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Research Briefing | UK

'No-deal' Brexit to harm manufacturing more than GDP

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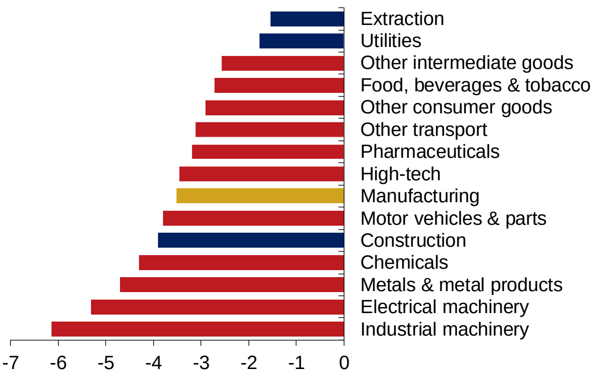
- **A 'no-deal' Brexit would harm UK manufacturing more than the overall economy. Hardest hit would be those sectors whose output is closely tied to investment spending, such as machinery manufacturers – beyond even the impact on those which rely heavily on trade with the rest of the EU, such as chemicals and automotive companies. We expect the level of manufacturing output to be 3.5% lower than our baseline forecast at the end of 2020 in a 'no-deal' scenario. So, while the overall economy may avoid an outright recession, a 'no-deal' Brexit would cause the manufacturing sector to shrink by 1.1% in 2019 and a further 0.4% in 2020.**

- Manufacturing accounts for just under 10% of UK GDP, but around half of total exports. Twenty percent of UK manufacturing output is sold to the rest of the EU, and eighteen percent of manufacturing processes use inputs imported from the rest of the EU. These ties are particularly close for the chemicals and automotive sectors, whose output we estimate would fall by 4.3% and 3.8%, respectively, relative to baseline by the end of 2020 in a 'no-deal' Brexit.

- But sectors producing investment goods would be hit even more severely in a 'no-deal' Brexit, as business investment is undermined by increased uncertainty, weakening demand and as companies look to relocate some of their production to the continent. Indeed, we expect business investment to fall by 6.7% relative to baseline over the first two years in a 'no-deal' scenario. Consequently, output of both the industrial machinery and electrical machinery sectors would fall by over 5% relative to baseline by the end of 2020. But even the more domestically oriented construction sector would suffer output falls of 3.9% relative to baseline in a 'no-deal' scenario.

Our modelling suggests that a 'no-deal' Brexit would reduce the level of UK manufacturing output by 3.5% compared with our baseline forecast at end-2020

UK industry: impact of 'no-deal' Brexit



% difference in level of output in Q4 2020 relative to baseline

Note: red bars are manufacturing sub-sectors

Source : Oxford Economics

A 'no-deal' Brexit would result in the level of UK manufacturing output falling 3.5% below our baseline forecast at the end of 2020. Investment-oriented and trade-intensive sectors would experience significant disruption, as trade slows and business investment weakens.

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We think a 'no-deal' Brexit is unlikely, but not impossible

UK manufacturing firms are understandably concerned about the impact of a 'no-deal' Brexit. A recent survey commissioned by UK manufacturing trade body EEF found that more than 80% of the country's manufacturers are not prepared for a 'no-deal' Brexit. Although we think it is unlikely that the UK will leave the EU in a disorderly fashion in March 2019 – we currently put the odds at 15% – it is not impossible. In this *Research Briefing,* we look at the potential implications of a 'no-deal' Brexit for UK manufacturing sectors, extending our recent analysis of the macroeconomic impact. We find that in the event of 'no deal', UK manufacturing output would contract in 2019 and 2020. Sectors that produce capital goods, or that trade intensively with the EU, would experience the sharpest hit, whereas consumer-focused sectors would be less severely impacted.

A 'no-deal' Brexit would introduce substantial trade frictions

'No deal' would lead to substantial trade frictions with the EU as tariffs and NTBs are erected

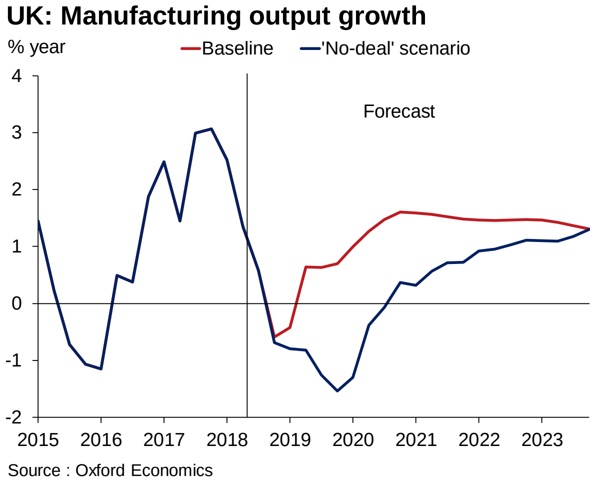
Our November 2017 note looked in detail at the potential impact of a 'no-deal' Brexit in terms of additional trade frictions. These frictions would arise partly because of tariffs being introduced on UK trade with the EU and other countries, such as South Africa and South Korea, with whom the EU has free trade agreements (FTAs). But substantial non-tariff barriers (NTBs) would also be erected. Our 'no-deal' scenario assumes that tariffs are imposed on UK-EU trade at the level of the current EU Common Customs Tariff and that many manufacturing sectors, such as chemicals as well as food and beverages, face NTBs from regulatory barriers and the introduction of customs controls. We also assume that in the short term the UK will neither be able to roll over the more significant trade agreements that it currently has through its EU membership, nor strike any major new trade deals with other countries over the next several years.

UK manufacturing would see output contract in 2019-2020

Failure to reach a deal would bring about significant disruption to UK manufacturing

A 'no-deal' outcome would bring about significant disruption to UK manufacturing, with output falling over 2019-2020. Investment-oriented sectors, such as machinery, and those with strong trade links with the rest of the EU, such as chemicals and automotive, would be among the worst hit. As a result, manufacturing industry would be hit more severely than the overall UK economy. Our scenario shows the level of manufacturing output would fall 3.5% below our baseline forecast by the end of 2020. This compares with the 2.1% hit to GDP expected over the same period.

Chart 1: A 'no-deal' scenario would see manufacturing output contract in 2019 and 2020



In a 'no-deal' scenario, we would expect to see initial contractions in business investment and goods exports. Manufacturing activity is highly sensitive to these two components of GDP, which, combined with the slowdown in consumer spending, would lead to a contraction in manufacturing output. Overall, the level of manufacturing output would be 3.5% below our baseline forecast by end-2020 and 4.6% lower by end-2023.

Around 46% of UK goods exports go to EU countries, while another 14% go to countries with whom the EU has FTAs. The imposition of tariffs and introduction of NTBs would weigh significantly on exports, though a sharp depreciation of sterling would mitigate some of the damage to exports. Manufacturing firms would also likely respond to the heightened

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uncertainty and lower demand by postponing, and in some cases cancelling, investment decisions. Investment in industries such as metal products and automotive could also be damaged by higher costs of capital equipment such as machinery, as prices of manufactured goods imported from the rest of the EU rise.

Output in investment-oriented sectors would be severely impacted

Hardest hit would be sectors whose output is closely tied to investment spending, such as machinery

Manufacturing sectors that produce investment goods, namely industrial and electrical machinery, as well as the upstream metal products sector that supplies them with components, would be hit the hardest in the short term. Output in the machinery sector is driven by capital spending, which under a 'no-deal' Brexit is the most severely hit component of GDP, as firms respond to the uncertainty, disruption to their business models and weaker activity by delaying investment spending. In particular, supply-chain linkages from weak investment in capital-intensive industries, such as automotive and construction, would lead to a significant loss in output in the machinery sector.

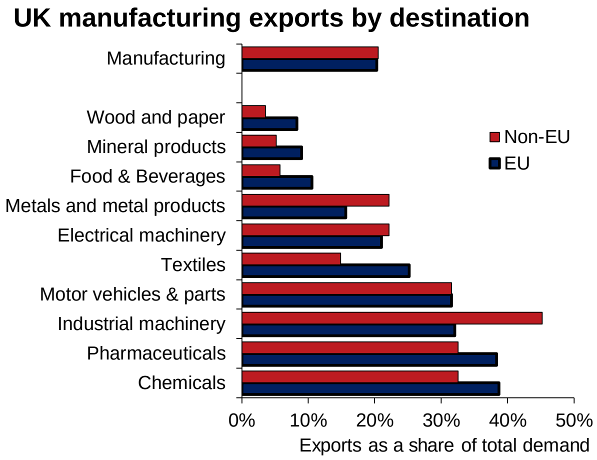
Sectors integrated into EU supply chains would be vulnerable

Export sectors that are closely integrated into EU supply chains, such as automotive, would be vulnerable

Many of the UK's export-oriented manufacturing sectors are closely integrated into EU supply chains, particularly the automotive sector. Around a third of UK-produced motor vehicles and parts are destined for the EU (Chart 2), and manufacturers' production processes rely heavily on EU supply chains.

Under a 'no-deal' outcome, trade costs would rise as tariffs are imposed and NTBs are erected. This could make locating automotive production in the UK less attractive because of the increase in production costs. For instance, imposing the EU Common Customs Tariff of 10%, would add an average of €3,000 to the cost of UK-made cars sold in the EU if fully passed on to buyers. In addition, tariffs on EU-sourced parts would further increase production costs, and any delays or disruptions at the border from customs controls threaten automotive firms 'just-in-time' business model, and risk cutting off UK supply chains. However, it's also feasible that a 'no-deal' Brexit could result in the reshoring of automotive supply chains, reducing the reliance on imported components from the rest of the EU for domestic automotive production. On balance, we expect automotive output to be 3.8% below our baseline forecast by end-2020.

Chart 2: Export-intensive industries are vulnerable to trade disruption with the EU



Sources: Oxford Economics, ONS and WTO

Export-oriented industries would face substantial headwinds in the event of a 'no-deal' Brexit, which results in tariffs and NTBs being erected. Chemicals, industrial machinery and automotive are among the most export-intensive sectors in the UK, magnifying the negative impact of trade disruption on their production.

The proportionate hit to consumer goods would be limited

Without a Brexit deal, production in consumer goods sectors would be 2.9% lower than the baseline by the end of 2020. This is similar to the loss in consumption over the same period, but lower than the hit to overall manufacturing and investment goods.

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Consumer goods such as food and beverages would be less severely impacted, given their lower trade intensity

NTBs would be high for the consumer goods sector, especially for food and beverages. The UK government has attempted to mitigate against custom-control delays for the supply chain by proposing the introduction of an independent geographical indication (GI) scheme in the event of 'no deal'; this will protect the name and source of products under current EU legislation. UK producers are expected to have to either use a new UK logo on products marketed in the UK or apply for GI status in the EU. It is anticipated that all current UK GIs will continue to be protected by the EU, but if this is not the case, UK producers will need to apply to the European Commission as 'third country' producers. Either option will pose a cost to producers from March 2019.

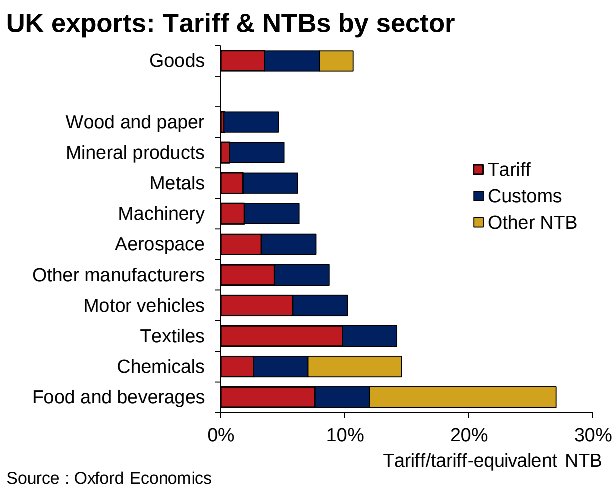
However, the food and beverages sector is comparatively less trade intensive than other industries – around 10% of its production is exported to the EU, compared to 20% for manufacturing as a whole (Chart 2), mitigating the overall impact to production.

Regulatory barriers could also disrupt trade

Highly regulated sectors, such as chemicals, would face significant NTBs, disrupting trade

Highly regulated sectors, such as food and beverages as well as chemicals, would also face significant NTBs (Chart 3). We have already seen that the former exports a relatively small share of output to the EU, but the latter would be vulnerable. Chemicals firms operating in the UK would find that their registrations under the EU REACH scheme are no longer valid. This would mean that firms wanting to sell UK-produced chemicals in the EU would have to transfer their registrations to an EEA-based organisation. Basic chemicals (such as ethylene) are also relatively commoditised, making it easier for countries to import from elsewhere if the UK becomes less competitive under a 'no-deal' Brexit. The hit to output would be compounded by supply-chain linkages, as demand from downstream sectors, such as automotive, falters. Overall, our scenario shows output in the chemicals sector is 4.3% lower than our baseline by the end of 2020.

Chart 3: The size of tariffs and NTBs varies greatly by sector



Overall, our assumptions imply significant additional trade frictions for the food & beverages and chemicals sectors. However, the former trades less with the EU relative to other industries, which would mitigate the overall impact on domestic production.

The UK pharmaceutical sector would be less severely impacted than the chemicals sector, with output 3.2% below the baseline by end-2020, despite it having a high reliance on exports to the rest of the EU and facing reasonable NTBs. The WTO's Pharmaceutical Tariff Elimination Agreement has established that sectoral tariffs will remain zero, even under 'no deal'. Meanwhile, the strong ties that the UK pharmaceutical industry has with top universities globally may help to shield this knowledge-intensive industry.

A spreadsheet containing quarter-by-quarter output forecasts to end-2023 for the key industrial sectors in this scenario is available on request from your account manager.

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