

The difficulties of the global manufacturing sector

- The global manufacturing sector has entered a phase of activity contraction. The phenomenon is widespread among advanced and emerging economies, although the latter bloc is faring somewhat better, and it is particularly intense in the euro area.
- Behind this contraction phase lie trade tensions, the maturity of the macroeconomic cycle and disruptions in the automotive sector.

Over the course of the year, the range of indicators pointing towards a contraction in manufacturing production has gradually expanded, especially in key economies such as Germany. Although declines in manufacturing activity are not unusual (we need go no further than 2016, when one occurred in the US), its coincidence in time with an environment of heightened uncertainty has raised doubts about the prospects for growth over the coming quarters, especially in the face of the fear that it could spread to other sectors, such as services.

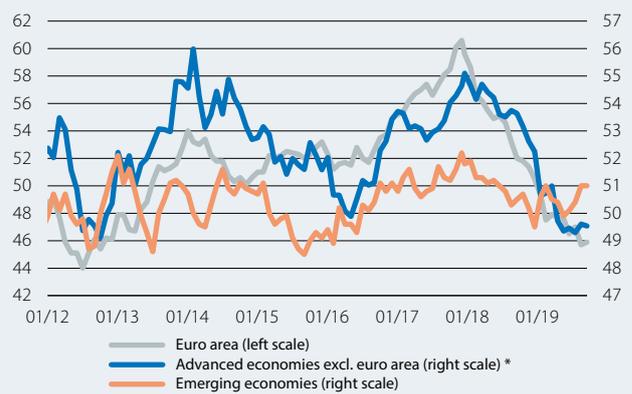
What is going on?

As shown in the first chart, the production of manufacturing firms began an expansive phase between late 2015 and mid-2016, and reached its peak towards the end of 2017. Since then, the sector's growth has seen a widespread moderation and its production has even contracted.

In the current downturn in the manufacturing cycle, various elements stand out, which we show in the first two charts:

- The moderation of activity is widespread among advanced and emerging economies, although this second bloc is faring somewhat better and its manufacturing sector is showing a slight recovery in recent months.
- In particular, in August 2019, of the 24 countries for which data are available, the manufacturing PMI (a sentiment indicator that has a close correlation with economic activity growth), 21 were below the 50-point threshold, which indicates a contraction in output. Among them were the five main manufacturing economies, which represent approximately 60% of global industrial production: China, the US, Japan, Germany and South Korea.
- The weakness is reflected not only in the sentiment indicators, but the manufacturing production volumes themselves have slowed down in a widespread manner and are contracting in the major industrial economies.
- The downturn has been particularly intense in the euro area, especially in Germany.
- At the global level, for the time being at least, the drop is not larger or smaller than in other downturns in the manufacturing cycle: for instance, both the lows reached in the manufacturing PMI and the total decline in this index from its peak at the end of 2017 are similar to those

Economic activity indicator: manufacturing PMI Index



Note: * Own estimates based on the euro area's GDP share of the IMF's «Advanced economies» aggregate.
Source: CaixaBank Research, based on data from Markit.

Countries with a manufacturing PMI below 50 (%)



Source: CaixaBank Research, based on data from Markit and Bloomberg.

observed in previous downturns (such as in 2012 and 2015) and are a far cry from what was experienced in 2008-2009.

On the other hand, compared to the weakness exhibited by the production of the sector, other macroeconomic elements such as investment have also suffered, but continue to grow at a steady pace. As an example, in the US, non-residential fixed investment has maintained an average quarter-on-quarter growth of 0.8% since 2018 (1.3% on average in 2017). In Europe, meanwhile, the quarter-on-quarter growth of gross fixed capital formation in France remains at around 1% on average so far this year (1.4% on average in 2017), while in Germany there has been a more notable slowdown

(0.4%, compared to 1.0%). In addition, although the growth of investment does not reveal buoyant figures (the aforementioned figures for the US contrast with an average quarter-on-quarter growth for 2003-2007 that was only slightly below 2%, the reduced buoyancy has been the rule rather than the exception since the Great Recession.

Finally, as shown in the third chart, the weakness of manufacturing production has also weighed down on employment in the sector. Nevertheless, job creation has resisted and, in the last few quarters, has even gained some momentum in economies such as the US, the United Kingdom and Germany. This is a positive sign, although the dynamics of the labour market typically exhibit a certain delay with respect to production.

What is behind the weakness of manufacturing?

The downturn of the manufacturing sector coincides with three major phenomena that appear to be responsible for its weakness: trade tensions, the maturity of the macroeconomic cycle and disruptions in the automotive sector.¹

First of all, since the beginning of 2018, the US and China have been embroiled in a trade conflict that has escalated with the imposition of tariffs and the threat of greater restrictions on international investment flows. This has resulted in a surge in uncertainty (see fourth chart) and has damaged international trade,² two forces which, given the importance of exports for the industrial sector, would help to explain the weakness in manufacturing production.

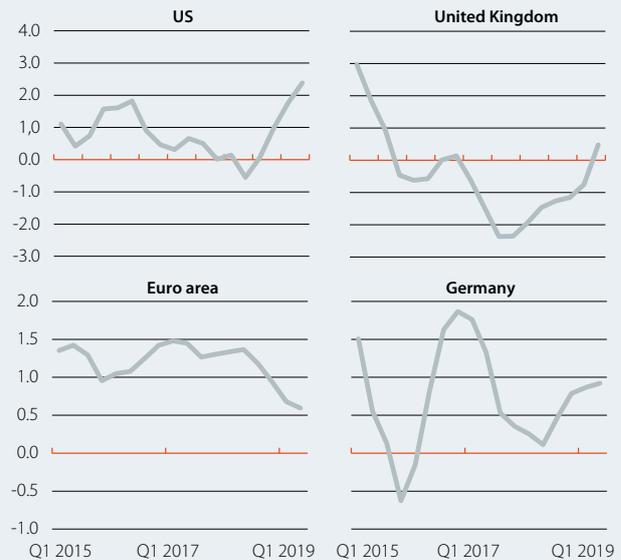
On the other hand, industry not only finds itself faced with a moderation in activity caused by trade tensions and uncertainty. In fact, trade disputes aside, following years of expansion, the major economies have reached a more mature point in the cycle, with fewer elements of cyclical momentum (for instance, the US is currently in the longest expansion in its history since 1850, while its unemployment rate, at around 3.5%, is at its lowest in the past 50 years). Therefore, more moderate growth in demand was to be expected.

Finally, a part of the weakness of industry is due to the idiosyncratic difficulties in the automotive sector, which has been hampered by regulatory changes and the great environmental challenge.³ Indeed, while automotive production has contracted by 15% since the end of 2017, the rest of industrial activity has experienced a more gradual slowdown (although it is also contracting). In any case, the loss of momentum in manufacturing activity is widespread across the different sectors. In particular, since their cyclical peak in late 2017 or early 2018

1. Another possible explanation is the inventory cycle. In the past, in an industry that was more dominated by factories, this was an important driver of industrial cycles: an overestimation of demand led to an accumulation of stocks which, in turn, led to a reduction in production (until the accumulated excess stocks had been depleted).
 2. According to data from the CPB World Trade Monitor, global trade in goods has gone from growing by around 5% per annum in 2017 to contracting by around 1% in Q3 2019 (data in volumes).
 3. We analyse the difficulties and challenges of the sector in the article «The car, a key sector facing an uncertain future» in the MR06/2019.

Employment in the manufacturing sector

Year-on-year change (% , four-quarter moving average)



Source: CaixaBank Research, based on data from the OECD.

Global trade uncertainty

Index



Source: CaixaBank Research, based on data from H. Ahir, N. Bloom and D. Furceri (2018). «World Uncertainty Index». Stanford mimeo.

(depending on the sector), the four main macro-sectors of the sentiment indices developed by IHS Markit (automotive, machinery and equipment, technology and chemicals) have all registered a substantial slowdown, while the indicators of the first three are, in fact, at levels that indicate a contraction of activity.

In conclusion, the current manufacturing cycle is, for the time being, similar to previous episodes, but its future path will depend on whether the shocks experienced are exacerbated or prolonged. In this regard, the more constructive tone in the negotiations between the US and China should help to reduce uncertainty, although the maturity of the global economic expansion and the persistence of the difficulties in the automotive sector are likely to hinder a stronger rebound in industrial production.

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