.5% lower in Quarter 4 (Oct to Dec) 2019 than the pre-downturn peak in Quarter 1 (Jan to Mar) 2008. Additionally, the current three-monthly rolling index level is the lowest since November 2016.

For further detail on the longer-term trend within manufacturing, please see the article, [Manufacturing sector performance, UK: 2008 to 2018](#), published on 2 April 2019. The article provides an overview of the changes in the manufacturing sector between 2008 and 2018, focusing on the industries that have grown or shrunk the most.

Total manufacturing output for Quarter 4 2019 fell by 1.1%, compared with Quarter 3 (July to Sept) 2019, which fell by 0.2%. During Quarter 4 2019, of the 13 subsectors, 11 displayed negative contributions; these were led by:

- transport equipment, which fell by 1.9%, caused by weakness from motor vehicles, trailers and semi-trailers, which fell by 4.2% because of the additional impact of shutdowns during November 2019; this industry is still showing a longer-term decline, as highlighted by the three months on same three months a year ago indicator, which fell by 6.2%, and the fall in annual output of 9.1%
- machinery and equipment, which fell by 2.4% owing to widespread weakness during November and December 2019
- basic pharmaceutical products, which fell by 2.4%, mainly because of export-driven monthly weakness during December 2019

The largest upward contribution came from computer, electronic and optical products, which rose by 1.2%, mainly because of monthly export-driven strength during October 2019.

Monthly total manufacturing output in December 2019, compared with November 2019, rose by 0.3%, despite only 4 of the 13 subsectors displaying upward contributions; these were most notably from:

- transport equipment (3.2%), where the motor vehicles, trailers and semi-trailers industry (5.0%) displayed a partial bounceback following the strong impact from factory shutdowns during November 2019
- widespread strength from chemicals and chemical products (3.2%), which is a bounceback following a fall of 4.0% during November 2019 impacted by shutdowns
- basic metals and metal products (1.6%) because of widespread strength, led by a 0.8% increase from fabricated metal products

Without the strength from motor vehicles, trailers and semi-trailers, total manufacturing monthly output would have declined.

For Quarter 4 2019, compared with Quarter 4 2018, total manufacturing output declined by 2.5%; this is the third consecutive quarter on same quarter a year ago decline, further highlighting weakness throughout 2019 compared with 2018. There was widespread weakness, with 8 of the 13 subsectors providing downward contributions; these were led by:

- machinery and equipment, which fell by 8.9%
- widespread weakness from chemicals and chemical products, which fell by 7.9%
- transport equipment, which fell by 3.4%, a continuation of ongoing weakness since June 2018
- long-term weakness from other manufacturing and repair, which fell by 4.8%

Partially offsetting overall weakness was strength from basic metals and metal products (2.6%) owing to a 5.2% increase from fabricated metals.

The longer-term decline in total manufacturing output is supported by the annual fall of 1.5%; this is the largest fall since 2009, when annual output fell by 8.6%. The most notable fallers this year were:

- transport equipment, which fell by 6.2%
- machinery and equipment not elsewhere classified, which fell by 7.7% because of a steady decline during 2019
- other manufacturing and repair, which fell by 3.0% because of a steady decline over the second half of 2019
- rubber and plastic products, which fell by 3.5%, a continuation of longer-term weakness since 2017

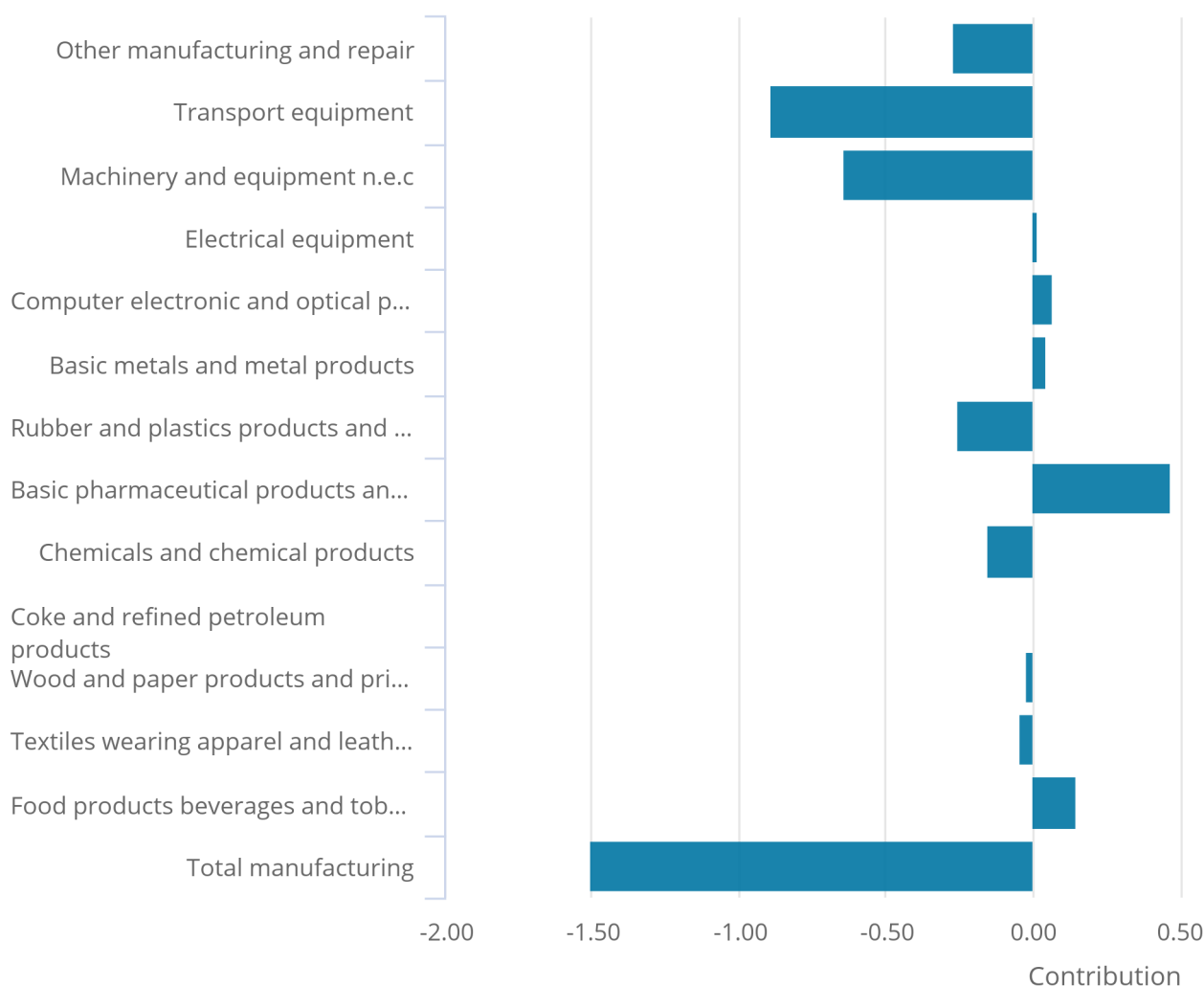
Providing the largest upward contribution was a strong rise of 6.5% from basic pharmaceutical products, partially offsetting the overall decline in annual output (Figure 5).

Figure 5: Notable weakness from transport equipment provides more than half of the total manufacturing contribution

Contributions to the Index of Manufacturing 12 months on 12 months, seasonally adjusted, UK, December 2019

Figure 5: Notable weakness from transport equipment provides more than half of the total manufacturing contribution

Contributions to the Index of Manufacturing 12 months on 12 months, seasonally adjusted, UK, December 2019



Source: Office for National Statistics – Index of Production

The weakness within transport equipment has been led by a longer-term decline in output since the beginning of 2018 from the motor vehicles, trailers and semi-trailers industry, which fell by 9.1% during 2019. The factors behind the decline for this industry have been documented in previous releases, but the impact of shutdowns in 2019, especially during April and November 2019, have also contributed to the significant annual weakness.

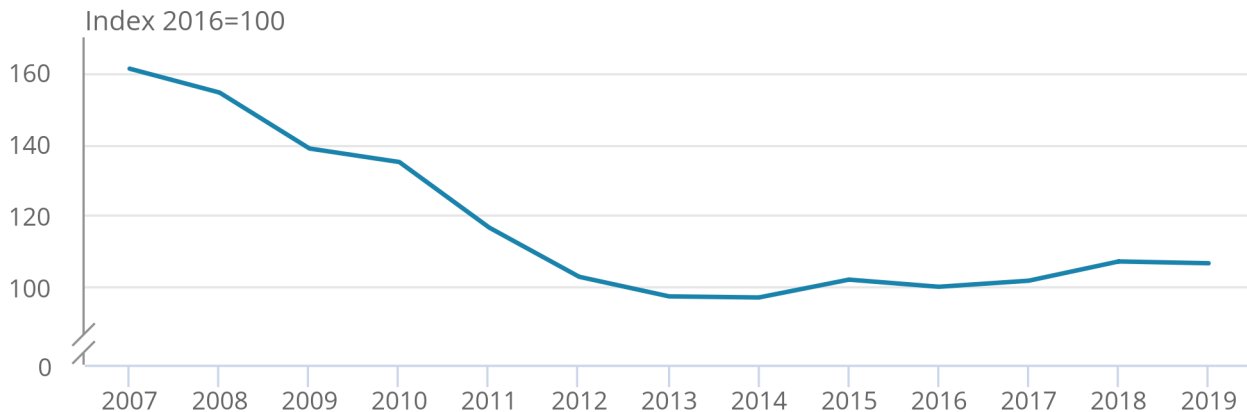
4 . Mining and quarrying

Figure 6: Mining and quarrying continue to grow slowly, after a sharp period of decline to 2013

Mining and quarrying, 12-month index, seasonally adjusted, UK, 2007 to 2019

Figure 6: Mining and quarrying continue to grow slowly, after a sharp period of decline to 2013

Mining and quarrying, 12-month index, seasonally adjusted, UK, 2007 to 2019



Source: Office for National Statistics – Index of Production

Because of notable weakness from the oil and gas extraction industry during October 2019, quarter on same quarter a year ago and quarterly sector level growth fell by 3.7% and 2.8% respectively.

The annual indicator displays a marginal fall of 0.5%, mainly because of the impact of oil field closures during October 2019, when monthly oil and gas extraction output fell by 8.2%.

Mining and quarrying output, led by oil and gas extraction, has suffered a steady longer-term decline since the annual index peaked in 1999 at 232.0. Figure 5 shows a sharp decline in annual output between 2007 and 2013, mainly resulted from weak demand during the global downturn. Additionally, the continuing closure of older oil fields, in part because of higher costs and volatility in oil prices, has also been a drag on growth. Consecutive periods of steady growth during 2017 and 2018 were mainly because of increased output from newer fields coming online.

5 . Electricity and gas

The quarterly growth of 1.8% was driven by electricity supply, which increased by 1.8%, supported by gas supply, which rose by 1.6%.

In contrast, monthly output fell by 1.2% in December 2019 because of decreased demand for both electricity and gas supply, resulting in falls of 1.2% and 1.5% respectively. The Met Office reported that the provisional UK mean temperature was 5.1 degrees Celsius, which is 1.3 degrees Celsius above the 1981 to 2010 long-term average.

The quarter on same quarter a year ago indicator fell by 0.8%, mainly because of gas supply, which fell by 7.1%, but partially offset by a rise of 1.2% from electricity supply.

The annual indicator fell by 2.9% driven by falls in both industries, with electricity supply falling by 2.6% and gas supply falling by 4.0%.

6 . Water and waste

Sector-level growth for the longer-term indicators is driven by work carried out on waste treatment projects, which is the underlying factor behind strength across waste collection. This is highlighted by the current quarter on same quarter a year ago growth of 2.9% and the annual growth of 5.9% for this industry.

Despite strength in the longer-term indicators within waste collection, quarterly output declined by 0.7% for this industry; this was led by weakness from large businesses during October and November 2019. However, this was offset by rises from water supply (1.0%) and sewerage (1.1%), driving the overall sector level rise of 0.5%.

7 . Index of Production data

[Index of Production time series](#)

Dataset DIOP | Released 11 February 2020

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.

[Output of the production industries](#)

Dataset | Released 11 February 2020

Index values and growth rates for production, manufacturing and the main industrial groupings in the UK.

[Index of Production and industry sectors to four decimal places](#)

Dataset | Released 11 February 2020

Monthly index values for production and the main Index of Production (IoP) sectors in the UK to four decimal places.

[Monthly Business Survey turnover in production industries](#)

Dataset | Released 11 February 2020

Monthly Business Survey (MBS) production industries' total turnover, domestic sales and exports in the UK. Figures are in current price and non-seasonally adjusted.

[Export proportions for manufacturing industries](#)

Dataset | Released 11 February 2020

Monthly, quarterly and annual export data for the manufacturing industries, collected by the MBS at industry level in the UK.

All data related to the IoP are available on the [Related data page](#).

8 . Glossary

Index number

The index number is a measure of the average level of prices, quantities or other measurable characteristics relative to their level for a defined time period or location.

Industrial classification or breakdown

The industrial classification or breakdown is the internationally standardised method for classifying the wide range of industrial sectors in an economy. We use the [Standard Industrial Classification 2007 \(SIC 2007\)](#) for industrial breakdowns.

Manufacturing

The manufacturing sector includes the output of manufacturing industries and is broken down into 13 subsectors.

Monthly Business Survey

The Monthly Business Survey (MBS) collects information on the monthly turnover of UK businesses within the production and services sectors from various industrial sectors and regions in the UK.

Production

The production sector includes the output in the manufacturing (the largest component of production), mining and quarrying, energy supply, and water supply and waste management industries.

Turnover

The turnover of a company is the value of the goods or services sold during a particular time period. It includes total takings or invoiced sales and receipts. Interest and similar income, other operating income, and extra ordinary income is excluded. Value Added Tax (VAT) invoiced to the customer is excluded.

9 . Measuring the data

After EU withdrawal

As the UK leaves the EU, it is important that our statistics continue to be of high quality and are internationally comparable. During the transition period, those UK statistics that align with EU practice and rules will continue to do so in the same way as before 31 January 2020.

After the transition period, we will continue to produce our national accounts statistics in line with the UK Statistics Authority's (UKSA's) [Code of Practice for Statistics](#) and in accordance with internationally agreed statistical guidance and standards.

The Withdrawal Agreement outlines a need for UK Gross National Income (a fundamental component of the national accounts, which includes gross domestic product (GDP)) statistics to remain in line with those of other EU countries until the EU budgets are finalised for the years in which we were a member. To ensure comparability during this cycle, the national accounts will continue to be produced according to [European System of Accounts \(ESA\) 2010](#) definitions and standards.

The Index of Production (IoP) uses data from a variety of sources and is calculated by taking turnover and removing the impact of price changes or by using direct volume estimates.

The majority of data are collected as “turnover values” through the Monthly Business Survey (MBS). In addition, direct volume series are collected by the Department for Business, Energy and Industrial Strategy (BEIS) and the International Steel Statistics Bureau (ISSB) for steel industries.

From January 2018, Value Added Tax (VAT) data have also been included across 64 production industries for small- and medium-sized businesses. For more information, see [VAT turnover data in national accounts: background and methodology](#).

A comprehensive list of the IoP source data can be found in the [Gross domestic product \(GDP\(O\)\) source catalogue \(XLS, 715KB\)](#).

More quality and methodology information on strengths, limitations, appropriate uses, and how the data were created is available in the [UK Index of Production QMI](#).

10 . Strengths and limitations

Seasonal adjustment

The data published in the Index of Production (IoP) release are all seasonally adjusted (although non-seasonally adjusted estimates are also available). This aids interpretation by removing annually recurring fluctuations, for example, those caused by holidays or other seasonal patterns.

Data volatility

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

Comparability with UK trade statistics

The [Monthly Business Survey \(MBS\) turnover in production industries dataset](#) produces the proportion of turnover from exports by industry and level of turnover and exports (British Pound, millions). However, this is not always comparable with UK trade statistics. Further information on UK trade and how data on it are compiled can be found in the [UK trade release](#).

11 . Related links

[Comparison of motor vehicle manufacturing output statistics, UK: 1997 to 2019](#)

Article | Released 10 January 2020

A comparison of the methodologies used to estimate motor vehicle manufacturing outputs by the Office for National Statistics (ONS) and the Society of Motor Manufacturers and Traders (SMMT).

[A comparison between official estimates of UK output and diffusion indices](#)

Article | Released 21 October 2019

The level of correlation between ONS data and IHS Markit and Chartered Institute of Procurement and Supply Purchasing Managers' Indices.

[GDP monthly estimate, UK: December 2019](#)

Bulletin | Released 11 February 2020

Gross domestic product (GDP) measures the value of goods and services produced in the UK. It estimates the size of and growth in the economy and includes the Index of Production (IoP), Index of Services (IoS) and construction output in Great Britain.

[Producer price inflation, UK: December 2019](#)

Bulletin | Released 15 January 2020

The corresponding price indices used to deflate the IoP are published in the monthly publication of UK producer price inflation.

[UK manufacturers' sales by product \(ProdCom\): 2018 revised results](#)

Bulletin | Released 2 December 2019

Product sales by manufacturers are published on an annual basis in [ProdCom](#) statistical bulletins; estimates are in current prices, unlike the chained volume measures published in the IoP release.

[Energy Trends: December 2019](#)

Bulletin | Released 19 December 2019

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 manufacture of coke and refined petroleum products sectors within this release.

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Percentage change, latest month on same month a year ago
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IOP5 Output of the Production Industries

Chained volume indices of gross value added¹

Seasonally adjusted 2016 = 100

Section	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	
	B+C+D+E	B	C	D	E	06	MIG-CD	MIG-CND	MIG-CAG	MIG-IG	MIG-NRG	
Latest weight	1 000.0	47.5	748.5	108.7	95.3	34.6	68.2	211.6	272.3	252.2	182.5	
	K222	K224	K22A	K248	K24C	K226	K24Q	K24R	K24S	K24O	K24T	
2015	98.9	102.0	99.8	96.4	93.3	96.3	99.2	100.1	97.9	102.7	97.3	
2016	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	
2017	101.7	101.7	102.2	98.2	102.0	101.6	103.8	99.0	105.4	101.7	99.3	
2018	102.5	107.1	103.1	96.7	102.5	109.2	115.6	100.4	107.7	107.7	100.0	
2019	101.2	106.6	101.6	93.9	104.0	108.7	116.8	102.7	102.7	99.4	98.1	
2018 Q4	102.0	108.9	102.4	95.5	103.3	111.9	116.5	101.1	105.5	100.2	99.7	
2019 Q1	103.0 †	107.4 †	104.3 †	93.2 †	102.3 †	108.9 †	118.5 †	105.2 †	105.6 †	102.2 †	97.8	
Q2	100.9	106.1	101.2	94.5	103.6	108.2	116.8	102.0	102.1	99.5	98.0	
Q3	100.8	107.9	101.0	93.0	104.8	110.5	115.4	102.4	102.3	98.4	98.0	
Q4	100.0	104.8	99.8	94.7	105.3	107.1	116.3	101.3	100.8	97.5	98.7	
2018 Oct	102.4	111.4	102.5	96.2	103.7	114.6	115.6	101.0	105.7	100.7	100.8	
Nov	102.2	107.9	102.6	95.7	103.2	110.6	117.2	101.5	106.0	100.0	99.6	
Dec	101.6	107.3	102.1	94.6	102.9	110.5	116.6	100.8	105.0	100.0	98.8	
2019 Jan	102.6 †	104.3 †	103.4 †	96.1 †	102.2 †	104.8 †	117.4 †	103.6 †	105.0 †	101.6 †	99.0	
Feb	102.8	108.1	104.1	91.8	102.1	109.7	118.8	104.1	105.6	102.6	96.9	
Mar	103.7	109.7	105.3	91.8	102.5	112.2	119.2	107.7	106.2	102.3	97.4	
Apr	100.3	105.8	100.6	94.4	101.7	107.2	115.8	103.1	99.0	100.2	97.5	
May	101.2	106.5	101.5	94.5	104.4	108.9	118.9	100.9	103.5	99.5	98.4	
Jun	101.3	106.1	101.5	94.7	104.6	108.6	115.8	102.0	103.8	98.9	98.2	
Jul	101.2	105.3	101.7	93.9	104.1	107.4	115.7	103.8	102.6	98.9	97.9	
Aug	100.5	105.7	100.8	92.7	104.9	107.3	115.2	101.7	102.5	98.3	97.0	
Sep	100.7	112.7	100.5	92.5	105.4	116.9	115.5	101.7	101.8	98.1	99.0	
Oct	100.8	105.3	100.8	94.9	104.8	107.3	118.7	101.9	102.6	97.9	98.7	
Nov	99.6	106.0	99.2	95.2	105.0	108.2	115.5	101.4	99.5	96.9	99.2	
Dec	99.7	103.2	99.5	94.0	106.1	105.8	114.6	100.7	100.3	97.6	98.2	
Percentage change, latest year on previous year												
2015	1.0	5.1	-0.1	2.2	4.6	7.5	-0.7	0.2	-1.6	0.7	3.7	
2016	1.1	-2.0	0.2	3.7	7.1	3.8	0.8	-0.1	2.1	-2.6	2.8	
2017	1.7	1.7	2.2	-1.8	2.0	1.6	3.8	-1.0	5.4	1.7	-0.7	
2018	0.8	5.3	0.9	-1.6	0.5	7.6	11.4	1.4	2.2	-1.0	0.7	
2019	-1.3	-0.5	-1.5	-2.9	1.5	-0.5	1.0	2.3	-4.6	-1.3	-1.8	
Percentage change, latest month on same month a year ago												
2017 Oct	4.1	15.9	4.9	-4.4	1.6	21.6	4.3	2.0	8.7	3.8	0.9	
Nov	2.4	7.0	3.7	-5.5	-0.1	8.1	5.1	0.8	7.3	3.1	-2.8	
Dec	0.5	-13.7	1.3	0.8	-0.1	-19.8	3.6	-3.8	5.4	1.5	-3.6	
2018 Jan	0.6	1.9	1.9	-5.4	-4.2	2.6	10.3	-2.4	7.1	0.3	-3.5	
Feb	1.7	3.1	2.1	3.6	-4.4	4.9	10.4	1.9	4.8	-0.2	2.6	
Mar	2.3	-1.5	2.2	10.4	-3.9	-0.3	18.1	0.5	6.3	-0.7	5.8	
Apr	1.6	8.3	1.4	1.6	-0.2	13.0	14.5	-0.5	5.7	-1.6	3.3	
May	0.9	5.5	1.8	-8.0	1.5	7.5	16.1	1.9	4.7	-1.4	-3.8	
Jun	1.8	1.3	2.2	-4.1	4.7	1.4	9.8	3.3	3.5	0.1	-2.1	
Jul	1.9	7.9	1.8	-1.1	2.6	11.0	15.9	3.7	1.0	0.9	2.7	
Aug	1.6	10.3	1.2	-1.7	3.5	13.2	11.7	1.1	2.4	0.2	2.3	
Sep	-0.2	2.5	-0.1	-4.1	2.5	3.1	4.5	2.2	-1.5	-0.6	-1.2	
Oct	-0.6	4.3	-1.2	-0.5	1.5	5.1	9.3	1.8	-2.5	-2.2	1.1	
Nov	-0.8	-	-0.9	-2.6	1.3	0.8	10.6	1.7	-1.0	-3.3	-0.6	
Dec	-1.1	23.2	-2.0	-6.0	1.1	35.1	6.5	1.7	-3.5	-3.6	2.0	
2019 Jan	-0.2 †	- †	-0.6 †	0.8 †	2.6 †	-0.9 †	2.6 †	5.6 †	-5.5 †	-0.1 †	1.4	
Feb	-0.1	5.4	0.6	-9.3	2.5	5.8	3.8	4.8	-4.0	2.1	-4.3	
Mar	0.9	10.2	2.1	-11.3	1.3	11.8	2.7	8.9	-2.9	2.3	-4.6	
Apr	-2.0	-2.2	-2.0	-4.4	1.3	-3.8	1.0	3.9	-8.5	0.5	-3.8	
May	-0.6	-	-1.5	3.0	2.4	0.9	1.3	0.4	-4.4	-0.4	1.9	
Jun	-1.6	-0.3	-2.2	0.4	-	1.3	-0.2	-1.0	-3.1	-2.2	-0.2	
Jul	-2.0	-5.2	-1.8	-3.4	-0.1	-5.7	-0.4	2.6	-4.1	-3.0	-4.0	
Aug	-2.5	-5.7	-2.4	-4.5	0.8	-6.6	-0.6	1.6	-5.1	-2.9	-4.5	
Sep	-1.8	4.4	-2.4	-2.5	1.0	6.4	2.0	1.1	-4.1	-3.5	-0.3	
Oct	-1.6	-5.4	-1.7	-1.3	1.0	-6.4	2.7	0.8	-2.9	-2.7	-2.0	
Nov	-2.5	-1.7	-3.3	-0.5	1.8	-2.2	-1.5	-0.1	-6.1	-3.0	-0.4	
Dec	-1.8	-3.9	-2.5	-0.6	3.1	-4.2	-1.7	-0.2	-4.5	-2.4	-0.6	

¹ Any apparent inconsistencies between the index numbers and the percentage changes shown in these tables are due to rounding.

† indicates that data are new or have been revised. The period marked is the earliest in the table to have been revised.

IOP5 Output of the Production Industries

continued

Chained volume indices of gross value added¹

Seasonally adjusted 2016 = 100

Section	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	
	B+C+D+E	B	C	D	E	06	MIG-CD	MIG-CND	MIG-CAG	MIG-IG	MIG-NRG	
Latest weight	1 000.0	47.5	748.5	108.7	95.3	34.6	68.2	211.6	272.3	252.2	182.5	
	K222	K224	K22A	K248	K24C	K226	K24Q	K24R	K24S	K24O	K24T	
Percentage change, latest month on previous month												
2017	Oct	0.3	1.4	0.6	-2.3	0.5	2.3	-2.4	0.7	0.5	0.7	-0.8
	Nov	-	1.1	-0.2	1.6	-0.4	0.7	0.2	0.6	-1.2	0.4	0.6
	Dec	-0.2	-19.3	0.7	2.4	-	-25.5	3.2	-0.7	1.7	0.4	-3.4
2018	Jan	-0.1	19.7	-0.1	-5.2	-2.1	29.4	4.6	-1.0	2.1	-2.0	0.9
	Feb	0.2	-1.7	-0.5	6.1	-0.1	-2.0	-0.1	1.2	-1.0	-1.2	3.6
	Mar	-0.1	-3.0	-0.4	2.3	1.5	-3.2	1.5	-0.5	-0.5	-0.6	0.9
	Apr	-0.5	8.8	-0.4	-4.7	-0.7	11.0	-1.2	0.3	-1.1	-0.3	-0.7
	May	-0.4	-1.6	0.4	-7.1	1.5	-3.1	2.3	1.3	-	0.2	-4.8
	Jun	1.0	-0.1	0.7	2.8	2.6	-0.8	-1.1	2.4	-1.1	1.3	2.0
	Jul	0.3	4.4	-0.3	3.1	-0.3	6.4	0.1	-1.8	-	0.8	3.5
	Aug	-0.2	0.9	-0.2	-0.2	-0.2	0.8	-0.3	-1.0	0.8	-0.7	-0.3
	Sep	-0.6	-3.6	-0.2	-2.2	0.2	-4.4	-2.3	0.5	-1.6	0.4	-2.3
	Oct	-0.1	3.1	-0.5	1.3	-0.5	4.3	2.2	0.4	-0.5	-1.0	1.5
	Nov	-0.2	-3.1	0.1	-0.5	-0.6	-3.5	1.4	0.5	0.3	-0.7	-1.1
	Dec	-0.5	-0.6	-0.5	-1.2	-0.3	-0.1	-0.6	-0.6	-0.9	-	-0.8
2019	Jan	0.9 [†]	-2.8 [†]	1.3 [†]	1.7 [†]	-0.6 [†]	-5.1 [†]	0.8 [†]	2.8 [†]	- [†]	1.6 [†]	0.2 [†]
	Feb	0.2	3.6	0.7	-4.6	-0.1	4.6	1.1	0.5	0.6	1.0	-2.2
	Mar	0.9	1.5	1.1	-	0.4	2.3	0.4	3.5	0.6	-0.4	0.5
	Apr	-3.3	-3.6	-4.4	2.8	-0.7	-4.5	-2.8	-4.3	-6.8	-2.0	0.1
	May	1.0	0.7	0.9	0.1	2.6	1.6	2.7	2.1	4.6	-0.7	0.9
	Jun	-	-0.4	-	0.2	0.2	-0.3	-2.6	1.1	0.3	-0.6	-0.1
	Jul	-	-0.7	0.2	-0.8	-0.4	-1.1	-0.1	1.8	-1.1	-	-0.4
	Aug	-0.7	0.3	-0.9	-1.3	0.7	-0.1	-0.4	-2.0	-0.2	-0.5	-0.9
	Sep	0.2	6.7	-0.3	-0.2	0.4	9.0	0.2	-	-0.6	-0.2	2.1
	Oct	0.1	-6.6	0.3	2.6	-0.5	-8.2	2.6	0.1	0.8	-0.2	-0.3
	Nov	-1.1	0.7	-1.6	0.3	0.2	0.8	-2.7	0.1	-3.0	-1.0	0.5
	Dec	0.1	-2.7	0.3	-1.2	1.0	-2.2	-0.8	-0.7	0.7	0.7	-1.1
Percentage change, latest 3 months on same 3 months a year ago²												
2017	Oct	2.8	5.9	3.4	-1.6	1.4	7.1	5.4	0.6	6.9	2.4	0.2
	Nov	3.1	9.1	3.9	-3.3	1.1	11.4	5.7	0.7	7.7	3.1	-0.4
	Dec	2.3	2.7	3.3	-3.1	0.5	2.5	4.3	-0.4	7.1	2.8	-1.9
2018	Jan	1.1	-1.6	2.3	-3.4	-1.5	-3.0	6.3	-1.8	6.6	1.6	-3.3
	Feb	0.9	-2.9	1.8	-0.4	-2.9	-4.2	8.1	-1.5	5.8	0.5	-1.5
	Mar	1.5	1.2	2.1	2.7	-4.2	2.4	12.9	-0.1	6.0	-0.2	1.6
	Apr	1.8	3.3	1.9	5.1	-2.9	5.8	14.3	0.6	5.6	-0.8	3.9
	May	1.6	4.1	1.8	1.2	-0.9	6.7	16.2	0.6	5.6	-1.2	1.7
	Jun	1.4	5.0	1.8	-3.5	2.0	7.2	13.4	1.6	4.6	-1.0	-0.9
	Jul	1.5	4.9	1.9	-4.4	2.9	6.6	13.8	3.0	3.0	-0.1	-1.1
	Aug	1.7	6.5	1.8	-2.3	3.6	8.5	12.4	2.7	2.3	0.4	0.9
	Sep	1.1	6.9	1.0	-2.3	2.9	9.0	10.5	2.3	0.6	0.2	1.3
	Oct	0.3	5.6	-	-2.1	2.5	7.0	8.4	1.7	-0.6	-0.9	0.7
	Nov	-0.5	2.3	-0.7	-2.4	1.8	3.0	8.1	1.9	-1.7	-2.0	-0.2
	Dec	-0.9	8.2	-1.4	-3.1	1.3	11.7	8.8	1.7	-2.4	-3.0	0.8
2019	Jan	-0.7 [†]	6.7 [†]	-1.2 [†]	-2.6 [†]	1.6 [†]	9.6 [†]	6.5 [†]	3.0 [†]	-3.4 [†]	-2.4 [†]	0.9 [†]
	Feb	-0.5	8.8	-0.7	-4.9	2.0	11.6	4.3	4.0	-4.3	-0.6	-0.4
	Mar	0.2	5.2	0.7	-6.8	2.1	5.4	3.0	6.5	-4.2	1.4	-2.6
	Apr	-0.4	4.3	0.2	-8.4	1.7	4.3	2.5	5.9	-5.1	1.7	-4.3
	May	-0.6	2.5	-0.5	-4.5	1.7	2.7	1.7	4.4	-5.3	0.8	-2.3
	Jun	-1.4	-0.8	-1.9	-0.4	1.2	-0.6	0.7	1.1	-5.3	-0.7	-0.8
	Jul	-1.4	-1.9	-1.8	-0.1	0.7	-1.3	0.2	0.7	-3.9	-1.9	-0.8
	Aug	-2.0	-3.8	-2.1	-2.5	0.2	-3.8	0.4	1.1	-4.1	-2.7	-3.0
	Sep	-2.1	-2.2	-2.2	-3.5	0.6	-2.1	0.3	1.8	-4.5	-3.1	-3.0
	Oct	-1.9	-2.3	-2.2	-2.8	1.0	-2.3	1.4	1.2	-4.0	-3.0	-2.3
	Nov	-1.9	-1.0	-2.5	-1.5	1.3	-0.8	1.1	0.6	-4.4	-3.1	-0.9
	Dec	-2.0	-3.7	-2.5	-0.8	2.0	-4.3	-0.2	0.2	-4.5	-2.7	-1.0

1 Any apparent inconsistencies between the index numbers and the percentage changes shown in these tables are due to rounding.

2 Any apparent inconsistencies between these tables and the latest GDP estimate are due to rounding.

[†] indicates that data are new or have been revised. The period marked is the earliest in the table to have been revised.

IOP5 Output of the Production Industries

continued

Chained volume indices of gross value added¹

Seasonally adjusted 2016 = 100

Section	Broad industry groups						Main industrial groupings					
	Production industries B+C+D+E	Mining and quarrying B	Manufacturing C	Electricity, gas, steam and air conditioning D	Water supply, sewerage and waste management E	Oil and gas extraction 06	Consumer durables MIG-CD	Consumer non-durables MIG-CND	Capital goods MIG-CAG	Intermediate goods MIG-IG	Energy MIG-NRG	
Latest weight	1 000.0	47.5	748.5	108.7	95.3	34.6	68.2	211.6	272.3	252.2	182.5	
	K222	K224	K22A	K248	K24C	K226	K24Q	K24R	K24S	K24O	K24T	
Percentage change, latest 3 months on previous 3 months²												
2017 Oct	1.2	1.6	1.5	-0.7	0.8	2.7	3.5	0.3	2.8	1.0	-0.3	
Nov	1.5	3.4	1.7	-0.5	1.2	5.0	3.4	0.4	2.7	1.8	0.4	
Dec	1.1	-2.6	1.5	-0.2	0.6	-3.3	2.9	1.0	1.6	1.9	-0.8	
2018 Jan	0.4	-4.6	0.9	-	-0.4	-6.2	3.8	0.1	1.7	0.9	-1.6	
Feb	-0.1	-8.2	0.5	1.1	-1.5	-10.5	5.7	-0.3	2.1	-0.8	-1.5	
Mar	-0.1	1.5	-0.2	1.6	-1.8	3.1	7.4	-0.6	1.9	-2.6	1.4	
Apr	-0.2	3.6	-0.8	3.2	-0.7	6.1	4.6	0.1	0.2	-2.8	3.4	
May	-0.5	6.9	-1.0	-1.1	0.8	9.8	2.9	0.7	-1.2	-2.1	1.5	
Jun	-0.4	4.8	-0.4	-5.1	2.2	5.4	0.9	2.1	-2.1	-0.5	-1.5	
Jul	-	4.4	0.3	-6.7	3.2	4.3	1.3	2.4	-1.6	0.9	-2.6	
Aug	0.7	4.9	0.5	-1.8	3.1	5.1	-	1.9	-1.2	1.6	0.7	
Sep	0.6	3.2	0.1	1.6	1.8	3.7	-0.8	-0.3	-0.7	1.4	2.2	
Oct	-	2.3	-0.5	1.7	0.4	3.1	-1.4	-1.0	-0.8	0.2	1.6	
Nov	-0.7	-0.7	-0.8	-0.6	-0.6	-0.3	-0.6	-0.4	-1.3	-0.6	-0.8	
Dec	-0.9	-1.4	-0.8	-0.9	-0.9	-0.9	1.2	0.5	-1.4	-1.4	-1.2	
2019 Jan	-0.5 †	-3.6 †	-0.2 †	-0.6 †	-1.2 †	-4.0 †	1.9 †	1.4 †	-1.2 †	-0.7 †	-1.4 †	
Feb	-	-2.3	0.5	-1.5	-1.3	-3.0	1.9	1.8	-0.7	0.6	-1.7	
Mar	1.0	-1.4	1.8	-2.3	-1.0	-2.7	1.7	4.0	-	1.9	-2.0	
Apr	0.2	1.2	0.6	-3.0	-0.6	1.0	0.7	2.9	-1.7	1.2	-1.9	
May	-0.6	0.7	-0.8	-0.6	0.5	1.0	0.3	1.0	-2.2	-0.7	-0.5	
Jun	-2.0	-1.2	-3.0	1.4	1.3	-0.6	-1.4	-3.0	-3.3	-2.6	0.3	
Jul	-1.0	-1.7	-1.7	1.8	2.2	-1.3	-1.0	-2.6	-0.3	-2.6	0.9	
Aug	-0.7	-1.5	-1.1	0.2	1.6	-1.5	-2.1	-1.4	0.1	-2.0	-	
Sep	-0.1	1.7	-0.2	-1.6	1.2	2.1	-1.2	0.4	0.2	-1.1	-0.1	
Oct	-0.6	1.8	-0.8	-1.1	0.6	2.0	-0.3	-0.5	-1.0	-1.0	0.1	
Nov	-0.6	2.2	-1.1	0.5	0.5	2.8	0.9	-0.8	-1.6	-1.0	1.3	
Dec	-0.8	-2.8	-1.1	1.8	0.5	-3.1	0.7	-1.1	-1.5	-1.0	0.7	

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2 Any apparent inconsistencies between these tables and the latest GDP estimate are due to rounding.

† indicates that data are new or have been revised. The period marked is the earliest in the table to have been revised

IOP5 Output of the Production Industries

continued

Chained volume indices of gross value added¹

Seasonally adjusted 2016 = 100

Section	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
	CA	CB	CC	CD	CE	CF
Latest weight	119.1	22.9	54.0	8.1	47.0	55.1
	K22B	K22P	K22T	K22X	K22Z	K239
2015	100.8	102.3	101.5	101.4	106.6	95.5
2016	100.0	100.0	100.0	100.0	100.0	100.0
2017	99.7	100.1	101.1	101.4	102.6	98.2
2018	101.4	96.9	100.7	97.6	104.9	100.9
2019	102.4	95.5	100.4	97.7	102.5	107.5
2018 Q4	101.8	94.7	101.2	98.9	107.0	103.6
2019 Q1	104.2 [†]	96.1 [†]	102.9 [†]	103.5 [†]	109.9 [†]	111.9 [†]
Q2	101.5	95.1	100.4	94.9	102.6	107.1
Q3	102.1	96.0	100.2	93.8	98.9	106.7
Q4	101.8	94.6	98.2	98.8	98.5	104.1
2018 Oct	102.3	93.8	100.7	99.2	106.3	103.5
Nov	101.4	95.4	102.7	98.4	106.4	104.9
Dec	101.8	94.8	100.1	98.9	108.2	102.5
2019 Jan	103.4 [†]	94.5 [†]	101.6 [†]	103.5	109.6 [†]	109.8 [†]
Feb	103.7	95.8	102.8	106.5	109.6	110.0
Mar	105.7	97.9	104.2	100.4 [†]	110.4	116.0
Apr	103.1	97.0	102.4	96.2	102.2	107.0
May	101.6	94.0	98.9	98.3	103.9	103.8
Jun	99.8	94.5	100.0	90.3	101.8	110.3
Jul	100.8	96.3	100.0	95.0	99.4	114.9
Aug	102.2	94.8	100.9	91.1	98.4	104.2
Sep	103.2	96.9	99.8	95.3	98.9	101.0
Oct	103.4	95.5	99.4	99.3	100.2	102.9
Nov	101.4	94.4	97.6	98.6	96.1	106.0
Dec	100.4	93.9	97.6	98.4	99.2	103.4

Percentage change, latest year on previous year

2015	-0.2	-2.2	0.7	2.4	5.1	0.6
2016	-0.8	-2.3	-1.4	-1.3	-6.2	4.7
2017	-0.3	0.1	1.1	1.4	2.6	-1.8
2018	1.7	-3.2	-0.4	-3.8	2.3	2.7
2019	1.0	-1.5	-0.3	0.2	-2.4	6.5

Percentage change, latest month on same month a year ago

2017 Oct	1.0	1.9	3.0	-1.6	2.8	5.8
Nov	1.3	5.9	2.4	-8.4	4.1	-0.5
Dec	-1.3	5.5	0.7	-4.0	1.2	-13.3
2018 Jan	-2.2	1.0	-1.6	-8.2	-1.0	-0.8
Feb	-0.7	-3.7	1.0	-10.7	3.6	8.5
Mar	-0.8	-2.6	-2.5	-8.2	0.7	4.6
Apr	-1.0	-1.8	-2.0	-6.5	-1.2	1.5
May	3.3	-2.4	0.5	-9.5	1.2	0.8
Jun	2.2	-0.5	0.6	-5.7	2.5	6.4
Jul	4.4	0.7	3.8	3.6	4.3	0.5
Aug	4.3	-3.3	-1.7	1.0	-0.3	-0.6
Sep	3.3	-5.4	-0.2	0.5	4.3	3.5
Oct	3.0	-6.0	-1.3	-2.4	3.9	2.7
Nov	1.5	-6.2	0.8	1.0	3.5	3.1
Dec	2.8	-7.3	-1.9	0.9	6.4	2.7
2019 Jan	4.5 [†]	-3.8 [†]	1.3 [†]	11.3	7.2 [†]	10.8 [†]
Feb	4.2	0.2	2.2	17.8 [†]	5.5	9.8
Mar	5.7	-0.2	4.6	6.0	7.4	18.6
Apr	2.9	-0.7	3.2	-1.2	-	7.8
May	-0.1	-3.9	-2.4	3.6	-	3.5
Jun	-2.6	-3.5	-1.0	-8.6	-3.3	3.3
Jul	-2.7	-3.2	-2.6	-3.4	-6.7	19.5
Aug	-0.9	-3.4	1.8	-12.2	-4.4	5.3
Sep	1.4	1.2	-1.2	-7.3	-9.1	-0.5
Oct	1.1	1.8	-1.3	0.1	-5.8	-0.6
Nov	-	-1.1	-5.0	0.2	-9.7	1.1
Dec	-1.3	-1.0	-2.5	-0.5	-8.3	0.9

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[†] indicates that data are new or have been revised. The period marked is the earliest in the table to have been revised.

IOP5 Output of the Production Industries

Chained volume indices of gross value added¹

continued

Seasonally adjusted 2016 = 100

Section	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
	CG	CH	CI	CJ	CK	CL	CM
Latest weight	56.4	82.3	51.6	19.4	58.1	108.5	66.1
	K23B	K23G	K23N	K23P	K23R	K23T	K23Z
2015	98.1	102.9	100.1	104.2	100.6	96.2	95.7
2016	100.0	100.0	100.0	100.0	100.0	100.0	100.0
2017	99.6	101.4	104.9	102.7	107.2	103.1	106.7
2018	97.5	99.8	119.9	96.6	110.3	101.8	105.0
2019	94.1	100.3	120.9	97.4	101.9	95.5	101.8
2018 Q4	97.0	96.8	120.9	97.9	107.6	98.2	104.0
2019 Q1	96.1 ^T	101.9 ^T	123.2 ^T	99.2 ^T	105.9 ^T	98.3 ^T	103.0 ^T
Q2	94.4	99.6	120.8	100.3	103.1	92.0	104.2
Q3	93.2	100.3	119.1	96.3	100.4	96.7	101.0
Q4	92.9	99.2	120.6	94.0	98.0	94.9	99.0
2018 Oct	97.8	97.6	119.9	98.2	107.4	98.2	105.1
Nov	97.6	95.6	121.6	97.7	108.0	98.1	105.3
Dec	95.7	97.1	121.3	97.7	107.4	98.4	101.8
2019 Jan	95.9	101.0 ^T	122.1 ^T	99.0 ^T	105.8 ^T	97.8 ^T	101.8 ^T
Feb	96.0 ^T	103.1	123.8	98.8	106.1	97.8	103.0
Mar	96.5	101.7	123.6	99.6	105.9	99.4	104.2
Apr	95.0	99.4	119.1	101.6	103.7	83.7	106.2
May	94.0	100.6	122.9	100.2	102.8	94.1	104.7
Jun	94.1	98.9	120.3	99.2	103.0	98.1	101.7
Jul	94.0	100.8	119.4	97.9	100.4	97.3	100.6
Aug	92.6	100.1	118.6	95.6	101.1	96.8	101.6
Sep	92.8	100.0	119.2	95.3	99.7	96.1	100.8
Oct	92.4	98.6	123.4	94.9	99.8	96.7	99.5
Nov	92.2	98.8	119.3	93.7	97.9	92.5	99.3
Dec	94.2	100.3	119.0	93.3	96.3	95.4	98.2
Percentage change, latest year on previous year							
2015	1.5	-0.4	-2.2	0.3	-12.8	6.2	-0.9
2016	1.9	-2.8	-0.1	-4.1	-0.6	4.0	4.5
2017	-0.4	1.4	4.9	2.7	7.2	3.1	6.7
2018	-2.1	-1.6	14.3	-5.9	2.9	-1.3	-1.6
2019	-3.5	0.5	0.8	0.8	-7.7	-6.2	-3.0
Percentage change, latest month on same month a year ago							
2017 Oct	-0.2	7.7	6.5	3.8	12.2	8.6	3.9
Nov	1.2	4.7	7.5	-1.0	11.1	0.9	10.8
Dec	-	3.5	3.4	2.7	10.3	1.8	6.8
2018 Jan	-0.7	0.7	13.5	-0.4	14.2	2.6	1.4
Feb	-2.5	3.4	14.8	-5.3	2.7	3.1	-2.2
Mar	-4.4	3.8	23.6	-3.0	10.4	0.8	-1.7
Apr	-5.5	1.7	18.7	-5.5	10.6	-1.3	3.1
May	-2.4	-3.1	20.3	-3.4	3.2	0.1	2.2
Jun	2.1	-0.7	11.3	-11.9	7.5	2.9	-3.0
Jul	0.8	1.6	19.4	-9.4	2.0	-4.8	-2.6
Aug	-1.0	0.1	15.9	-4.0	2.1	-0.5	-2.6
Sep	-1.5	-1.3	4.7	-9.4	-2.9	-0.8	-4.8
Oct	-2.2	-6.0	10.9	-5.5	-3.1	-9.2	0.4
Nov	-3.4	-8.1	12.3	-5.3	-4.0	-3.7	-2.2
Dec	-3.9	-9.7	8.3	-7.4	-5.9	-4.2	-6.9
2019 Jan	-2.8	-0.7 ^T	3.4 ^T	-1.6 ^T	-10.2 ^T	-7.9 ^T	-5.2 ^T
Feb	-0.1 ^T	-	4.6	1.0	-4.7	-8.0	-2.7
Mar	0.8	-0.6	2.7	5.1	-7.6	-3.3	-1.5
Apr	0.2	-1.7	0.3	5.4	-8.0	-18.2	1.0
May	-4.0	3.7	0.6	3.5	-6.3	-8.2	-0.6
Jun	-6.0	-1.3	0.2	7.1	-6.1	-3.2	-2.4
Jul	-5.5	0.1	-0.8	2.0	-7.5	-3.9	-4.1
Aug	-5.7	-0.5	-2.1	-0.1	-7.3	-5.6	-2.8
Sep	-5.5	-0.2	2.4	0.2	-7.3	-5.5	-3.3
Oct	-5.4	1.0	3.0	-3.3	-7.0	-1.5	-5.2
Nov	-5.5	3.4	-1.9	-4.1	-9.3	-5.7	-5.7
Dec	-1.5	3.3	-1.9	-4.5	-10.4	-3.0	-3.5

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^T indicates that data are new or have been revised. The period marked is the earliest in the table to have been revised.

IOP5 Output of the Production Industries

Chained volume indices of gross value added¹

continued

Seasonally adjusted 2016 = 100

Section	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
	CA	CB	CC	CD	CE	CF
Latest weight	119.1	22.9	54.0	8.1	47.0	55.1
	K22B	K22P	K22T	K22X	K22Z	K239
Percentage change, latest month on previous month						
2017 Oct	0.8	-1.5	0.7	-0.5	-1.9	2.8
Nov	0.6	2.0	-0.1	-4.2	0.5	1.0
Dec	-0.9	0.5	0.1	0.6	-1.1	-1.9
2018 Jan	-0.1	-3.9	-1.7	-5.2	0.5	-0.7
Feb	0.6	-2.7	0.3	-2.8	1.6	1.1
Mar	0.4	2.6	-0.9	4.7	-1.0	-2.3
Apr	0.2	-0.6	-0.5	2.9	-0.6	1.5
May	1.4	0.1	2.1	-2.6	1.7	1.0
Jun	0.7	0.2	-0.3	4.1	1.4	6.5
Jul	1.2	1.7	1.7	-0.4	1.2	-10.0
Aug	-0.5	-1.5	-3.6	5.6	-3.5	3.0
Sep	-1.3	-2.4	2.0	-1.1	5.7	2.6
Oct	0.6	-2.0	-0.4	-3.4	-2.3	2.0
Nov	-0.9	1.6	2.0	-0.8	0.1	1.3
Dec	0.4	-0.6	-2.5	0.5	1.7	-2.3
2019 Jan	1.6 [†]	-0.3 [†]	1.5 [†]	4.7 [†]	1.3 [†]	7.1 [†]
Feb	0.3	1.4	1.1	2.9	0.1	0.2
Mar	1.9	2.2	1.4	-5.7	0.7	5.5
Apr	-2.4	-1.0	-1.8	-4.2	-7.4	-7.7
May	-1.5	-3.1	-3.4	2.2	1.6	-3.0
Jun	-1.8	0.6	1.1	-8.2	-2.0	6.3
Jul	1.1	1.9	-	5.3	-2.3	4.1
Aug	1.4	-1.6	0.9	-4.1	-1.0	-9.3
Sep	0.9	2.3	-1.0	4.5	0.5	-3.1
Oct	0.3	-1.4	-0.5	4.3	1.3	1.9
Nov	-2.0	-1.2	-1.8	-0.7	-4.0	3.0
Dec	-0.9	-0.5	-	-0.2	3.2	-2.4
Percentage change, latest 3 months on same 3 months a year ago						
2017 Oct	-0.2	1.0	1.8	1.9	3.1	2.8
Nov	0.3	2.6	2.2	-3.0	3.4	1.4
Dec	0.3	4.4	2.0	-4.7	2.7	-3.3
2018 Jan	-0.7	4.1	0.5	-6.9	1.4	-5.2
Feb	-1.4	0.9	-	-7.6	1.2	-2.7
Mar	-1.2	-1.8	-1.1	-9.0	1.1	4.0
Apr	-0.8	-2.7	-1.2	-8.5	1.0	4.8
May	0.5	-2.3	-1.4	-8.1	0.2	2.3
Jun	1.5	-1.6	-0.3	-7.2	0.8	2.9
Jul	3.3	-0.7	1.6	-4.1	2.6	2.6
Aug	3.6	-1.1	0.9	-0.5	2.1	2.1
Sep	4.0	-2.7	0.6	1.6	2.7	1.2
Oct	3.5	-4.9	-1.1	-0.3	2.6	1.9
Nov	2.6	-5.9	-0.2	-0.3	3.9	3.1
Dec	2.5	-6.5	-0.8	-0.2	4.6	2.8
2019 Jan	2.9 [†]	-5.8 [†]	0.1 [†]	4.3	5.7 [†]	5.5 [†]
Feb	3.8	-3.7	0.5	9.8	6.4	7.8
Mar	4.8	-1.3	2.7	11.6	6.7	13.1
Apr	4.3	-0.2	3.3	7.3	4.3	12.0
May	2.8	-1.6	1.8	2.7	2.5	9.9
Jun	0.1	-2.7	-0.1	-2.2	-1.1	4.8
Jul	-1.8	-3.5	-2.0	-2.9 [†]	-3.4	8.5
Aug	-2.1	-3.4	-0.6	-8.2	-4.8	9.1
Sep	-0.8	-1.8	-0.7	-7.7	-6.8	8.0
Oct	0.5	-0.2	-0.3	-6.6	-6.4	1.4
Nov	0.8	0.6	-2.5	-2.4	-8.2	-
Dec	-0.1	-0.1	-3.0	-0.1	-7.9	0.5

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[†] indicates that data are new or have been revised. The period marked is the earliest in the table to have been revised.

IOP5 Output of the Production Industries

continued

Chained volume indices of gross value added¹

Seasonally adjusted 2016 = 100

Section	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
	CG	CH	CI	CJ	CK	CL	CM
Latest weight	56.4	82.3	51.6	19.4	58.1	108.5	66.1
	K23B	K23G	K23N	K23P	K23R	K23T	K23Z
Percentage change, latest month on previous month†							
2017 Oct	0.3	2.3	-2.8	-1.1	-	5.4	-4.5
Nov	1.0	-	0.2	-0.7	1.5	-5.8	2.9
Dec	-1.4	3.5	3.4	2.3	1.5	0.9	1.5
2018 Jan	-0.9	-5.5	5.5	-4.6	3.2	3.3	-1.8
Feb	-2.6	1.4	0.2	-2.8	-5.4	0.1	-1.3
Mar	-0.4	-0.8	1.7	-3.1	2.8	-3.2	-0.2
Apr	-0.9	-1.2	-1.4	1.7	-1.5	-0.4	-0.6
May	3.3	-4.1	3.0	0.4	-2.7	-	0.2
Jun	2.1	3.3	-1.8	-4.4	-	-1.1	-1.1
Jul	-0.6	0.5	0.3	3.6	-1.1	-	0.6
Aug	-1.2	-0.1	0.6	-0.2	0.5	1.2	-0.3
Sep	-	-0.4	-3.9	-0.6	-1.5	-0.8	-0.2
Oct	-0.5	-2.5	3.0	3.2	-0.1	-3.5	0.8
Nov	-0.2	-2.1	1.5	-0.5	0.6	-0.1	0.2
Dec	-1.9	1.6	-0.3	-	-0.6	0.4	-3.3
2019 Jan	0.2 [†]	4.0 [†]	0.7 [†]	1.4 [†]	-1.5 [†]	-0.7 [†]	- [†]
Feb	0.1	2.2	1.4	-0.2	0.3	-	1.2
Mar	0.5	-1.4	-0.1	0.8	-0.2	1.6	1.2
Apr	-1.5	-2.2	-3.7	1.9	-2.0	-15.7	1.9
May	-1.0	1.1	3.2	-1.3	-0.9	12.3	-1.4
Jun	-	-1.7	-2.1	-1.1	0.2	4.3	-2.9
Jul	-0.1	2.0	-0.7	-1.3	-2.5	-0.8	-1.1
Aug	-1.5	-0.7	-0.7	-2.3	0.7	-0.6	1.0
Sep	0.2	-0.1	0.5	-0.3	-1.4	-0.7	-0.8
Oct	-0.4	-1.4	3.5	-0.4	0.1	0.7	-1.2
Nov	-0.3	0.2	-3.3	-1.2	-1.9	-4.4	-0.3
Dec	2.2	1.6	-0.3	-0.4	-1.7	3.2	-1.1
Percentage change, latest 3 months on same 3 months a year ago							
2017 Oct	-0.3	3.2	7.8	4.7	9.0	4.4	6.2
Nov	0.1	4.9	8.4	3.1	10.9	4.1	7.2
Dec	0.3	5.2	5.7	1.8	11.2	3.7	7.1
2018 Jan	0.1	3.0	8.0	0.4	11.9	1.8	6.2
Feb	-1.1	2.5	10.4	-1.0	9.0	2.5	1.9
Mar	-2.6	2.6	17.2	-2.9	9.0	2.2	-0.8
Apr	-4.1	3.0	18.9	-4.6	7.8	0.9	-0.3
May	-4.1	0.8	20.8	-4.0	8.0	-0.1	1.1
Jun	-1.9	-0.7	16.6	-7.0	7.1	0.5	0.7
Jul	0.2	-0.8	16.9	-8.3	4.2	-0.7	-1.2
Aug	0.6	0.3	15.4	-8.5	3.8	-0.9	-2.7
Sep	-0.6	0.1	13.1	-7.7	0.3	-2.1	-3.4
Oct	-1.5	-2.5	10.4	-6.4	-1.3	-3.6	-2.4
Nov	-2.4	-5.2	9.3	-6.8	-3.3	-4.7	-2.3
Dec	-3.1	-8.0	10.5	-6.1	-4.3	-5.8	-3.0
2019 Jan	-3.4 [†]	-6.3 [†]	7.9 [†]	-4.8 [†]	-6.7 [†]	-5.3 [†]	-4.8 [†]
Feb	-2.3	-3.6	5.4	-2.7	-7.0	-6.7	-5.0
Mar	-0.7	-0.5	3.5	1.5	-7.5	-6.4	-3.2
Apr	0.3	-0.8	2.5	3.8	-6.8	-9.8	-1.1
May	-1.0	0.4	1.2	4.7	-7.3	-9.9	-0.4
Jun	-3.3	0.2	0.4	5.3	-6.8	-9.9	-0.7
Jul	-5.2	0.8	-	4.2	-6.6	-5.1	-2.4
Aug	-5.7	-0.6	-0.9	2.9	-7.0	-4.2	-3.1
Sep	-5.6	-0.2	-0.2	0.7	-7.4	-5.0	-3.4
Oct	-5.6	0.1	1.1	-1.1	-7.2	-4.2	-3.8
Nov	-5.5	1.4	1.1	-2.4	-7.9	-4.2	-4.8
Dec	-4.2	2.6	-0.3	-4.0	-8.9	-3.4	-4.8

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IOP5 Output of the Production Industries

Chained volume indices of gross value added¹

continued

Seasonally adjusted 2016 = 100

Section	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
	CA	CB	CC	CD	CE	CF
Latest weight	119.1	22.9	54.0	8.1	47.0	55.1
	K22B	K22P	K22T	K22X	K22Z	K229
Percentage change, latest 3 months on previous 3 months						
2017						
Oct	-0.4	1.7	1.3	0.7	0.7	1.0
Nov	-0.2	1.4	1.7	-0.4	0.4	1.7
Dec	0.5	0.8	1.6	-0.9	-0.9	3.2
2018						
Jan	0.4	-	-	-6.0	-1.0	0.8
Feb	-0.1	-2.1	-0.8	-6.6	-0.5	-0.5
Mar	0.1	-3.8	-1.8	-6.5	0.7	-1.8
Apr	0.6	-3.6	-1.6	-2.1	0.7	-1.1
May	1.4	-0.9	-0.9	2.0	0.3	-0.5
Jun	1.9	0.4	0.4	4.7	0.8	3.2
Jul	2.7	1.3	1.9	3.4	2.2	2.0
Aug	2.4	0.7	0.9	4.9	1.9	1.5
Sep	1.4	-	0.4	4.8	2.2	-3.2
Oct	-0.2	-2.5	-1.4	4.7	0.7	0.3
Nov	-1.2	-3.6	0.6	-0.2	2.1	2.7
Dec	-1.0	-3.2	0.2	-2.8	0.8	4.9
2019						
Jan	-0.2 †	-1.0 †	1.2 †	-1.6	2.0 †	4.4 †
Feb	1.1	0.1	-	2.8	1.9	4.0
Mar	2.4	1.5	1.7	4.7 †	2.7	8.0
Apr	1.9	2.1	1.6	0.7	-0.6	5.0
May	0.5	1.3	0.3	-4.5	-3.3	1.4
Jun	-2.7	-1.0	-2.4	-8.3	-6.6	-4.4
Jul	-3.3	-2.0	-3.4	-6.4	-5.3	-1.2
Aug	-2.4	-1.1	-1.5	-6.3	-5.3	0.8
Sep	0.6	0.9	-0.2	-1.2	-3.6	-0.3
Oct	2.2	0.8	0.4	0.8	-2.5	-6.3
Nov	1.7	0.4	-1.3	6.1	-1.5	-5.9
Dec	-0.3	-1.5	-2.0	5.3	-0.4	-2.4

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IOP5 Output of the Production Industries

continued

Chained volume indices of gross value added¹

Seasonally adjusted 2016 = 100

Section	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
	CG	CH	CI	CJ	CK	CL	CM
Latest weight	56.4	82.3	51.6	19.4	58.1	108.5	66.1
	K23B	K23G	K23N	K23P	K23R	K23T	K23Z

Percentage change, latest 3 months on previous 3 months

2017	Oct	0.6	1.9	4.3	-0.8	4.4	2.1	1.0
	Nov	1.6	2.9	4.6	0.5	5.9	1.5	-0.1
	Dec	1.0	4.8	3.7	0.6	4.1	0.2	-0.9
2018	Jan	0.1	2.4	4.5	0.2	4.8	-0.9	0.9
	Feb	-2.1	1.0	6.4	-2.7	2.8	0.8	0.2
	Mar	-3.3	-2.6	8.7	-6.2	1.9	0.8	-0.8
	Apr	-4.2	-2.1	5.6	-6.5	-1.6	0.2	-2.3
	May	-2.0	-3.8	3.7	-5.2	-1.8	-2.4	-2.0
	Jun	0.8	-2.9	1.2	-2.5	-3.3	-2.9	-1.3
	Jul	3.8	-2.8	1.5	-1.3	-3.2	-2.1	-0.8
	Aug	3.2	0.3	0.1	-1.3	-2.8	-0.8	-0.9
	Sep	1.0	1.0	-0.9	0.4	-2.1	-0.2	-0.4
	Oct	-1.1	0.1	-1.5	1.3	-1.2	-0.9	-0.2
	Nov	-1.4	-2.7	-1.0	2.4	-1.4	-2.4	0.3
	Dec	-1.7	-3.7	1.3	2.3	-0.8	-3.6	-0.5
2019	Jan	-1.7	-1.6 [†]	2.1 [†]	1.8 [†]	-0.9 [†]	-2.7 [†]	-1.6 [†]
	Feb	-2.1 [†]	2.7	2.6	1.5	-1.1	-1.3	-2.6
	Mar	-0.9	5.3	1.8	1.3	-1.6	0.1	-1.0
	Apr	-0.6	3.6	0.4	1.9	-1.7	-4.5	1.5
	May	-0.7	0.1	-0.4	2.0	-2.2	-5.7	2.8
	Jun	-1.8	-2.3	-1.9	1.2	-2.6	-6.4	1.2
	Jul	-1.9	-1.3	-1.0	-0.9	-3.0	3.1	-2.0
	Aug	-1.7	-0.6	-2.0	-2.9	-2.5	5.4	-3.6
	Sep	-1.3	0.7	-1.4	-4.0	-2.6	5.2	-3.1
	Oct	-1.5	-0.5	-0.4	-3.8	-1.8	-	-1.6
	Nov	-1.2	-0.8	1.0	-3.0	-2.3	-2.4	-1.4
	Dec	-0.2	-1.1	1.2	-2.4	-2.4	-1.9	-2.0

¹ Any apparent inconsistencies between the index numbers and the percentage changes shown in these tables are due to rounding.

[†] indicates that data are new or have been revised. The period marked is the earliest in the table to have been revised.



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