CECIMO Economic and Statistical Toolbox

Second Quarter 2018

cecimo
European Association of
the Machine Tool Industries

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Introduction

Since first quarter we saw a moderate deceleration of economic growth in the Eurozone, though the economy is remaining stable overall. Sentiment indicators in industrialised countries are still positive, while leading business indicators show high saturation. GDP rose by 2.2% in the EA19 and EU28, compared to second quarter last year, outpaced by the US GDP growth of 2.8% for the same period.

Industrial production trended downwards in April but rebounded in May. Composite indicators, such as the Purchasing Mangers Index (PMI), fell since the beginning of the year but recovered slightly in June. The Euro picked up after the European Central Bank (ECB) confirmed that the low rates would last through the summer of 2019. Banks' credit standards for loans to enterprises continued to ease during the second quarter.

The OECD Business Confidence Indicator for Europe dropped moderately in the second quarter, perhaps suggesting a slowdown in machine tool orders by end-2018. Gross Fixed Capital Formation, highly correlated with CECIMO consumption, still implies a further increase in machine tool consumption.

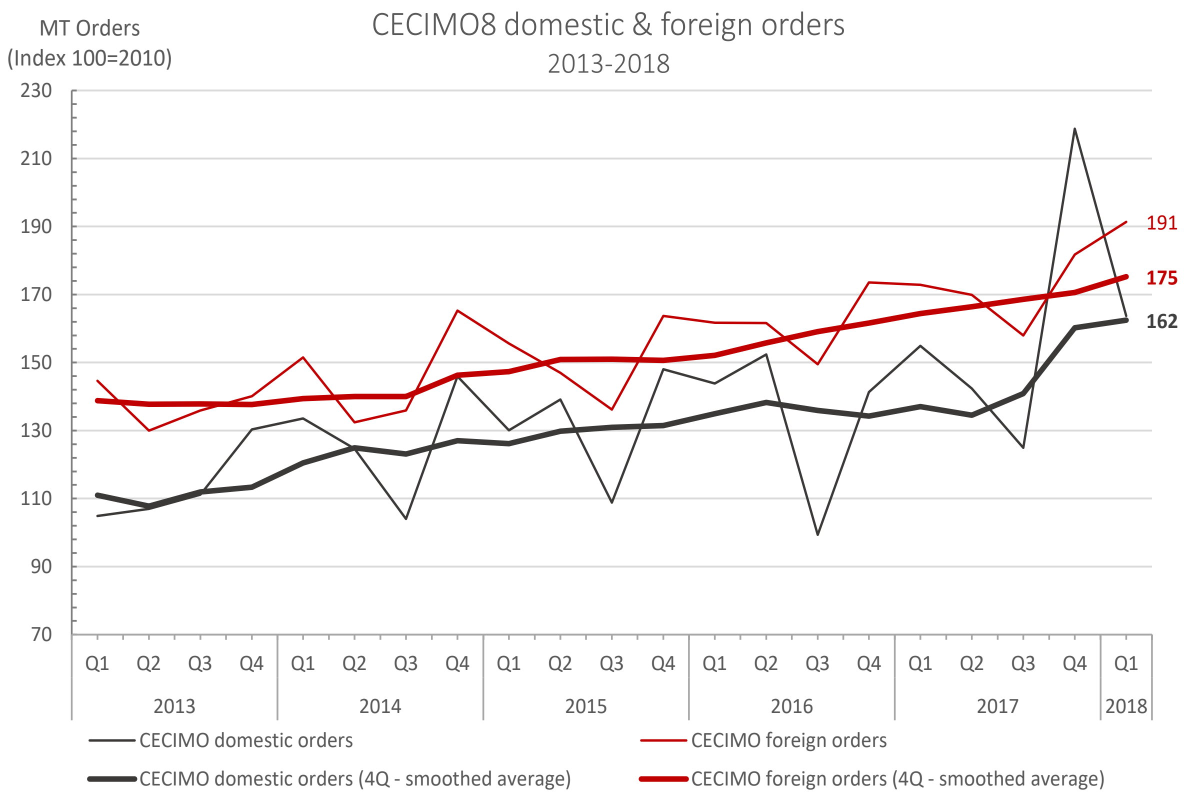
Our orders dropped only mildly in the first quarter, but current levels are 10% higher compared to the same period last year. Quarterly trade indicators scored lower than in the previous quarter – dragged down by the strong Euro and disputes over tariffs. In spite of this, we exported 10% more than in the first quarter of 2017. As a matter of fact, imports from the Americas plummeted by -95% over the year. The EU and US have agreed to work towards a close-to-zero tariff policy. Overall, managers in the machine Tool sector remain optimistic about the third quarter.

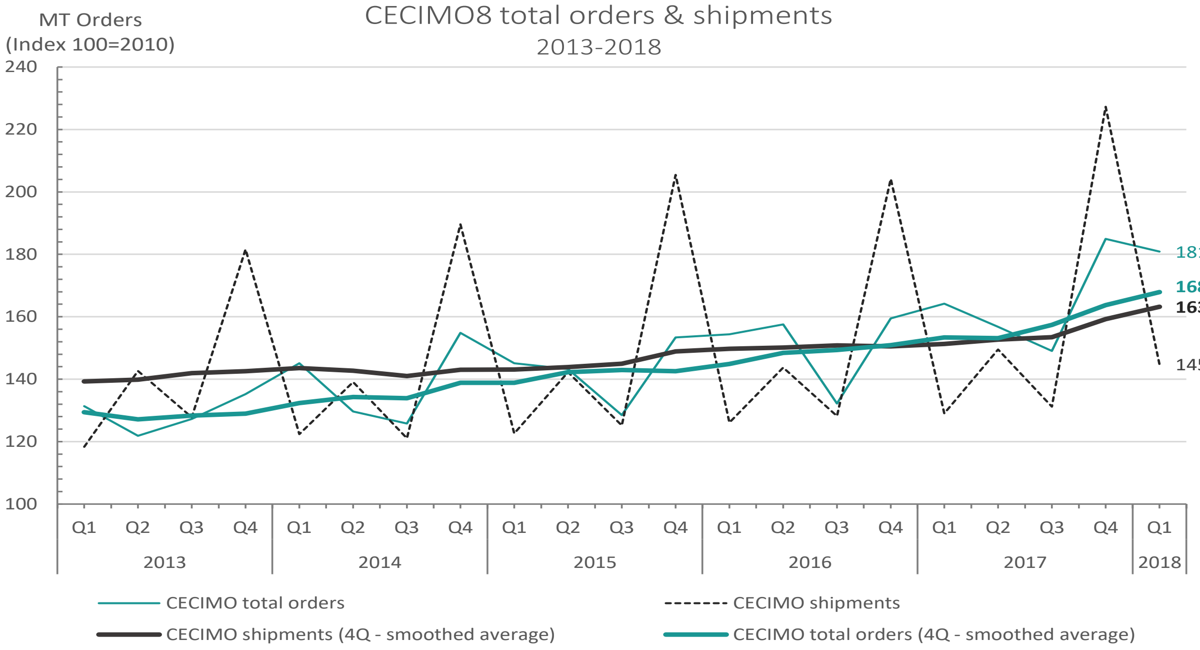
1. Data Specific to the European Machine Tool Market

1.1 Orders

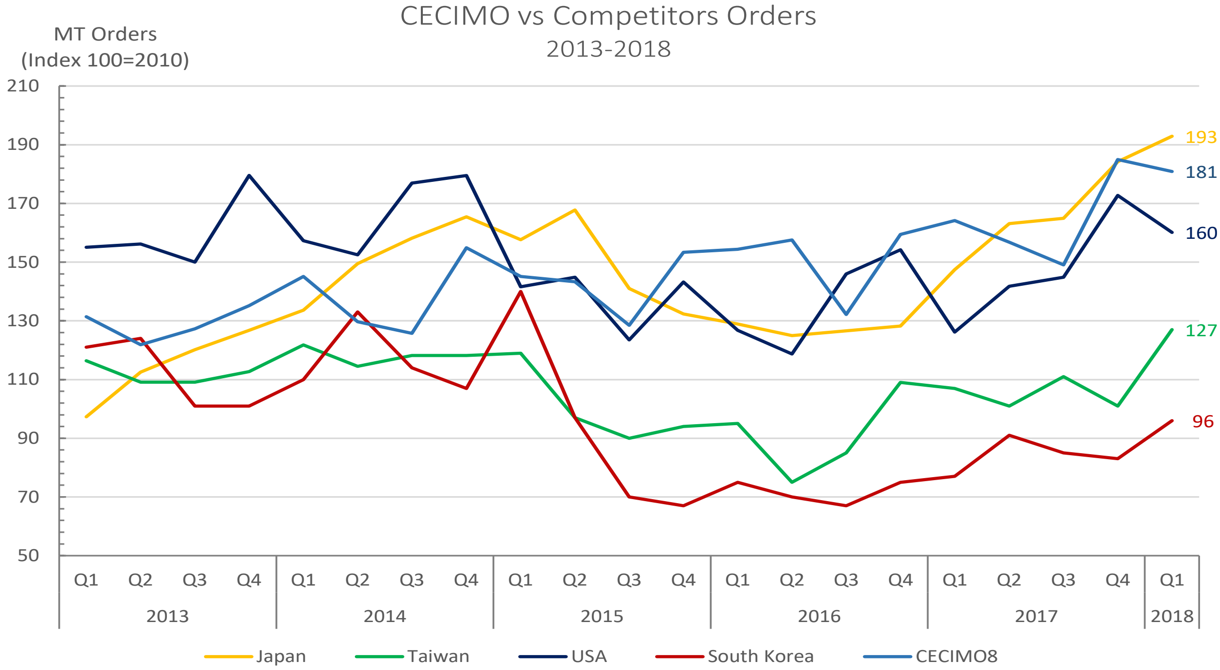
The first quarter of 2018 was marked by a -2% decrease for CECIMO8, compared to Q4 2017, but a +10% gain compared to Q1 2017.

- **Positive rates compared to the same quarter in 2017:** Germany (23%), Switzerland (18%), Austria (12%), UK (8%), Czech Republic (3%).
- **Negative rates compared to Q12017:** France (-42%), Spain (-13%), Italy (-3%).
- Important drops in the domestic orders over the year: France -45%, Italy -25%, Spain -18%, UK (-9%).
- **Sharp gains in domestic demand:** Germany (+39%), Austria (+30%), Switzerland (+22%).
- Important increase in foreign (+34%) and domestic (+45%) demand for metal-cutting machines in Japan over the course of the year. Sharp increase in foreign orders for Korea (+55%), compared to Q1 of 2017.



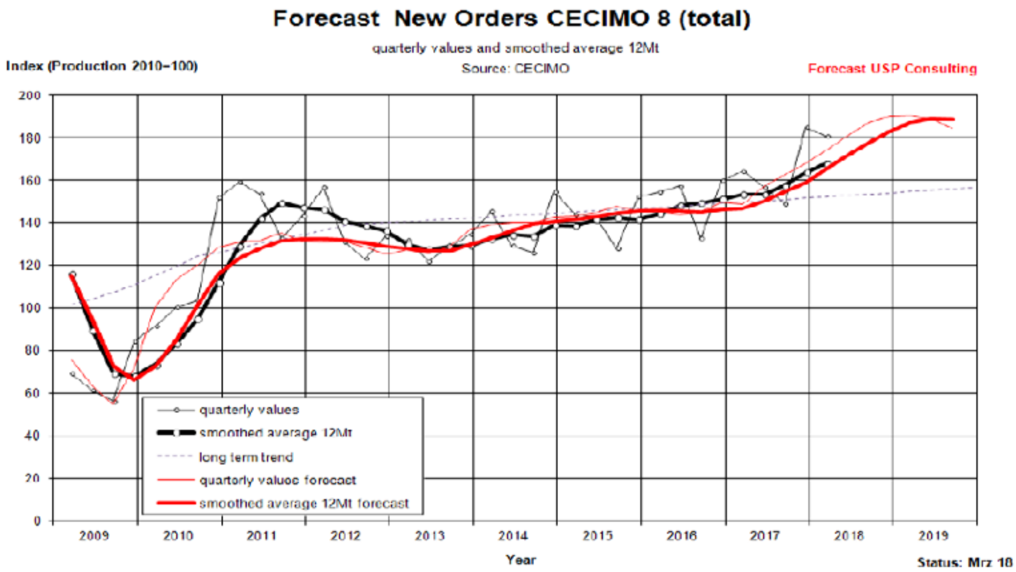


Positive rates compared to Q12017 outside CECIMO: Japan (+31%), US (+27%), South Korea (+25%).

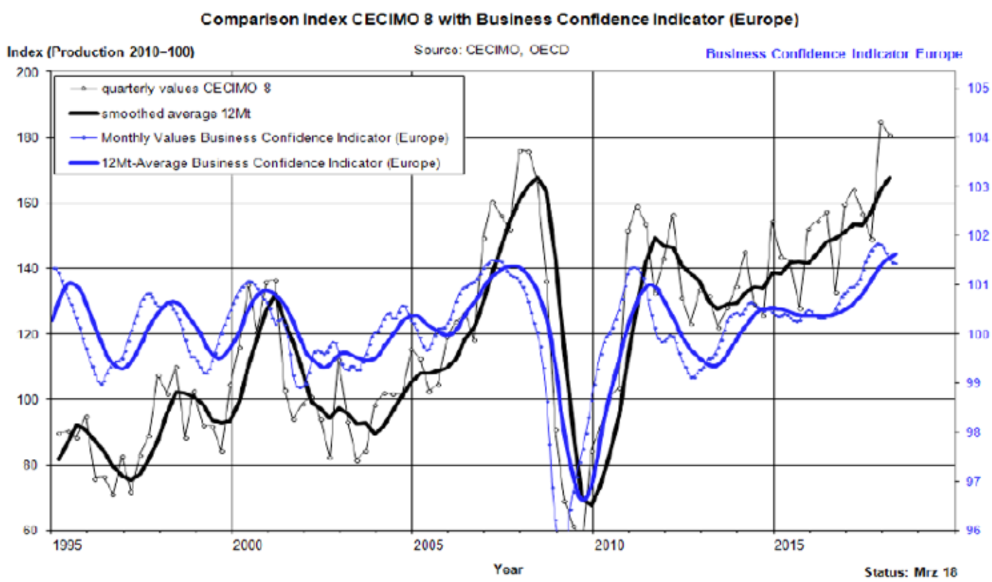


1.2 Peter Meier Forecast

- New orders are in line with the expectations, meaning the economy is stable.
- Demand is likely to grow at a rate of 10% in 2018 and reach its peak in spring 2019.



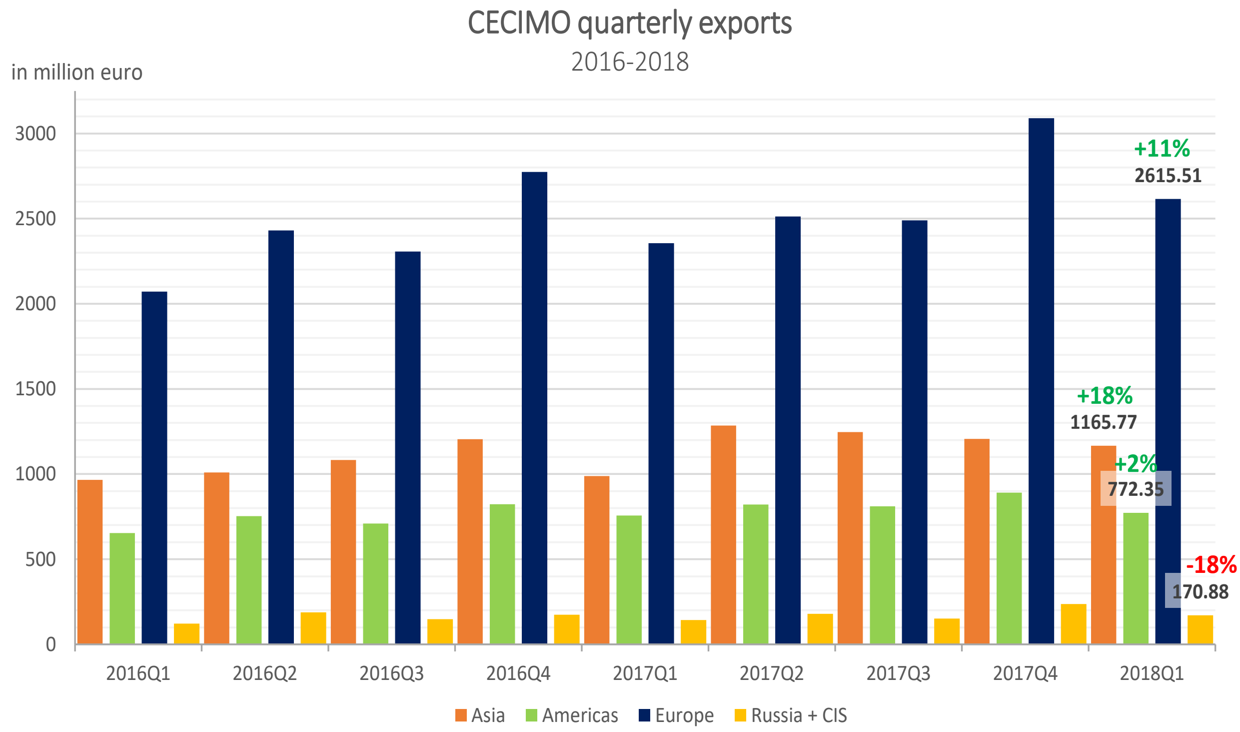
Sentiment indicators in industrialised countries are still positive. Both corporate leaders and consumers are optimistic about the future in the OECD. The OECD's Business Confidence Indicator exceeded its peak in both the EU and US. Other leading indicators also appear to be showing high saturation.



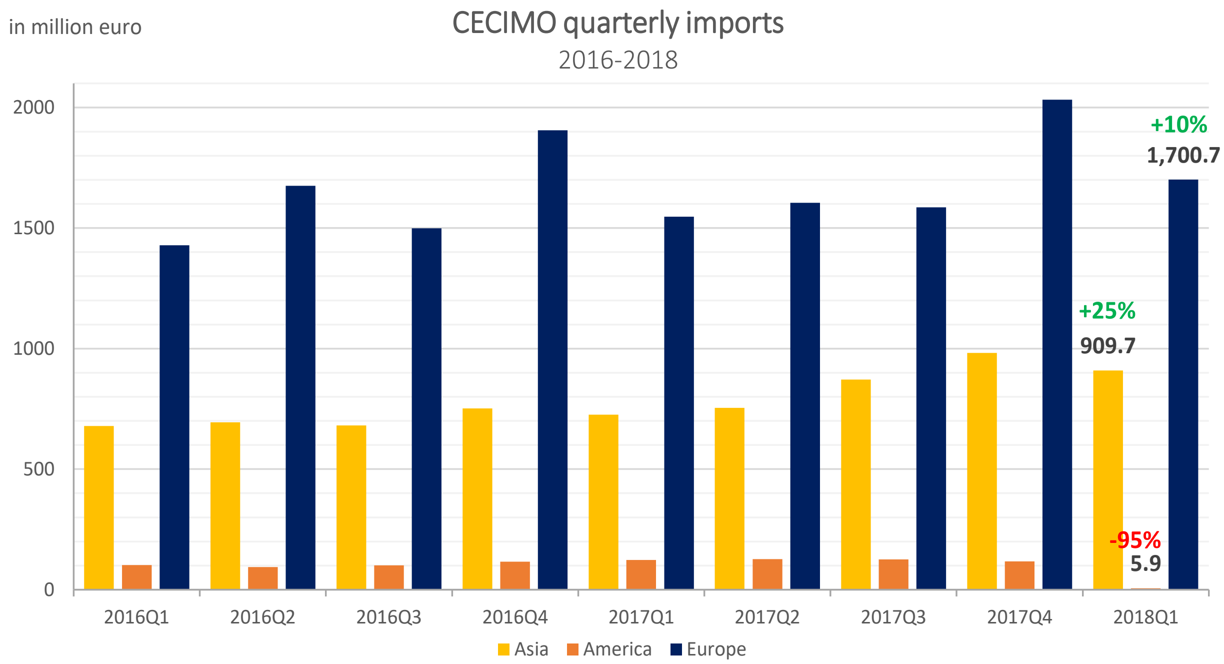
Peter Meier hints at a potential crisis: Volatile stock markets, record-level debts in non-financial sectors, and rising interest rates in the US.

1.3 Trade

CECIMO's export level decreased in the first quarter of 2018, but it is still 10% higher than the first quarter of 2017. Imports grew by 14% compared to the first quarter of 2017, and despite the fall from the last quarter of 2018.

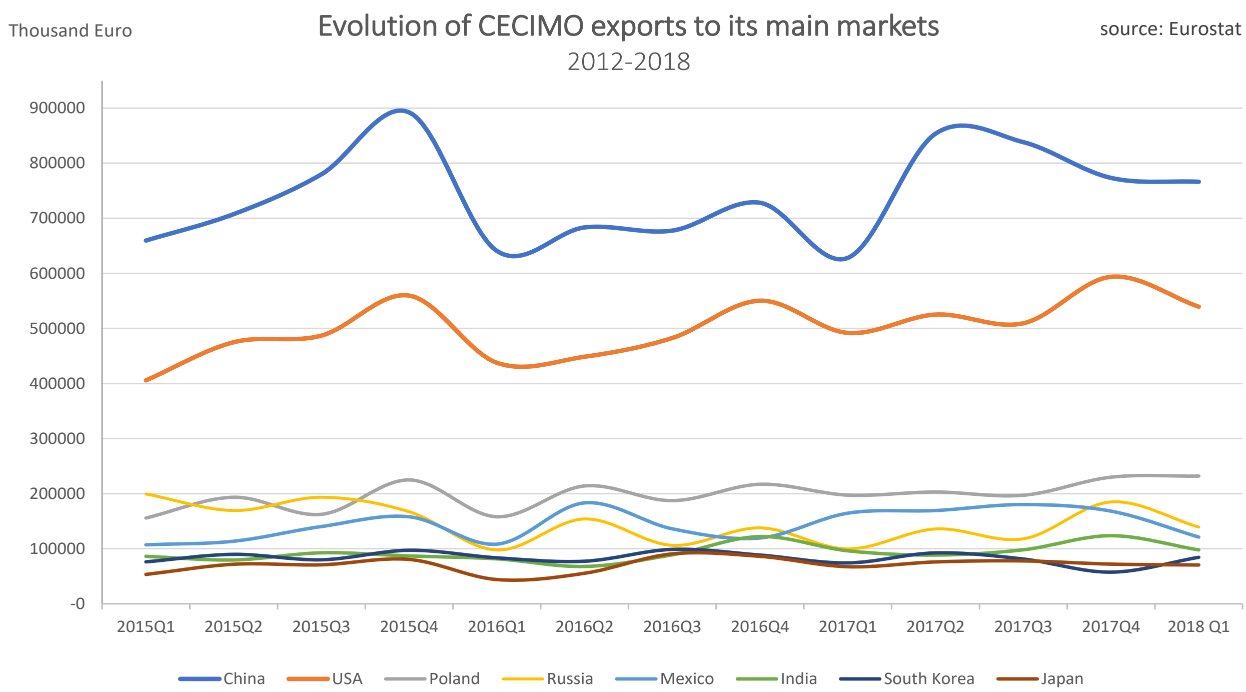


▶ +11% increase in quarterly exports to Europe (including CECIMO) over the year. Exports to Asia and the Americas grew by +18% and +2% since Q1 2017. Exports to Russia and other CIS countries dropped by 18%.

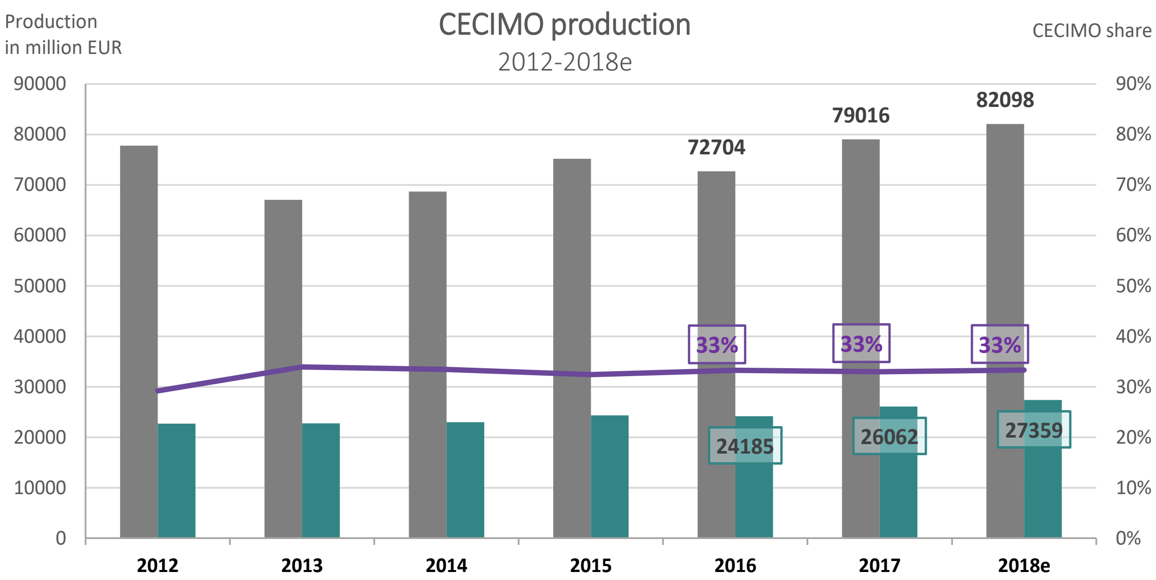


In the first quarter, CECIMO countries imported 95% fewer machine tools from the Americas, compared to Q1 2017. Among other factors, this reflects the tightening of tariffs on US imports.

At the same time, imports from European countries and Asia continued to grow over the year by 10% and 25% respectively.

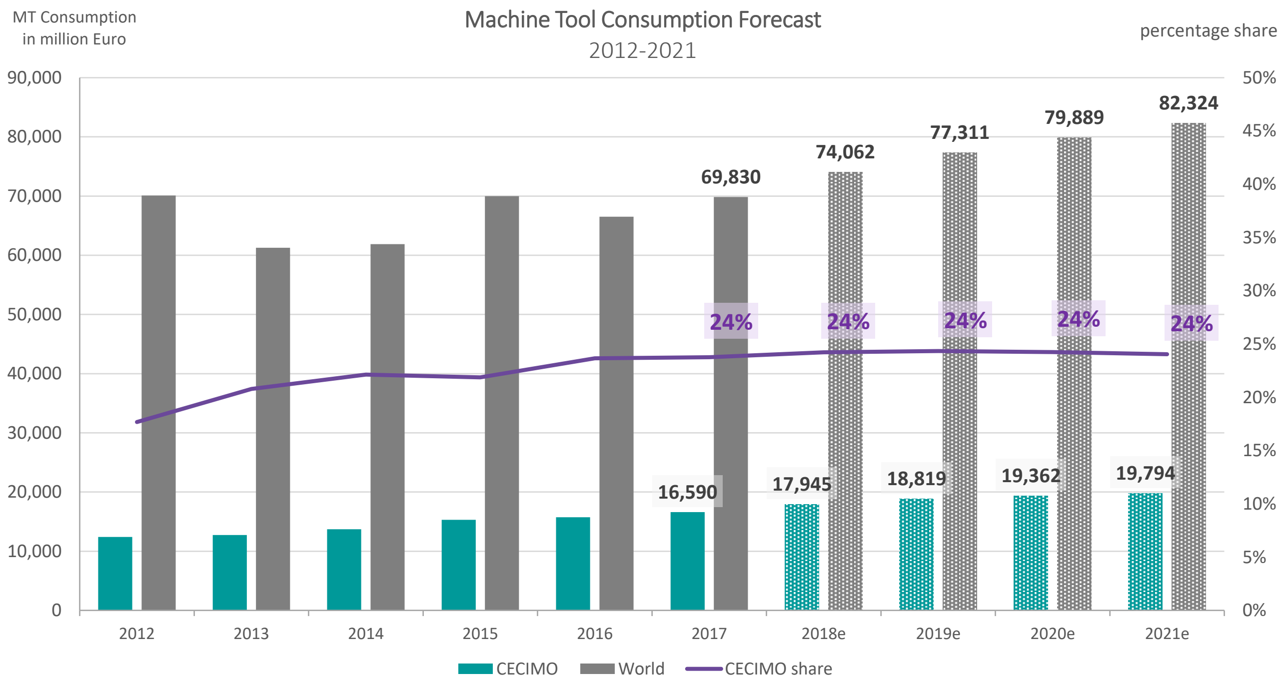


1.4 Production



CECIMO machine tool production accounted for €26 billion in 2017 – an 8% increase compared to 2016. CECIMO maintains its 33% share in the global machine tool production. For 2018, our producers expect a comparable growth rate.

1.5 Consumption



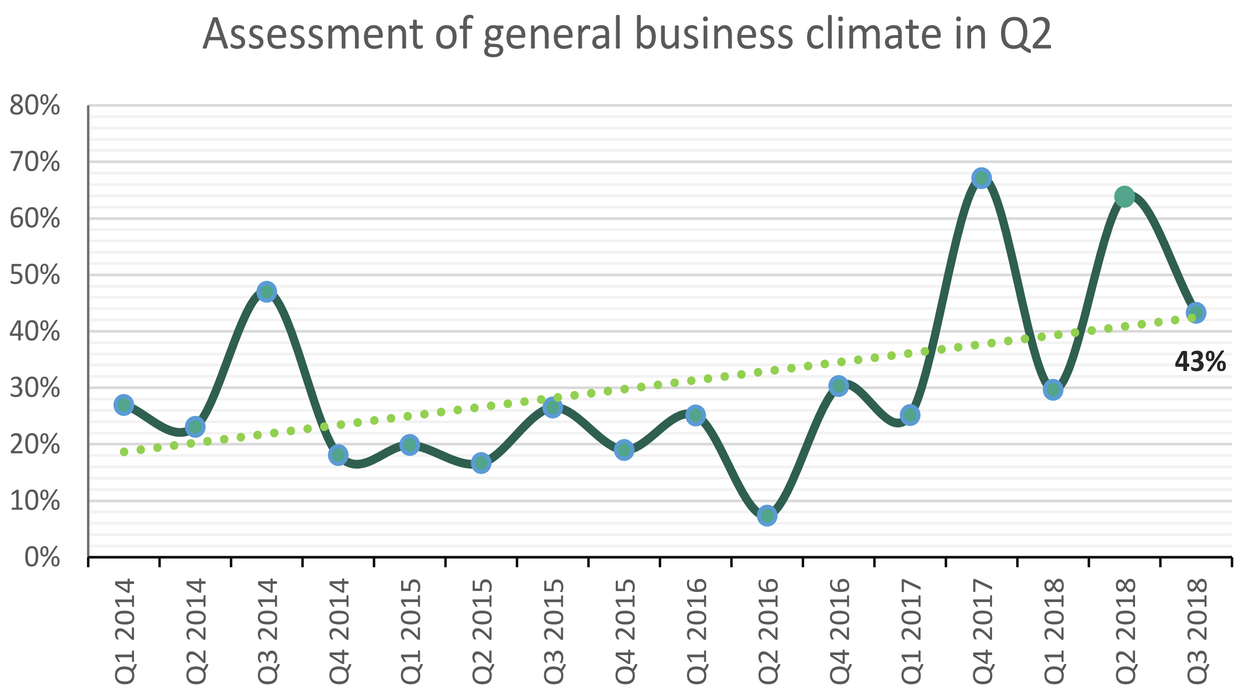
In 2017, CECIMO consumption increased by 5.4%, compared to previous year's 2.8%. In absolute value, it amounts to €16.6 billion.

CECIMO's share in global machine tool consumption amounts to 24% and is foreseen to remain stable until 2021.

1.6 Business Climate Barometer

The Business Climate Barometer is a quarterly survey assessing the CECIMO-based companies' current business sentiment and expectations for the next quarter. This edition is based on the responses of companies and national associations from 8 CECIMO member countries and was carried out in July 2018.
Methodology

National associations and individual companies assess their business climate and expectations for the third quarter of 2018 on a basis of 3 options (positive, neutral and negative) regarding demand, domestic production, export sales and employment. Moreover, respondents state their current rate of operation and indicate the factors hindering their activity. The results shown below correspond to the difference between positive and negative answers for each question, excluding the neutral ones, which are represented on the axis Y. Axis X correspond to a timeline.



The business climate among CECIMO manufacturers dropped to 43% in the second quarter. Nevertheless, it scored higher than in the beginning of the year.

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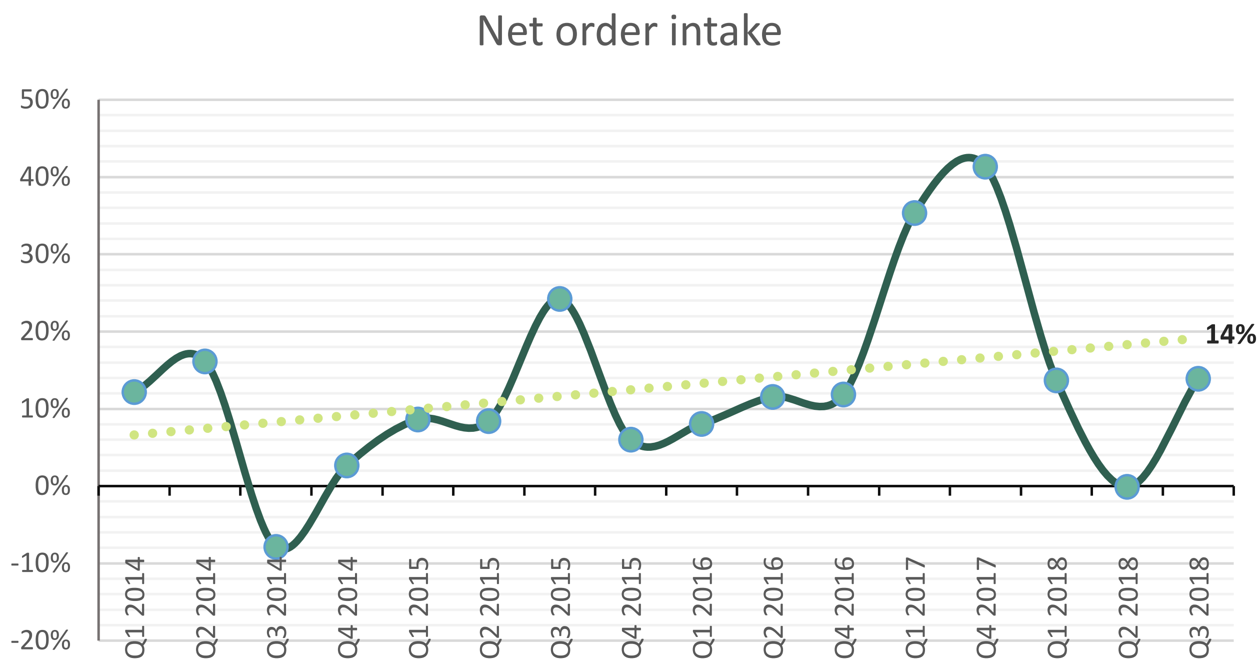
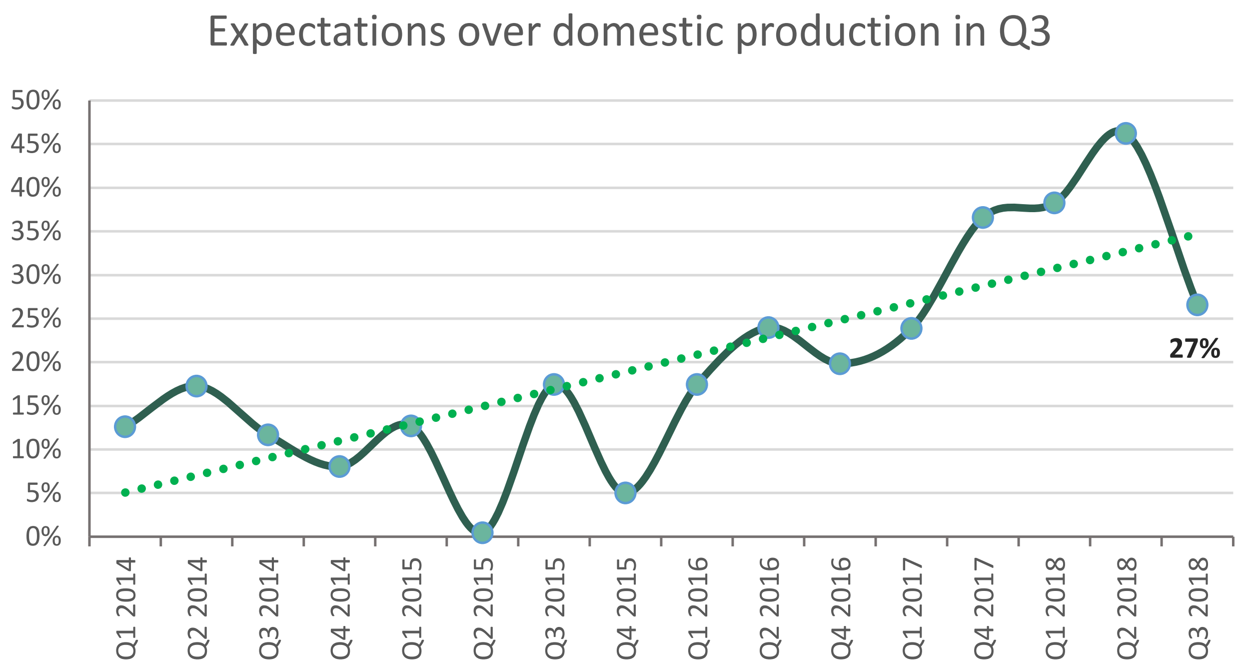


Net order intake increased compared to the previous month, according to 14% of respondents. For the third quarter, however, machine tool builders do not expect an increase in demand.



40% of respondents confirmed that domestic production increased compared to the last month, while 27% expect a further increase in production in the third quarter.

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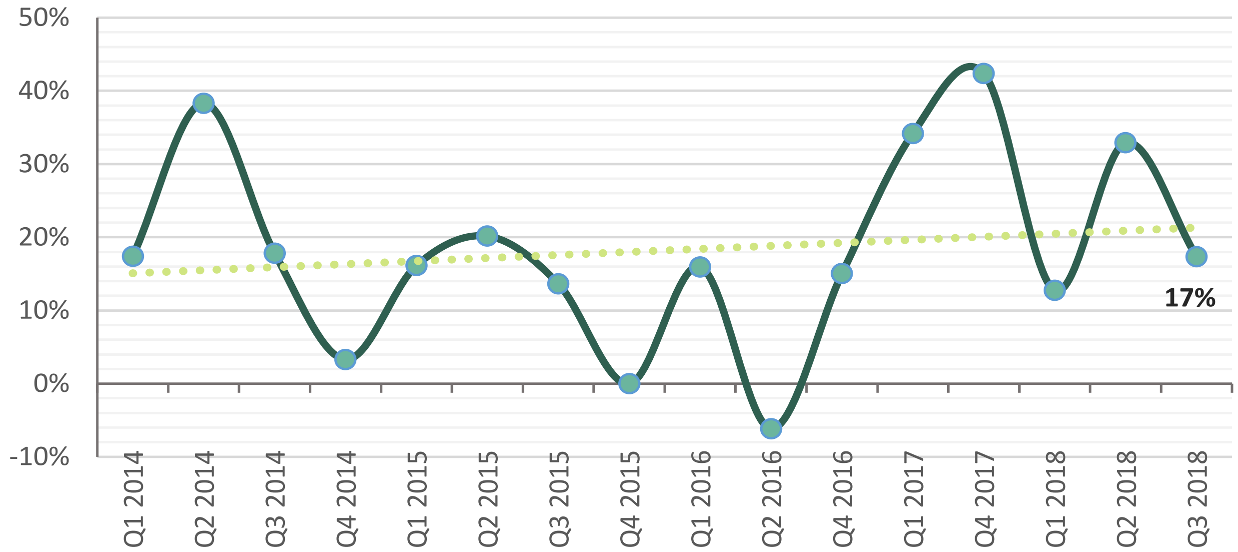
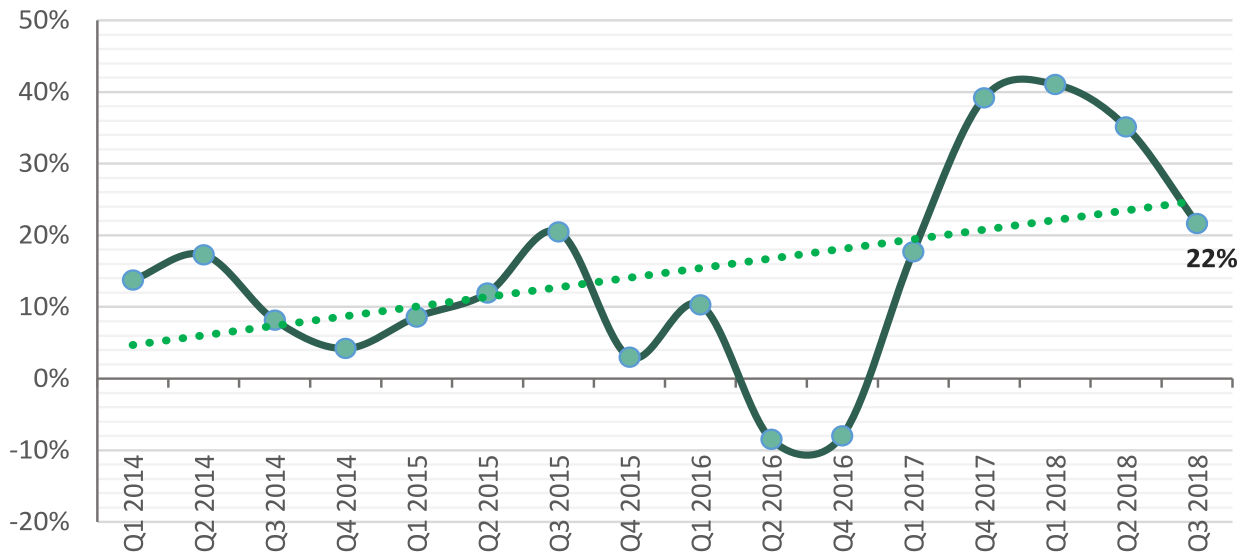
Expectations over export sales in Q3



European machine tool builders are confident about exports in the third quarter, with 18% of respondents expecting it to increase. Expectations for exports to Asia are even more optimistic, with 35% saying they foresee exporting more to Asia. 13.4% of the respondents expect to increase exports to the Americas.

Expectations over employment in Q3



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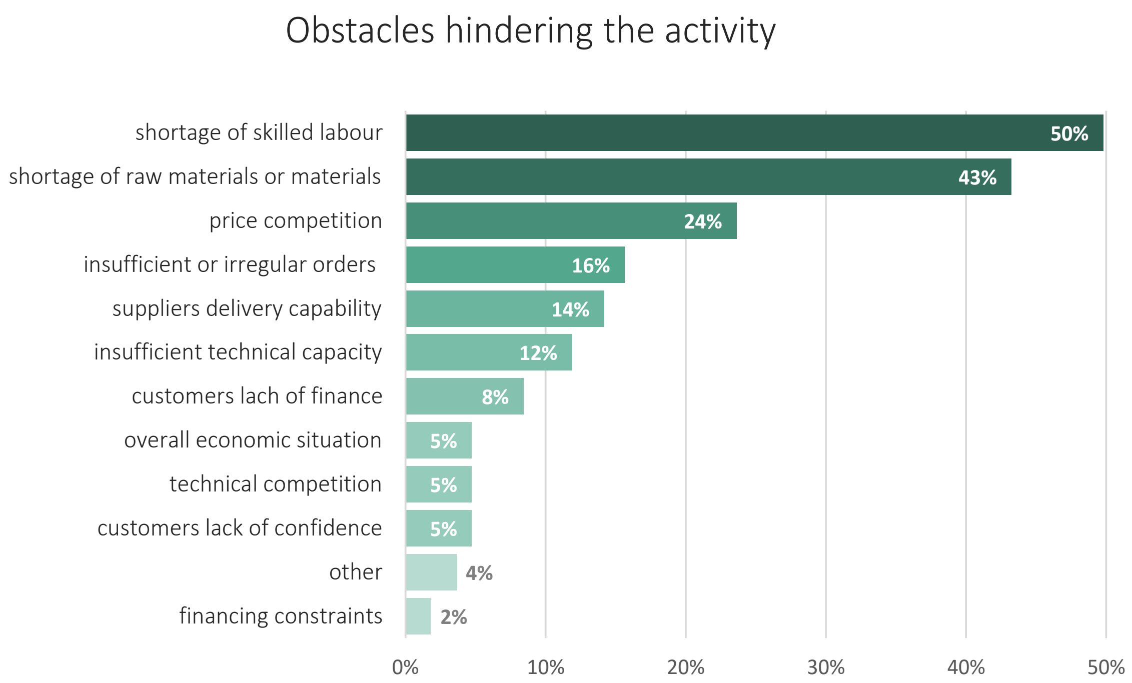
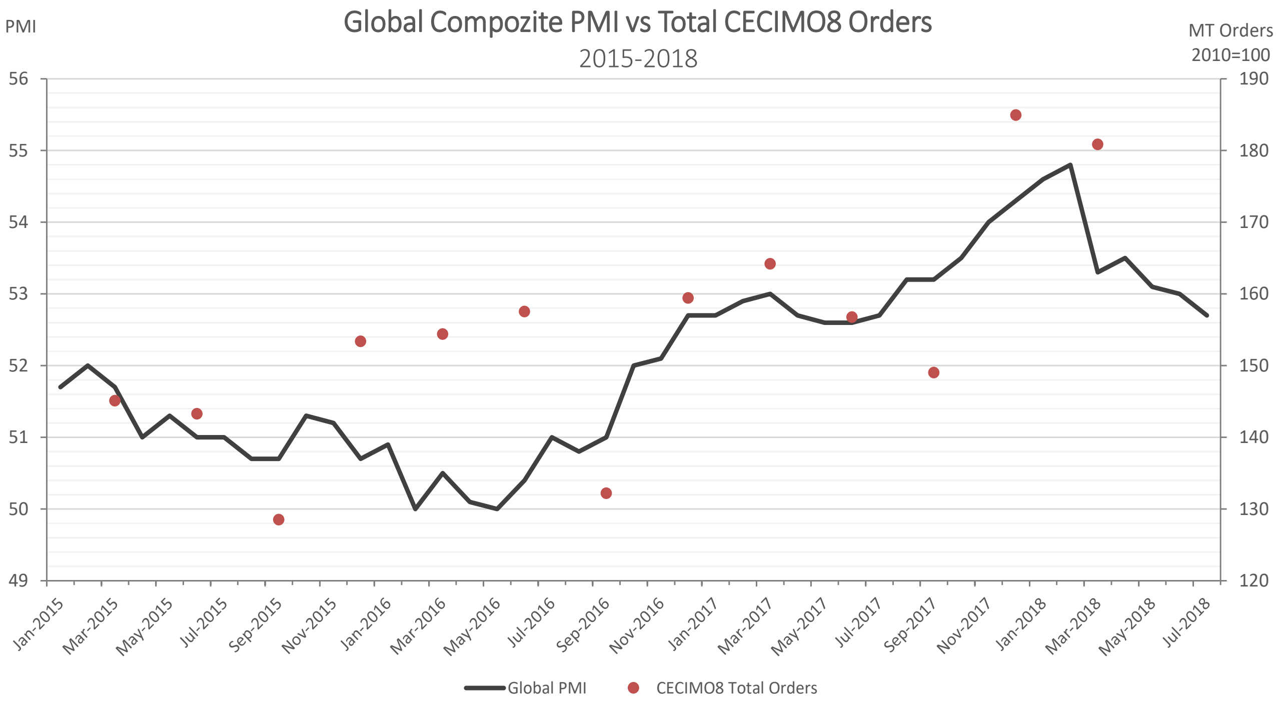


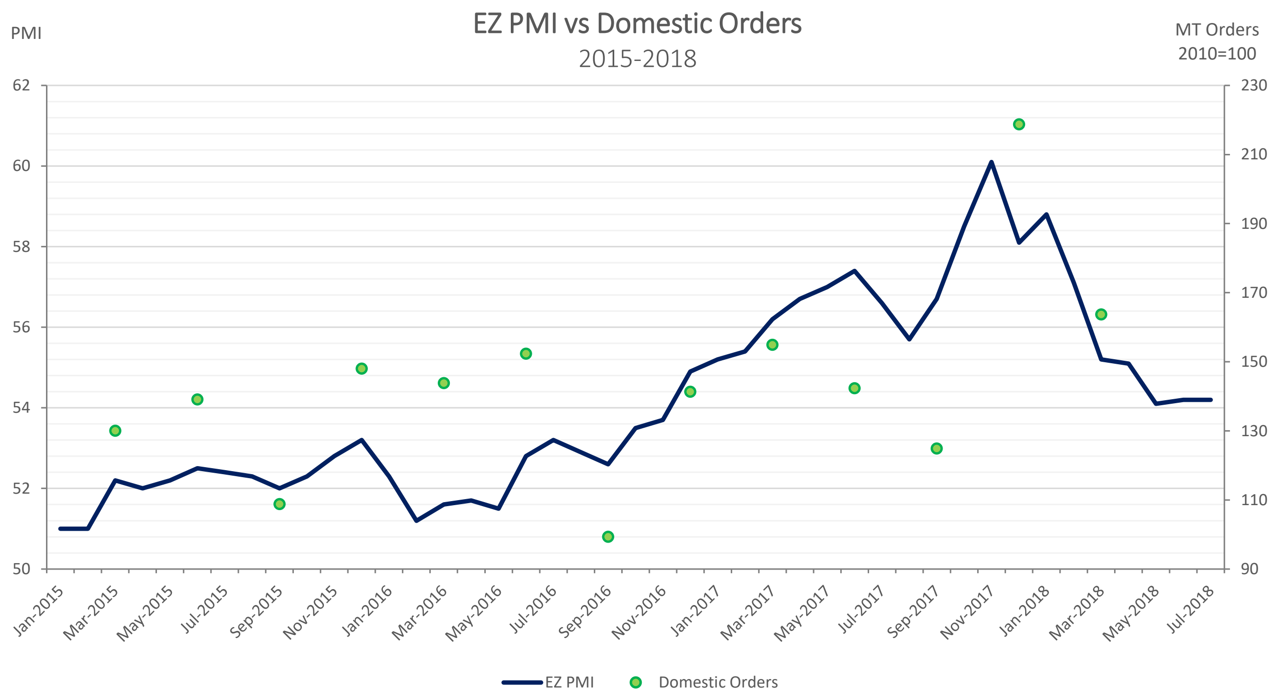
61% of CECIMO companies say they encounter obstacles that hinder their activities. Shortage of skilled labour, as well as materials and price competition were the factors respondents mentioned the most.

2. Macroeconomic Data in Relation to Machine Tool Orders

2.1 Purchasing Managers Index

Global manufacturing growth slows down at the beginning of the third quarter.





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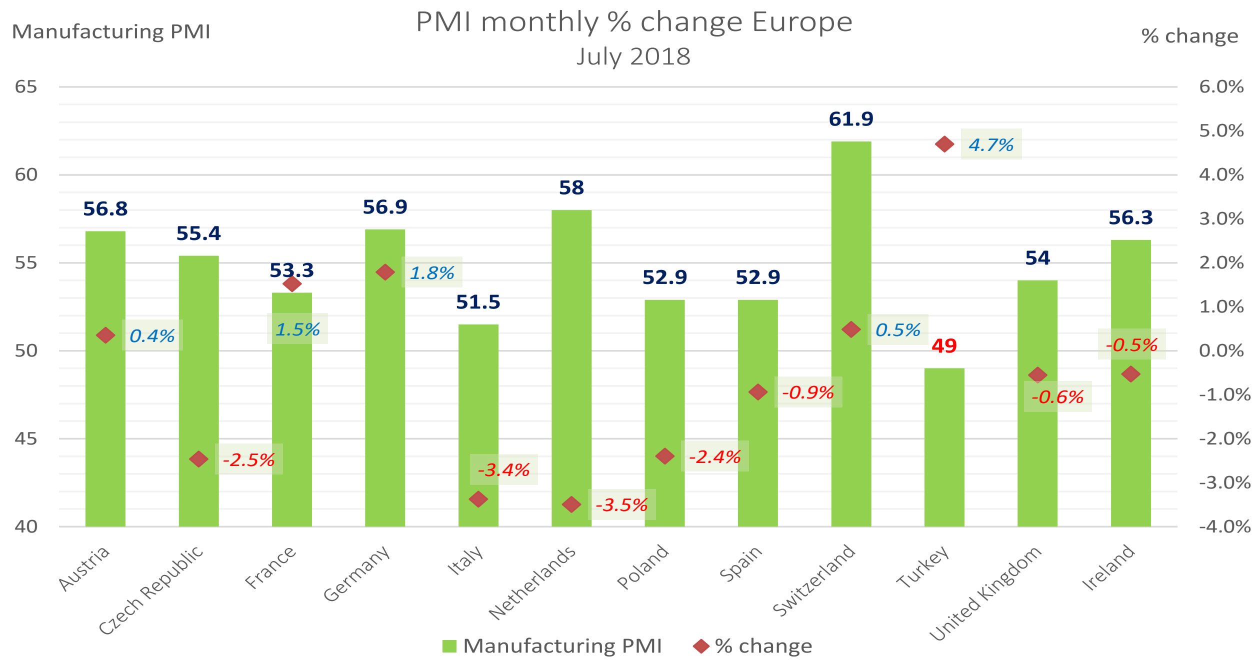

Germany has retained its momentum and started the third quarter with a sharp improvement in operating conditions.

France accelerated in July due to improving business conditions and stronger domestic demand.

Turkish orders continued to slow down, as prices rose and demand conditions deteriorated.

Dutch manufacturing growth and employment slowed further in July, but remained strong overall. New orders continued to grow but the pace of expansion slowed down.

Italian output and new orders have trended towards stagnation and manufacturing grew very modestly.

Spanish manufacturing improved moderately, given the increase of input (aluminium) and output prices.

UK output and new orders grew, but at a very slow pace due to input price pressures.

Czech manufacturing saw a slightly slower but strong improvement of business conditions. There was a further expansion in new orders and manufacturing activity.

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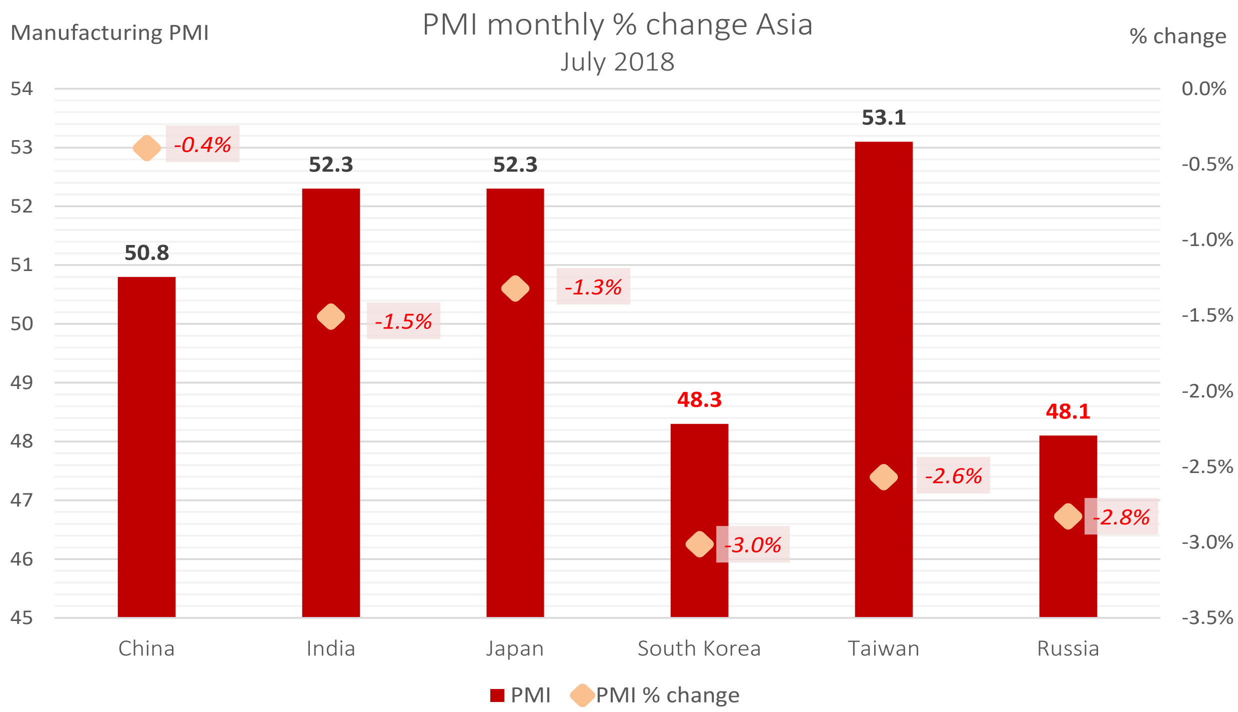


Chinese manufacturing is expanding at its slowest rates since November 2017, while new export orders fell sharply.


Japan saw its slowest manufacturing growth over the year. New business improved only mildly, whereas employment continued to grow strongly.


Korean business conditions deteriorated at the highest rate in 20 months and further worsened manufacturing activity.


Taiwan registered a softer rise in output and new business, due to increased uncertainties and lower business confidence.

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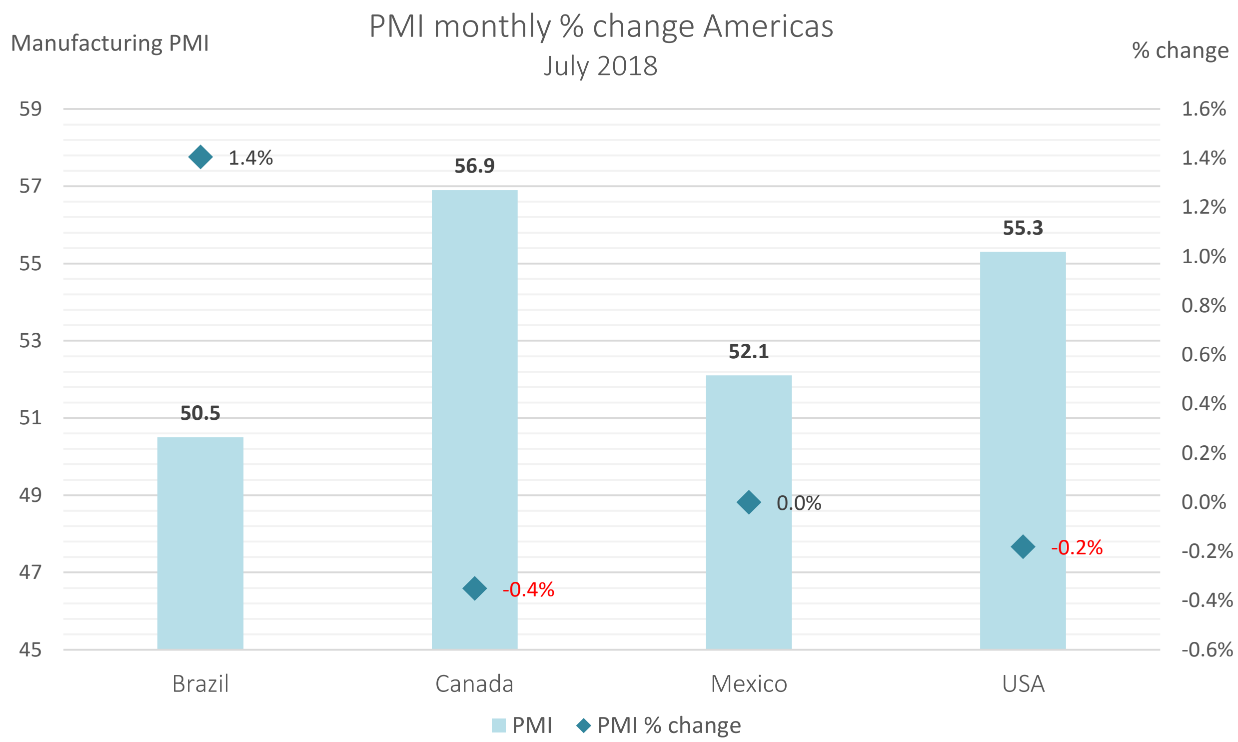


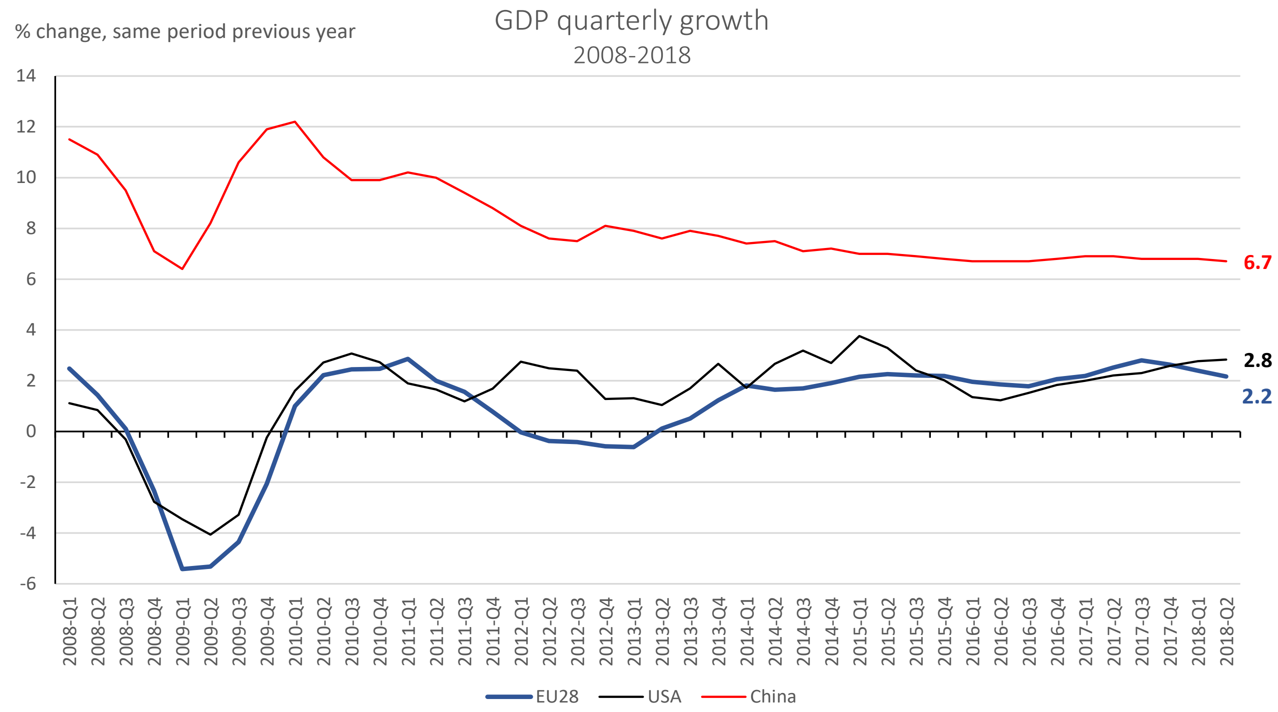

Canadian output, new business and employment levels grew confidently, but increased input prices (metal tariffs) and longer delivery times are putting pressure on export sales growth.


The US experienced strong business activity growth rates, but increased cost pressures.


In Mexico, business sentiment increased rapidly and operating conditions continued to improve at the beginning of the third quarter. Its PMI has remained unchanged as of June.


Brazil edged above 20.0. Its manufacturing sector improved only modestly, with decreasing export sales, political challenges and deteriorating business sentiment.

2.2 GDP



- The US outpaced the EU in the second quarter of 2018, registering 2.9% growth compared to Q2 of 2017.
- The EU economy grew by 2.2% in the second quarter, compared to the same quarter last year.
- China has kept its quarterly GDP growth at a steady level, averaging 6.8%.

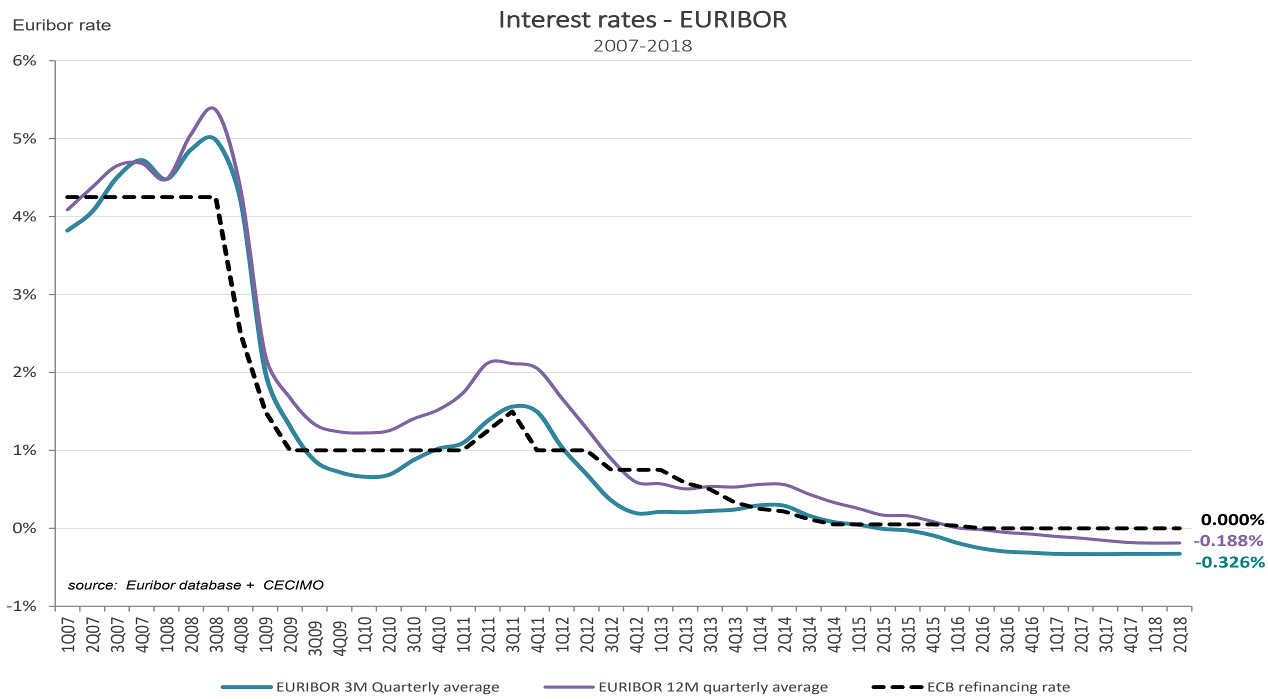
The OECD forecasts a 2.9% annual (real) GDP growth in 2018 and 2.8% in 2019 for the US. The Chinese economy is expected to grow by 6.7% in 2018 and by 6.4% in 2019.

The European Commission, in its summer interim report, stated that growth has been in a lower gear, but remains solid at 2.1% this year and 2% in 2019. The expansion is mainly due to private consumption and investment.

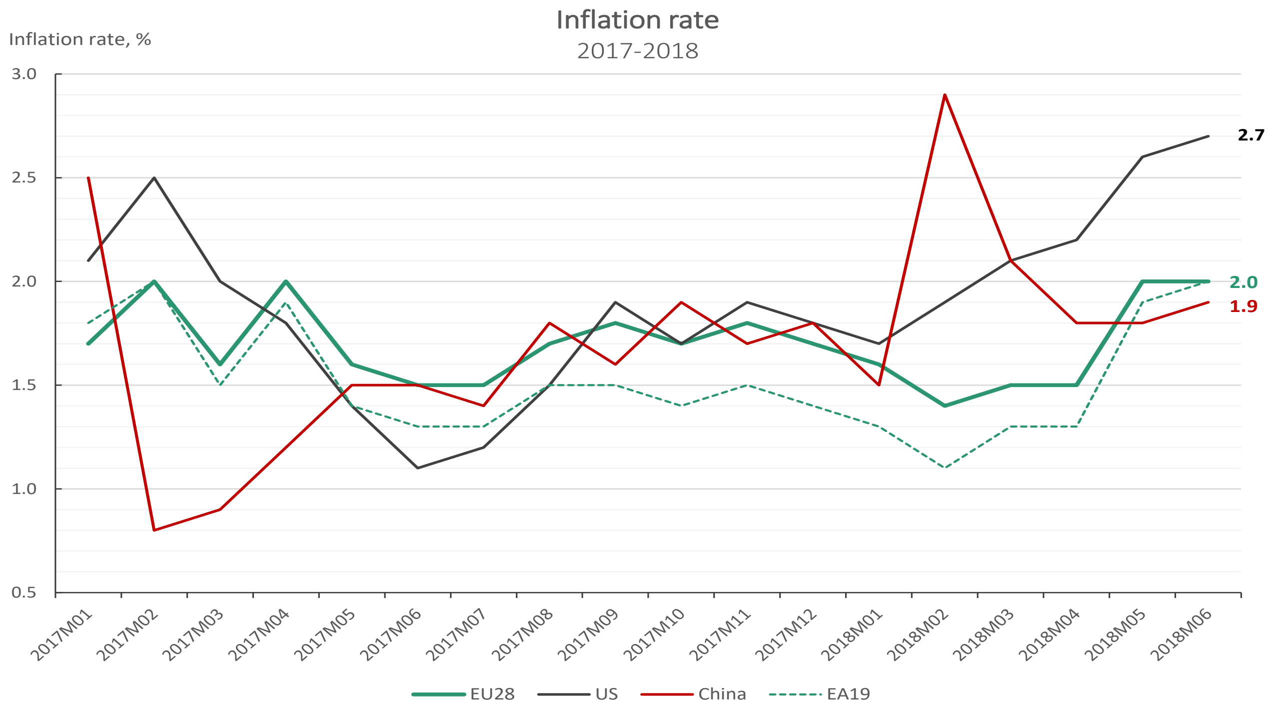
2.3 Euribor

The Governing Council of the European Central Bank (ECB) has decided to keep interest rates unchanged and prolong the accommodative policy.

- The interest rate on main refinancing operations will remain unchanged: 0.00%, 0.25% and -0.40%
- Key ECB interest rates will remain at the same level throughout the summer of 2019.
- The Asset Purchase Programme will continue at the current monthly rate of €30 billion until September, and will then be reduced to a pace of €15 billion until December. This shows a willingness to maintain favourable liquidity conditions and monetary accommodation.



2.4 Inflation



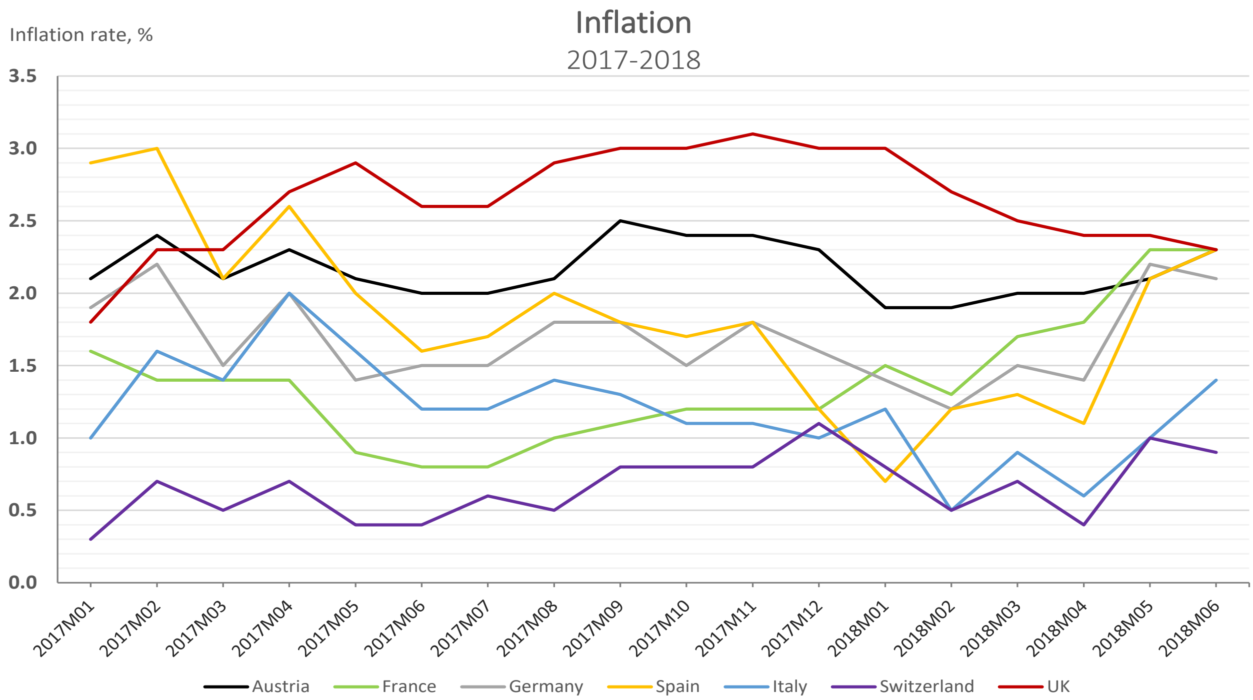
- The Euro Area's (EA's) annual inflation rate rose to 2.0% in June 2018, after 1.9% in May; reaching its highest level since February 2017. In June 2017, it was 1.3%.
- The main upward pressure on prices is coming from energy (+0.76 pp), services (+0.57pp) and food, alcohol and tobacco (+0.55pp).
- France, Spain, Germany and Italy registered the highest annual rates in the EA.

Inflation Q2 2018

	Apr-18	May-18	Jun-18
Austria	2.00	2.10	2.30
France	1.80	2.30	2.30
Germany	1.40	2.20	2.10
Spain	1.10	2.10	2.30
Italy	0.60	1.00	1.40
Switzerland	0.40	1.00	0.90
UK	2.40	2.40	2.30

More graphs on next page

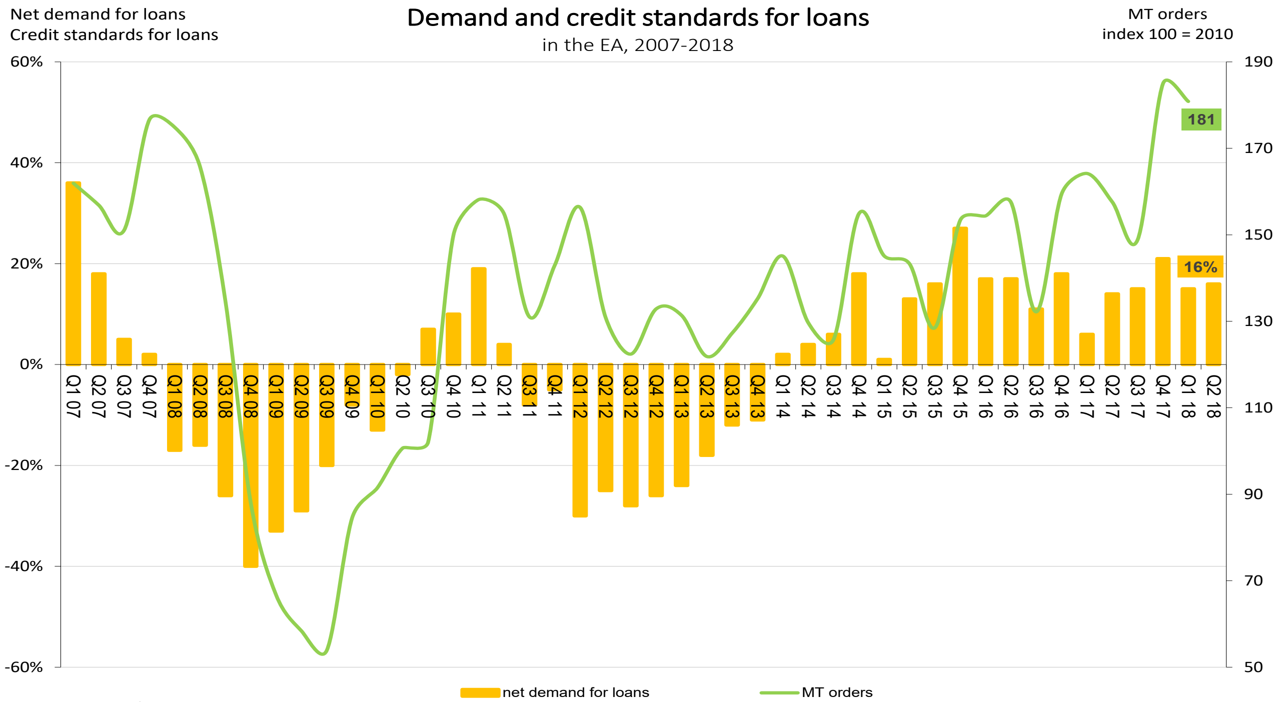
• The EU-28's annual inflation rate remained stable at 2.0% compared to May 2018, and 0.5 pp higher than in June last year.
• Highest inflation rates in the EU: Romania (4.7%), Estonia (3.9%) and Hungary (3.2%).
• Lowest inflation rates in the EU: Ireland (+0.7%), Greece (1.1%) and Denmark (1.1%).



2.5 Bank Lending Survey

In the second quarter of 2018, banks' overall terms and conditions on new loans continued to ease in all loan categories. This included:

- Credit standards for loans to enterprises eased at -3% in the second quarter, after -8% in the first quarter of 2018.
- Easing was mainly driven by interest rate levels, inventories, working capital and M&A activity.
- Credit standards for loans to enterprises eased in Spain (-10%), Italy (-10%) and Germany (-3%).

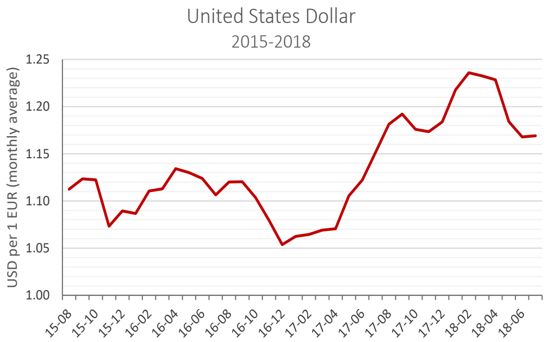


source: European Central Bank

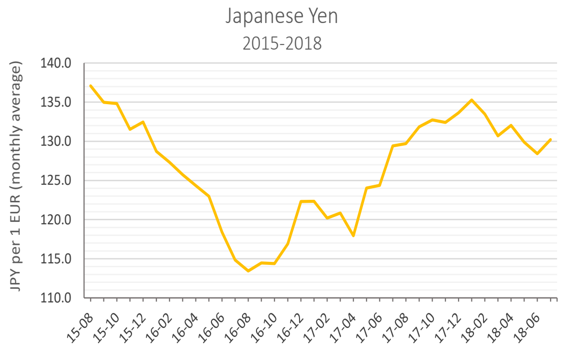
- Net demand for loans to enterprises continued to increase in the second quarter by +16%, after 15% in the previous quarter. The net percentage share of rejected loan applications slightly increased for enterprises.
- In the third quarter, banks expect the loan demand to continue increasing by 19% and a further net easing of credit standards for loans to enterprises by -3%.

2.6 Foreign Exchange Rates

The Euro picked up after the reaffirmation of the ECB's low rates through the summer of 2019. Its boost may also reflect the news of the EU's migration deal and is expected to improve further up until mid-2019. Limited German growth could put downward pressure on the common currency, but the good news is that the risks of additional tariffs on automobile exports to US are likely to be avoided after the Trump-Juncker meeting in July.

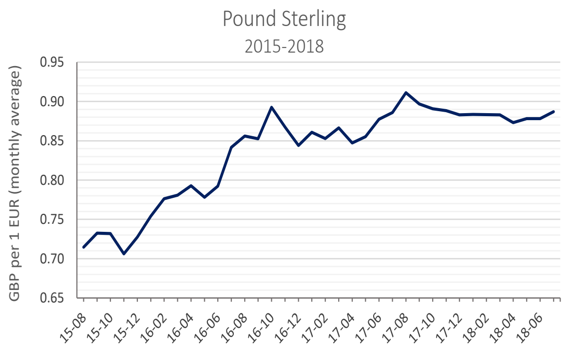


The US Dollar picks up slightly after four months of depreciation. Bloomberg specialists predict the Euro will end at 1.18$.

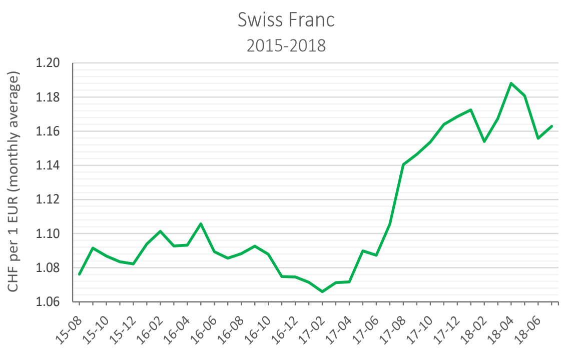


The Japanese Yen gains 1.39%, recovering from a 12-month low in June 2018 after Bank of Japan (BoJ) speculation.

The Chinese Yuan registered a 3.96% increase in July, hitting an 11-month high and reversing the trend of depreciation since the beginning of the year. The Yuan remains under pressure against the US Dollar due to trade disputes.

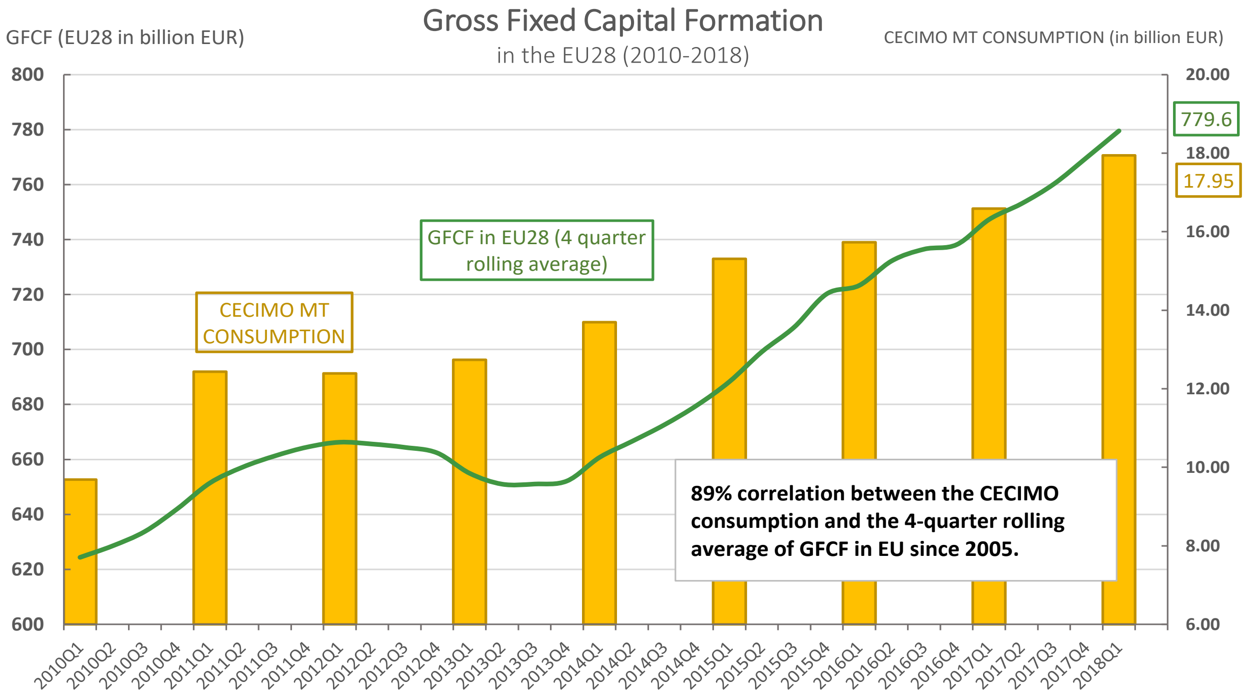


The British Pound has risen for the third month in a row, reaching its highest level in the last 8 months.



The Swiss Franc has gained by 0.61%, recovering slightly after a 2-month consecutive decrease.

2.7 Gross Fixed Capital Formation (GFCF)



- In the first quarter, there was a -8% drop in quarterly GFCF in EU28 compared to the fourth quarter of 2017, but +5% gain, compared to the first quarter 2017.
- Positive evolution for 19 consecutive quarters.
- The rolling 4 quarters GFCF average has a very high level of correlation with CECIMO consumption (89%), suggesting further increases in consumption.
- There is a high correlation between the rolling 4 quarters GFCF average and orders lagged two quarters (79%). We can expect a slowdown in orders in the 3rd quarter, but still a higher consumption level for 2018, compared to 2017.

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	2016			2017		
Country / label	At current prices (EUR million)	% of GDP	y-on-y growth rate	At current prices (EUR million)	% of GDP	y-on-y growth rate
Germany	630,034.0	20.0%	4.3%	663,063.0	20.3%	5.2%
France	488,008.0	21.9%	3.2%	515,921.0	22.5%	5.7%
United Kingdom	404,454.0	16.8%	-8.1%	400,426.6	17.2%	-1.0%
Italy	288,077.9	17.1%	3.0%	300,605.8	17.5%	4.3%
Spain	223,645.0	20.0%	4.4%	239,176.0	20.6%	6.9%
Netherlands	141,675.0	20.0%	-7.1%	151,199.0	20.5%	6.7%
Sweden	111,897.4	24.1%	5.7%	118,977.7	24.9%	6.3%
Belgium	99,114.1	23.4%	4.3%	101,769.2	23.3%	2.7%
Austria	81,533.1	23.1%	5.1%	86,916.1	23.5%	6.6%
Finland	46,844.0	21.7%	9.7%	49,578.0	22.1%	5.8%
Czech Republic	43,971.1	24.9%	-1.4%	47,334.8	24.7%	7.6%
Portugal	28,292.7	15.3%	1.6%	31,217.7	16.2%	10.3%

GFCF is net investment. it shows how much of the new value added is invested rather than consumed. In a time of crisis, countries cannot afford investment and focus on current consumption. The more that is spent on capital goods, the less is spent on consumption of consumer goods.

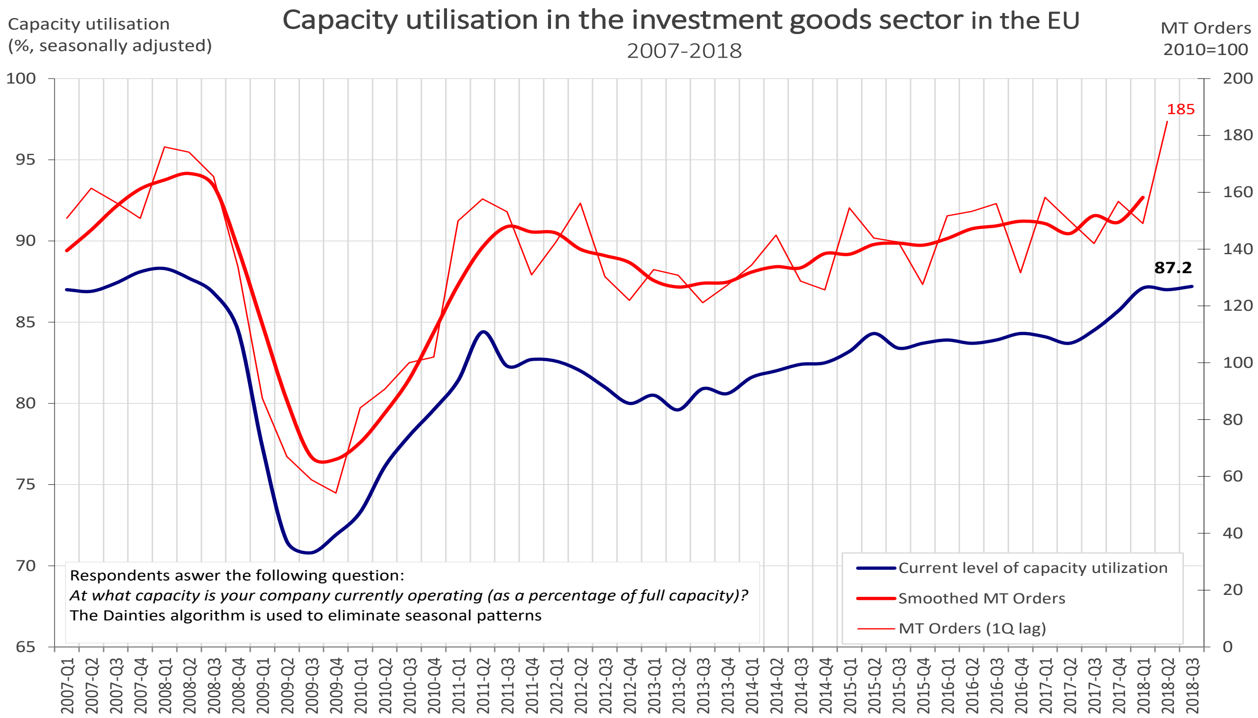
It also includes land improvements, plant, machinery and equipment purchases, as well as the construction of roads, railways, private and commercial buildings. Financial assets, stock of inventories and operating costs are excluded.

Recessions are marked by sharp falls in GFCF. If production falls, manufacturers expect lower profits and plan on reducing production – which makes investment cyclical. Conversely, countries with steeper economic growth rates invest more fixed assets.

All in all, a rise in investment should result in higher demand and an increase in productive capacity. And the more effective the investment, the higher economic growth.
To illustrate this point: China spends 41.9% of GDP on GFCF, while Italy and Germany 17.5% and 20.3%.

2.8 Capacity Utilisation in the Investment Goods Sector

In the third quarter of 2018, the current level of capacity utilisation in the EU remained rather stable at 87.2%. The level of capacity utilisation oscillated very little from the 2018 average of 87.1%.



There is a 96% correlation between the current level of capacity utilisation and the CECIMO8 machine tool orders index since 2008. This means that capacity utilisation tends to grow as machine tool orders increase. The more machines that are ordered, the higher the utilisation of factories.

Of the respondents, 2.3% more assessed their production capacity as 'more than sufficient' than 'insufficient'. This could suggest only a moderate increase in order levels, in line with the steady evolution of capacity utilisation over 2018.

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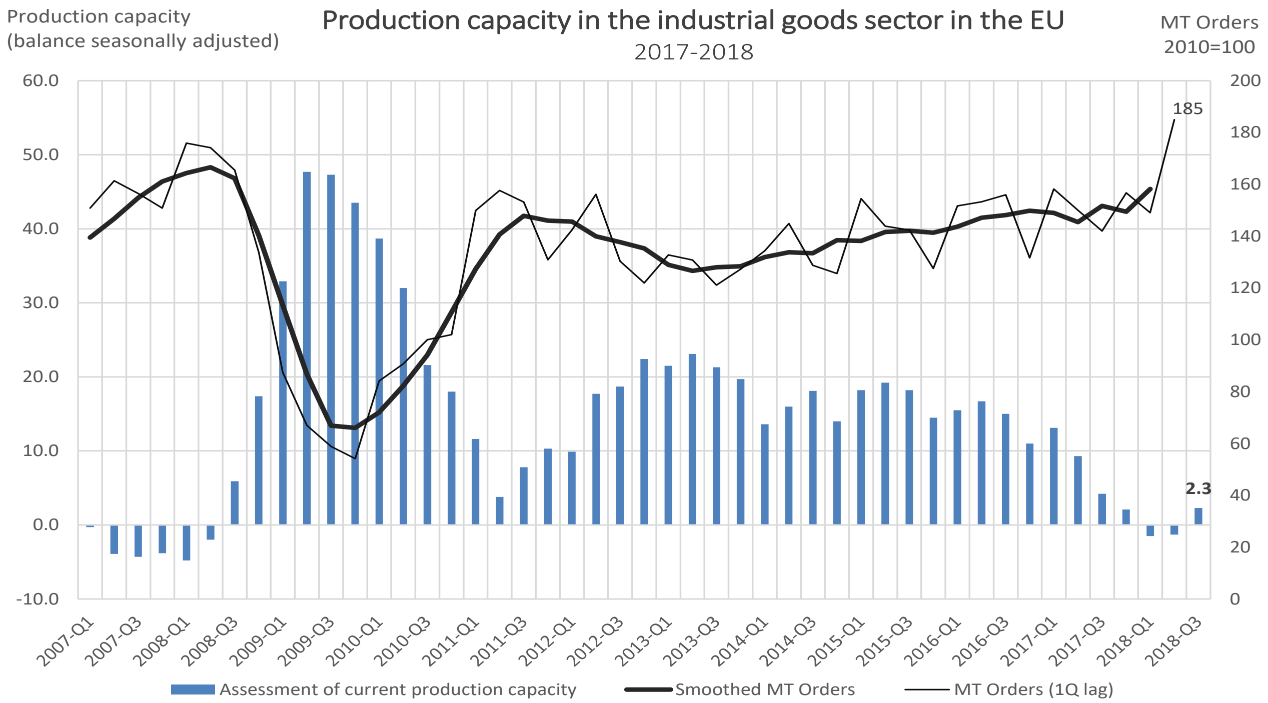


The correlation between the assessment of current production capacity and smoothed machine tool orders since 2008 is highly negative (-90%). The indicators have an inverse relationship: the more machine tools industrialists order, the more sufficient their current production capacity is. And conversely, the more sufficient the production capacity of the respondents is, the fewer the machine tools ordered.

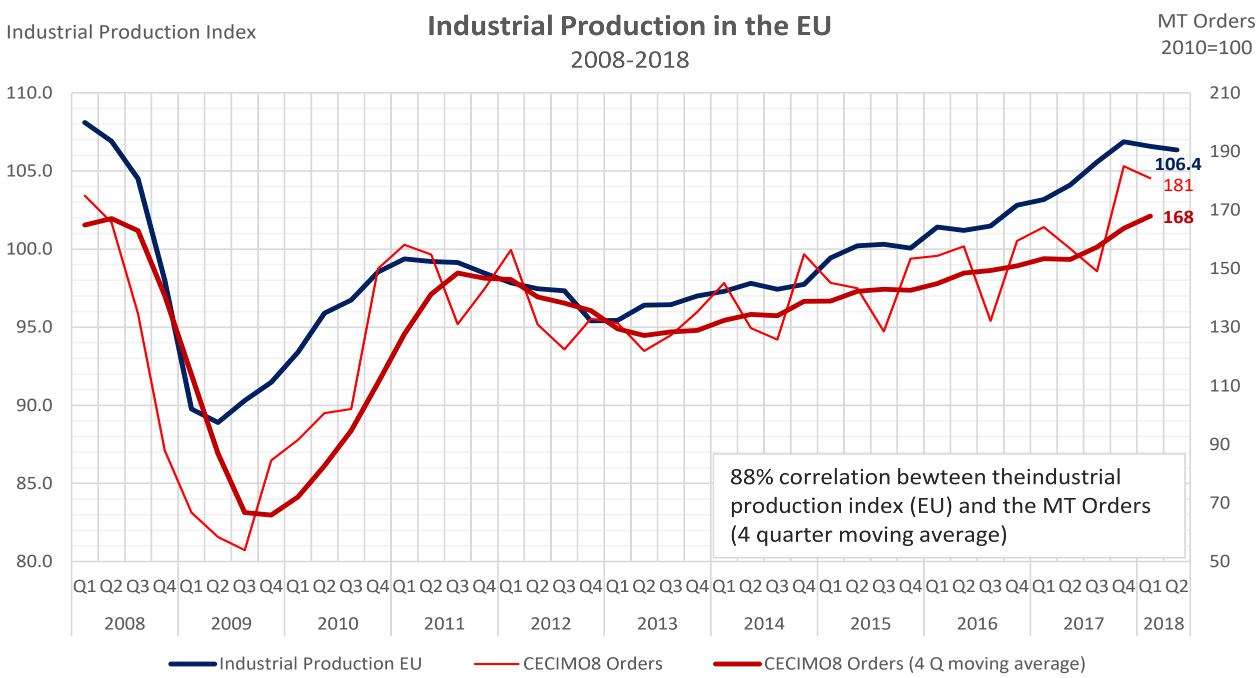
	Q2 2018	Q3 2018
Austria	-3.6	-2.6
Czech Republic	12.8	14.9
France	-11.3	-10.5
Germany	-5.6	0.1
Italy	18.5	17.2
Spain	7.8	6.4
United Kingdom	2.8	10

2.9 Capacity Utilisation in the Investment Goods Sector

Both the EU and EA registered a 2.4% increase in total industrial production in May 2018, compared to the same month last year.

EU 28	March 2018/ March 2017	April 2018/ April 2017	May 2018/ May 2017
Total industrial production	**3.00%**	**1.70%**	**2.40%**
Capital goods	3.50%	4.70%	3.70%
Durable consumer goods	2.60%	1.30%	1.40%
Intermediate goods	1.40%	0.80%	2.20%
Energy	7.90%	0.00%	-0.80%
Non-durable consumer goods	1.20%	0.40%	2.00%

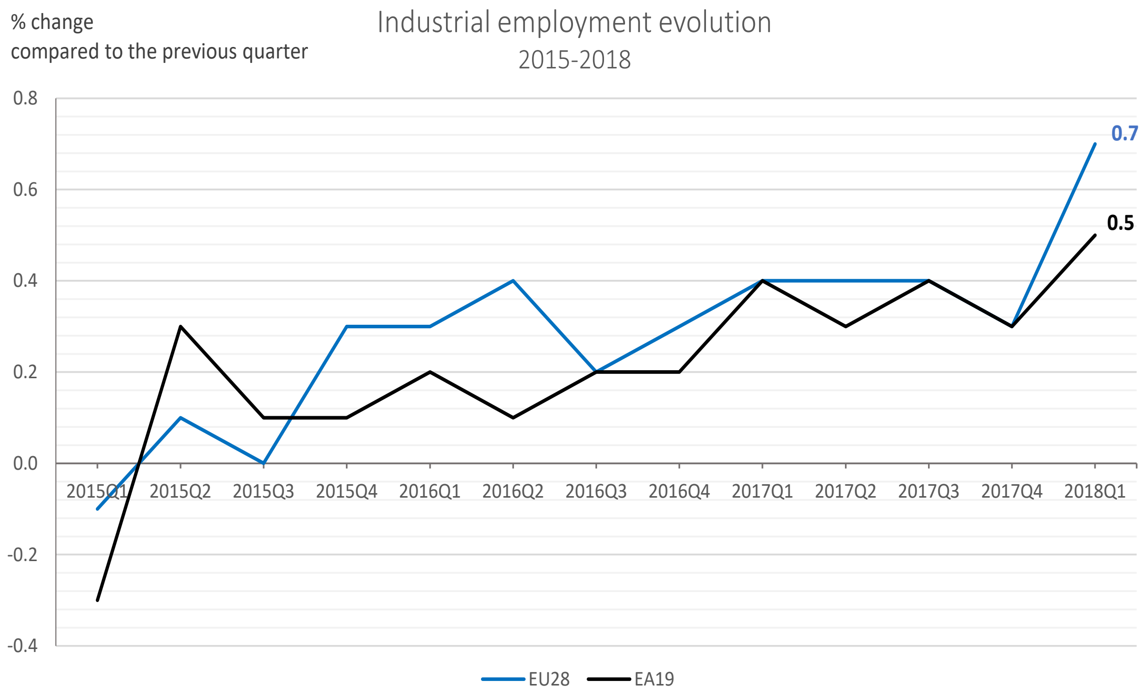
- In May 2018, the highest annual increases in industrial production were registered in Poland (+7.8%).
- **Improvements in industrial production:** Sweden 3.8%, Finland +3.5%, Germany +3.0%, Italy +2.1%, Spain +1.9%, Netherlands 1.7%, Czech Republic +1.4% and the UK +0.9%.
- **Drops in national industrial production:** Denmark -3.3%, Portugal -2.6%, Norway -1.5% and France -0.6%.

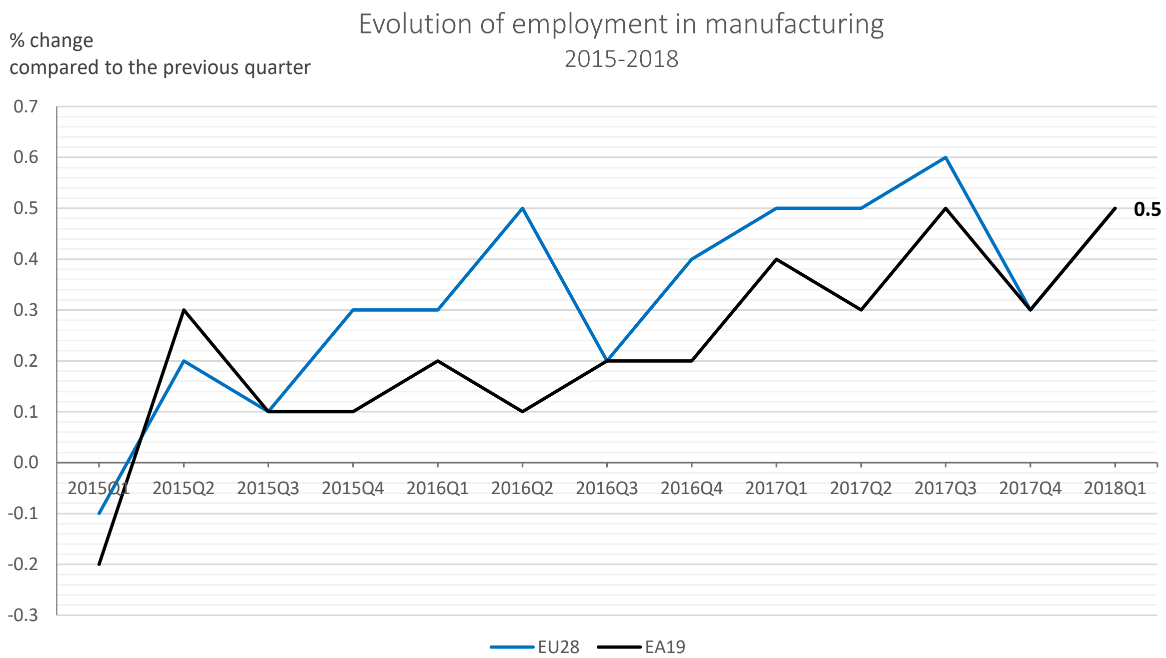


Source: Eurostat + CECIMO

2.10 Industrial Employment

Industrial emplyoment increased both in the EU and EA in the first quarter of 2018.
• EU-28 industrial employment saw a 0.7% increase compared to the previous quarter (seasonally adjusted data), and a 1.7% increase compared to Q1 2018 (unadjusted data).
• In Eurozone, we noted a 0.5% increase compared to Q4 2018 and 1.5% compared to the same period in the previous year.
• Currently, in the EU, about 36.29 million people are employed in the industrial sector and 32.75 million people in manufacturing.





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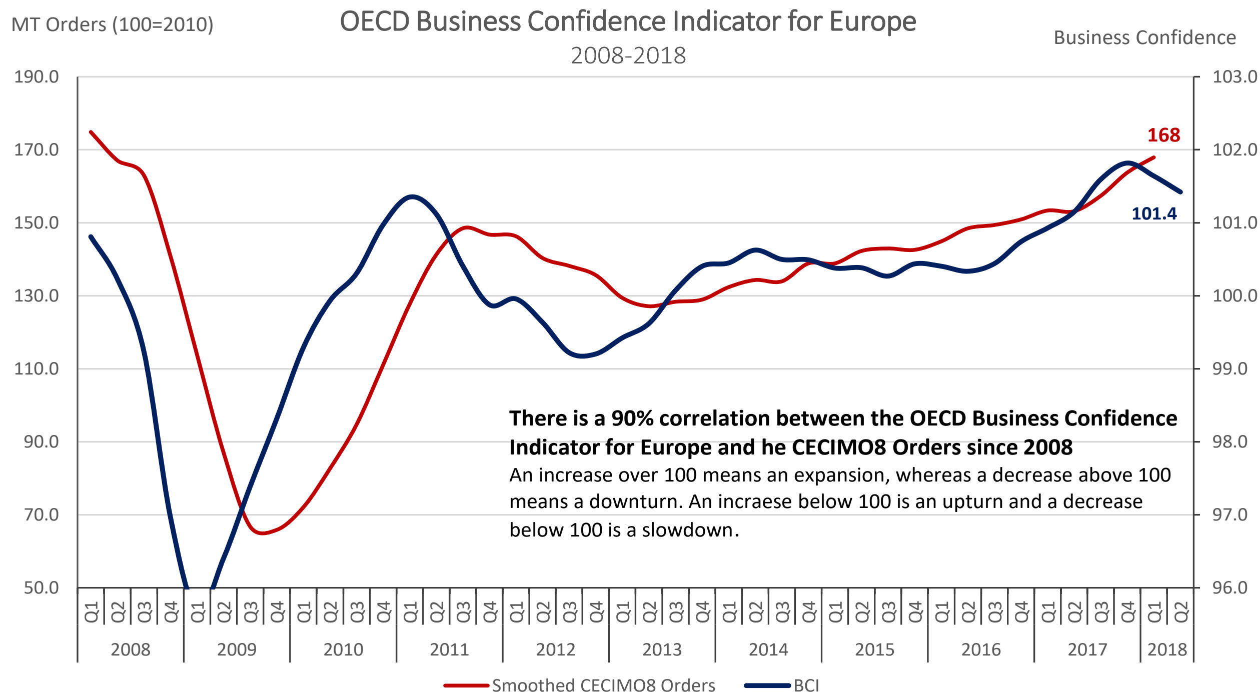
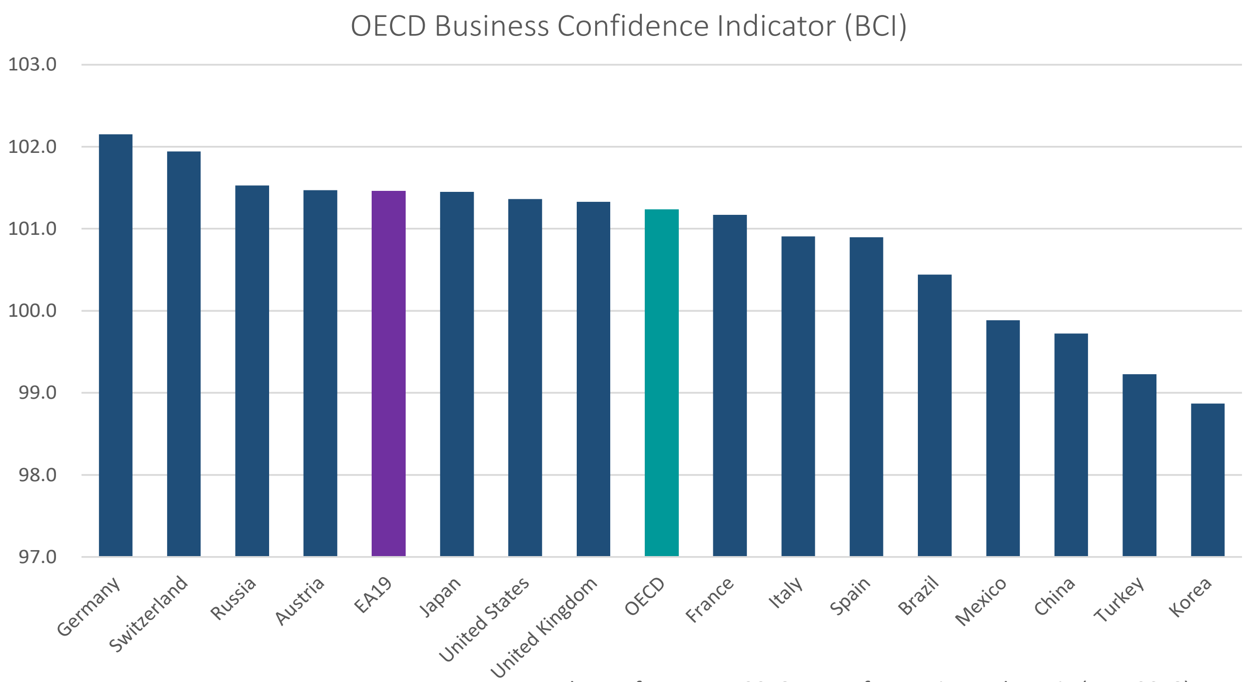
2.11 OECD Business Confidence Indicator for Europe

The OECD Business Confidence Indicator (BCI) for Europe is an efficient forecasting tool for MT Orders, as they usually follow the BCI with a 6-month delay.

- In June, BCI in Europe remained unchanged compared to May, at 101.4 points.
- The average for the second quarter of 2018 lost 0.2 points compared to the first quarter, at the lowest level in the last 12 months.
- We might expect a slowdown in MT orders by the end of 2018.
- The largest drop in BCI in June among CECIMO members was seen in Turkey (-0.58 points).
- The steepest increase in BCI was registered in Finland (+0.20 points), followed by UK (+0.12 points).





Values refer to June 2018, exept for Mexico and Russia (May 2018)

Glossary ⓘ

1.1 CECIMO8 orders

This section presents the “new orders received index” showing the development of the machine tool demand as an indication of future production. An order is defined as the value of the contract linking a producer and a third party in respect of the provision by the producer of goods and services.
The CECIMO8 orders index combines the relevant indexes of Austria, the Czech Republic, France, Germany, Italy, Spain, Switzerland and the United Kingdom. The weights of the different indexes correspond to the countries shares in total production of the eight countries in 2010. The new orders received are split according to the origin of the order, based on the change of ownership. This identification is the basis for domestic and foreign new orders. The origin is determined by the residency of the third party that has made the order.

2.1 Purchasing Managers' Index (PMI)

The Global Report on Manufacturing is compiled by IHS Markit and J.P. Morgan in association with ISM and IFPSM based on the results of surveys covering 9.000 purchasing executives in 30 countries. Together these countries account for an estimated 86% of global manufacturing output. Questions are asked about real events and are not opinion based. Data are presented in the form of diffusion indices, where an index reading above 50,0 indicates an increase in the variable since the previous month, below 50,0 a decrease and equal to 50.0 means no change on prior month. All the indices are seasonally adjusted at the national sector level.
http://www.markiteconomics.com/Survey/Page.mvc/AboutPMIData

2.3 Interest Rates - Euribor

Euribor® (EURo InterBank Offered Rate) is the rate at which euro interbank term deposits are being offered by one prime bank to another within the EMU zone. Monthly data are calculated as averages of daily values from the banks with the highest volume of business in the euro area money markets.
http://www.euribor-ebf.eu/
The deposit facility rate is the one the banks receive for depositing money with the central bank overnight.
The so-called main refinancing rate, minimum bid rate or rate for the main refinancing operations (MROs) is the interest rate which banks do have to pay when they borrow money from the ECB for a period of one week.

2.5 Bank Lending Survey

The bank lending survey is addressed to senior loan officers of a representative sample of euro area banks. Its main purpose is to enhance the understanding of bank lending behaviour in the euro area. The questions distinguish between three categories of loan: loans or credit lines to enterprises; loans to households for house purchase; and consumer credit and other lending to households. For all three categories, questions are posed on credit standards for approving loans; credit terms and conditions; and credit demand and the factors affecting it.
The responses to questions related to credit standards are analysed in this report by focusing on the difference (“net percentage”) between the share of banks reporting that credit standards have been tightened and the share of banks reporting that they have been eased. A positive net percentage indicates that a larger proportion of banks have tightened credit standards (“net tightening”), whereas a negative net percentage indicates that a larger proportion of banks have eased credit standards (“net easing”). Likewise, the term “net demand” refers to the difference between the share of banks reporting an increase in loan demand and the share of banks reporting a decline. Net demand will therefore be positive

if a larger proportion of banks have reported an increase in loan demand, whereas negative net demand indicates that a larger proportion of banks have reported a decline in loan demand.
http://www.ecb.eu/stats/money/surveys/lend/html/index.en.html

2.7 Gross Fixed Capital Formation

The Gross Fixed Capital Formation (GFCF) consists of resident producers´ aquisitions, less disposals, of fixed tangible or intangible assets. This covers in particular machinery and equipment, vehicles, dwellings and other buildings. The GFCF is a key determinant of both aggregate demand and supply.
Source: Eurostat and ECB.

2.8 Capacity Utilisation in the Investment Goods Sector

Population: Investment goods producers. Data covered: Assessment of current production capacity, measured as a balance (seasonally adjusted); Current level of capacity utilization, measured in % (seasonally adjusted). More than 38.000 industrial firms are surveyed every month, while the biannual investment survey includes over 44.000 units. Answers obtained from the surveys are aggregated in the form of "balances". Balances are constructed as the difference between the percentages of respondents giving positive and negative replies. The Commission calculates EU and euro-area aggregates on the basis of the national results and seasonally adjusts the balance series.
http://ec.europa.eu/economy_finance/db_indicators/surveys/documents/userguide_en.pdf

2.9 Industrial Production Index

The objective of the production index is to measure changes in the volume of output at close and regular intervals, normally monthly. It provides a measure of the volume trend in value added over a given reference period. The production index is a theoretical measure that must be approximated by practical measures. Value added at basic prices can be calculated from turnover (excluding VAT and other similar deductible taxes directly linked to turnover), plus capitalised production, plus other operating income plus or minus the changes in stocks, minus the purchases of goods and services, minus taxes on products which are linked to turnover but not deductible plus any subsidies on products received.
Industrial production is compiled as a fixed base year Laspeyres type volume-index.
Base period: Year 2010 = 100.
Source: Eurostat.

2.11 OECD Business Confidence Indicator (BCI) for Europe

The Composite leading indicators (CLI), which BCI is part of, comprises a set of component series selected from a wide range of key short-term economic indicators to ensure that the indicators will still be suitable when changes in economic structures occur in future. CLIs are calculated for 33 OECD countries (Iceland is not included) and several regional aggregates, based on enterprises' assessment of production, orders and stocks, together with its current position and expectations for the near future.
These indexes are designed to anticipate turning points in economic activity relative to trend, on average 6 to 9 months before they happen. While theory says that a turning point in the CLI signals a turning point in the reference series, such turning points, in reality, are determined by a complicated process. Turning points in the detrended reference series are usually found about 4 to 8 months in advance. Therefore, one often needs to wait for several periods to draw a more definite conclusion. A useful way to exploit the information in CLIs is to take their year-on-year growth rate.
Typical indictors in the CLI include orders and inventories changes, financial

market indicators, business confidence surveys and data on key sectors and trend in the main trade partners.
The standardised BCIs represent only the manufacturing sector. It is based on companies' assessment of production, orders, stocks and its current position and expectations. BCI shows a long-term trend in industrial production (with a 6-month time-lag). An increase over 100 means expansion; a decrease above 100 means a downturn; an increase below 100 is an upturn and a decrease below 100 is a slowdown.
http://stats.oecd.org/mei/default.asp?lang=e&subject=5

Geographical information

CECIMO countries

The European Association of the Machine Tool Industries (CECIMO) bring together 15 national associations of machine tool builders from the following countries: Austria, Belgium, Czech Republic, Denmark, Finland, France, Germany, Italy, the Netherlands, Portugal, Spain, Sweden, Switzerland, Turkey and the United Kingdom.

Euro area (EA)

The euro area (EA19), also called Eurozone, consists of those Member States of the European Union that have adopted the euro as their currency. It includes Belgium, Germany, Estonia, Ireland, Greece, Spain, France, Italy, Cyprus, Latvia, Lithuania, Luxembourg, Malta, the Netherlands, Austria, Portugal, Slovenia, Slovakia and Finland.

European Union (EU)

The European Union (EU28) includes Belgium, Bulgaria, the Czech Republic, Denmark, Germany, Estonia, Ireland, Greece, Spain, France, Croatia, Italy, Cyprus, Latvia, Lithuania, Luxembourg, Hungary, Malta, the Netherlands, Austria, Poland, Portugal, Romania, Slovenia, Slovakia, Finland, Sweden and the United Kingdom. EU15 refers to the 15 countries forming the European Union before the enlargements of 2004, 2007 and 2013.

Other symbols and acronyms

GDP
Gross Domestic Product

Billion
Billion means one thousand million

US
United States

Q1, Q2, Q3, Q4
1st quarter, 2nd quarter, 3rd quarter, 4th quarter

EUR / €
Euros

USD / $
United States Dollar(s)

CHF
Swiss Franc(s)

ECB
European Central Bank

Fed
Federal Reserve (System), the US Central Bank

GBP
Great Britan Pound(s), the pound sterling

IMF
International Monetary Fund

WB
World Bank

MT
Machine tools

CECIMO countries
Countries whose machine tool sector is represented by CECIMO

CREDITS

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Member Associations

Austria: FMTI
Fachverband Metalltechnische Industrie
www.fmti.at

Belgium: AGORIA
Federatie van de Technologische Industrie
www.agoria.be

Czech Republic: SST
Svazu Strojírenské Technologie
www.sst.cz

Denmark: The Manufacturing Industry
a part of the Confederation of Danish Industry
ffi.di.dk

Finland: Technology Industries of Finland
www.teknologiateollisuus.fi

France: SYMOP
Syndicat des Entreprises de Technologies de Production
www.symop.com/fr

Germany: VDW
Verein Deutscher Werkzeugmaschinenfabriken e.V.
www.vdw.de

Italy: UCIMU
Associazione dei costruttori Italiani di macchine utensili robot e automazione
www.ucimu.it

Netherlands: FPT-VIMAG
Federatie Productie Technologie / Sectie VIMAG
www.ftp-vimag.nl

Portugal: AIMMAP
Associacâo dos Industriais Metalúrgicos, Metalomecânicos e Afins de Portugal
www.aimmap.pt

Spain: AFM - Advanced Manufacturing Technologies
Asociación española de fabricantes de máquinas-herramienta, accesorios, componentes y herramientas
www.afm.es

Sweden: MTAS
Machine and Tool Association of Sweden
www.mtas.se

Switzerland: SWISSMEM
Die Schweizer Maschinen-, Elektro- und Metall-Industrie
www.swissmem.ch

Turkey: MIB
Makina Imalatcilari Birligi
www.mib.org.tr

United Kingdom: MTA
The Manufacturing Technologies Association
www.mta.org.uk

cecimo is the European Association representing the common interests of the Machine Tool Industries globally and at EU level. We bring together 15 National Associations of machine tool builders, which represent approximately 1300 industrial enterprises in Europe (EU + EFTA + Turkey), over 80% of which are SMEs. CECIMO covers 98% of total Machine Tool production in Europe and about 36% worldwide. It accounts for almost 150,000 employees and a turnover of nearly €24 billion in 2016. Approximately 75% of CECIMO production is shipped abroad, whereas around half of it is exported outside Europe. CECIMO assumes a key role in determining the strategic direction of the European machine tool industry and promotes the development of the sector in the fields of economy, technology and science.