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US Trade Policy After 2024: What Is at Stake for Europe?

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OVERVIEW/ÜBERBLICK

- The economy of the EU is strongly exposed to changes in the trade policy regime of its most important bilateral economic partner, the US.
- Starting in 2017, the US has pursued protectionist trade policies with broad bipartisan support. Under the first Trump presidency, the US imposed additional tariffs on trade partners, worked toward weakening the World Trade Organization (WTO), and engaged in selective deal-making with a few bilateral trade partners. The WTO's role has been key in avoiding further global trade fragmentation.
- Should the US impose an extra tariff of 60% on goods imported from China and a uniform 10% surcharge tariff on all trade partners without FTAs, global trade would contract by about 2.5% in the first year and by approximately 4% in the long run. If trade partners retaliate, global trade would take a larger hit, with the contraction potentially doubling if tariffs are extended to preferential trade partners (e.g., Mexico and Canada). Chinese exports would be reduced by around 10%, while US exports would decline by up to 38%, reflecting the so-called Lerner Symmetry.
- Extra tariffs by the US would lower global GDP by slightly more than 0.75% in the short run and by around 0.6% in the long run, amounting to a loss of 750 and 600 billion Euros, respectively. The EU economy would shrink by 18 to 21 billion Euros, with Germany's economy decreasing by around 4 to 6 billion Euros.
- If US policies lead to a dismantling of the WTO, the EU's real GDP would fall by slightly more than 0.5%, with Germany experiencing even larger declines while the US would be somewhat less affected. China would incur the most significant losses, with its real GDP dropping by around 0.7% in the long run. Should the world fragment into geopolitical blocs led by the US and China, respectively, losses would increase further for the EU and China, with China's real GDP contracting by up to 2.3% and Germany's by around 1.2%, while the US would experience smaller declines (-0.8%). Short-run losses for all countries could be much more severe, with up to -2.8% change in real GDP globally within the first year.
- In an EU-US tariff war involving the automotive and digital sectors, both the EU and the US would see their aggregate real exports contract and real GDP decline. The GDP effect would be substantially larger for the EU (-0.25%) than for the US (-0.04%), with the EU suffering even greater losses in the long run. Germany's GDP would decline by about 0.3% (around 13

billion Euros). Conversely, if the EU and the US were to strike a trade deal eliminating tariffs on goods (including agriculture), the US would gain more than the EU, although both would see positive effects.

- Because the bilateral trade relationship between the EU and the US is more balanced than often thought, both parties have threat points in negotiations — the US in goods trade, the EU in services. The EU would lose more from a trade war, while the US would gain more from a trade deal. Therefore, the EU should propose such a deal to avoid escalation.
- It is strategically crucial for the EU to prioritize defending the multilateral world trade order and avoiding global fragmentation. The GDP losses resulting from WTO deterioration and fragmentation would far exceed those from a bilateral trade dispute with the US, with fragmentation effects up to 2 to 4 times larger for the EU and Germany.

Keywords: Trade wars, WTO, tariffs, decoupling, fragmentation

- Die Wirtschaft der EU ist stark von den Veränderungen in der Handelspolitik ihres wichtigsten bilateralen Wirtschaftspartners, der USA, betroffen.
- Seit 2017 verfolgen die USA eine protektionistische Handelspolitik, die breite parteiübergreifende Unterstützung genießt. Unter der ersten Trump-Präsidentschaft haben die USA zusätzliche Zölle gegen Handelspartner verhängt, auf eine Schwächung der Welthandelsorganisation (WTO) hingearbeitet und mit einigen bilateralen Handelspartnern opportunistische Deals geschlossen. Die WTO spielt eine Schlüsselrolle bei der Vermeidung einer weiteren Fragmentierung des Welthandels.
- Sollten die USA einen Zoll von 60% auf aus China importierte Waren und einen einheitlichen Zollsatz von 10% auf alle Handelspartner erheben, mit denen sie keine Freihandelsabkommen haben, würde der Welthandel im ersten Jahr um etwa 2,5% schrumpfen und langfristig um rund 4% niedriger sein als ohne diese Maßnahme. Wenn die Handelspartner Vergeltungsmaßnahmen ergreifen, würde der Welthandel einen etwas stärkeren Einbruch erleiden. Der Rückgang des Welthandels könnte sich verdoppeln, wenn die USA die Zölle auf ihre präferenziellen Handelspartner (wie Mexiko oder Kanada) ausweiten. Die chinesischen Gesamtausfuhren wären um rund 10% niedriger, während die US-Ausfuhren um bis zu 38% fallen würden, was auf die sogenannte Lerner-Symmetrie zurückzuführen ist.

- Extrazölle der USA würden das globale BIP kurzfristig um etwas mehr als 0,75% und langfristig um etwa 0,6% senken, was einem Verlust von 750 bzw. 600 Milliarden Euro entspricht. Die Wirtschaft der EU würde um 18 bis 21 Milliarden Euro schrumpfen, die deutsche Wirtschaft um etwa 4 bis 6 Milliarden Euro.
- Sollte die US-Politik zu einem Abbau der WTO führen, würde das reale BIP der EU um etwas mehr als 0,5% sinken, wobei Deutschland stärker betroffen wäre und die USA etwas weniger. Die größten Verluste wären jedoch in China zu verzeichnen, mit einem Rückgang des realen BIP um rund 0,7% langfristig. Sollte die Welt in geopolitische Blöcke zerfallen, die von den USA bzw. China angeführt werden, würden die Verluste für die EU und insbesondere für China noch größer ausfallen, wobei das reale BIP Chinas um bis zu 2,3% und das Deutschlands um etwa 1,2% zurückgehen würde, während die USA mit einem Rückgang von -0,8% weniger stark betroffen wären. Kurzfristig könnten die Verluste für alle Länder erheblich größer sein, mit einem Rückgang des globalen BIP um bis zu -2,8% im ersten Jahr.
- In einem Zollkrieg zwischen der EU und den USA, der die Automobil- und die Digitalbranche betrifft, würden sowohl die EU als auch die USA einen Rückgang ihrer realen Gesamtausfuhren und ihres realen BIP verzeichnen. Die Auswirkungen auf das BIP wären in der EU deutlich höher (-0,25%) als in den USA (-0,04%), wobei die EU langfristig sogar noch größere Verluste erleiden würde. Das deutsche BIP würde um etwa 0,3% (rund 13 Milliarden Euro) zurückgehen. Sollten sich die EU und die USA hingegen auf ein Handelsabkommen einigen, das die Zölle auf Waren (einschließlich der Landwirtschaft) abschafft, würden die USA stärker profitieren als die EU, auch wenn beide positive Effekte verzeichnen würden.
- Da die bilateralen Beziehungen zwischen der EU und den USA ausgewogener sind als oft angenommen, haben beide Parteien in den Verhandlungen Angriffspunkte — die USA im Warenhandel, die EU bei den Dienstleistungen. Die EU würde durch einen Handelskrieg mehr verlieren, während die USA mehr von einem Handelsabkommen profitieren würden. Daher sollte die EU ein solches Abkommen vorschlagen, um eine Eskalation zu vermeiden.
- Für die EU ist es von strategischer Bedeutung, die multilaterale Welthandelsordnung zu verteidigen und eine Fragmentierung zu vermeiden. Die BIP-Verluste durch einen Abbau der WTO und eine mögliche Fragmentierung der Weltwirtschaft wären deutlich größer als die Verluste aus einem bilateralen Handelsstreit mit den USA und könnten für die EU und Deutschland bis zu 2 bis 4 mal höher ausfallen.

Schlüsselwörter: Handelskriege, WTO, Zölle, Entkopplung, Fragmentierung

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1 Introduction

Europe is still the world's largest trading bloc by the value of its external imports and exports of goods and services.[1] In 2023, it exported goods and services worth approximately 4000 bn Euro, substantially more than China (3250 bn Euro) and the US (2850), while it imported goods and services worth approximately 3600 bn Euro (US: 3550 bn Euro; China: 2850 bn Euro). Valued in current prices, the EU's gross domestic product (GDP) is about as large as the Chinese while it is substantially smaller than the one of the US. It follows that the EU's degree of openness is substantially larger than that of both the US and China. Hence, it can lose more from disruptions in the global trading system. Within the EU, by wide margins, Germany is the biggest exporter and importer.

The EU in general and Germany in particular are strongly exposed to trade policies adopted by the second and third largest trading powers, the US and China. This policy brief studies various trade policy scenarios that might arise after the inauguration of a new US administration in January 2025. A second Trump administration is likely to be more isolationist, less multilateral, and more transactional than a Harris administration. But the latter would also pose challenges to the EU. Three questions arise: (i) What trade policy stance does the US adopt against the EU, (ii) how does it deal with China, and (iii) which course of action does it choose regarding the global trading system at large? We formulate realistic trade policy scenarios and use a quantitative trade model to measure the effects for the US, EU countries, and the world.

For most of the post-World War II period, the US was, in principle, a staunch defender of a rules-based global trade order. Several times, the US did engage in trade conflicts, for example against Japanese car exports in the 1980s, or against EU aircraft subsidies, but it broadly accepted the rules that it helped design itself. In the second Obama administration, strategic rivalry with China became an increasingly pressing issue. Multilateralism, which under the most-favored-nations rule mandates an equal treatment of all trade partners, came under attack. The US prepared big trade

[1] Extra-EU trade; https://ec.europa.eu/eurostat/statistics-explained/index.php?title=World_trade_in_goods_and_services_-_an_overview

deals — one with Pacific-rim countries (the Transpacific Partnership, TPP) and one with the EU (the Transatlantic Trade and Investment Partnership, TTIP) — to marginalize China. And it put pressure on the World Trade Organization (WTO) by stopping the confirmation of judges in its Appellate Body. The WTO was increasingly seen as unfairly enabling the rise of China to the detriment of the US.

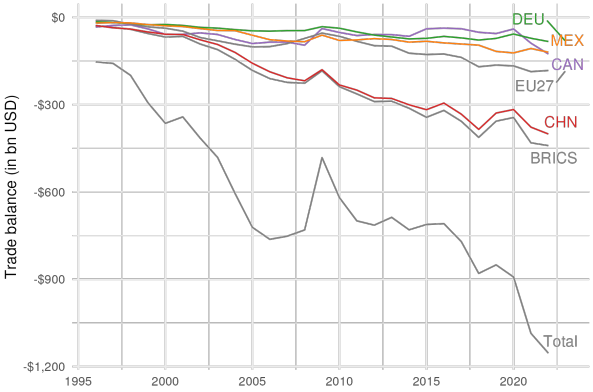
One can broadly view the first Trump Administration's trade policy as a radical escalation of this thinking. It marked a significant shift in US trade policy, characterized by a move towards protectionism and unilateral actions. A key theme of its approach was that the US deficit in goods trade was the result of "unfair" trade policies of essentially all trade partners, whether they were located in Europe, North America, or Asia. President Trump, who described himself as a "tariff man", levied substantial tariffs on imported steel and aluminum under Section 232 of the Trade Expansion Act, citing national security concerns. This move affected not only China but also traditional allies, including European countries. President Trump dramatically abandoned the previous administration's plans for TPP as the first move in his presidency and started a trade war with China. A series of tariffs targeted a wide range of Chinese goods, led to a tit-for-tat escalation, and resulted in a trade war that disrupted global supply chains and increased market uncertainty. He also moved against the WTO, completely paralyzing its Appellate Body. However, at the same time, the Trump Administration struck a series of trade deals. It renegotiated the North American Free Trade Agreement (NAFTA), resulting in the United States-Mexico-Canada Agreement (USMCA). It adjusted the US-Japan trade agreement, found a trade policy truce with the EU, and negotiated the so-called Phase-I-Agreement with China. These agreements are widely seen as cosmetic (USMCA) or unsuccessful (EU, China) – at least when judged against the Trump administration's own objectives.

Figure 1a depicts the US' **balance in goods trade**. The figure shows that, by the end of the Trump Administration in the year 2020, the overall US deficit was about 916 bn USD while it stood at about 737 bn USD in the last year of the preceding administration. Under Biden, the deficit increased further and reached 1190 bn USD in 2022 before declining to 1060 bn USD. Against this backdrop, the protectionist approach has not paid off. In fact, the US trade deficit was higher in 2020 in essentially all major US trading relationships than in 2016, including China.

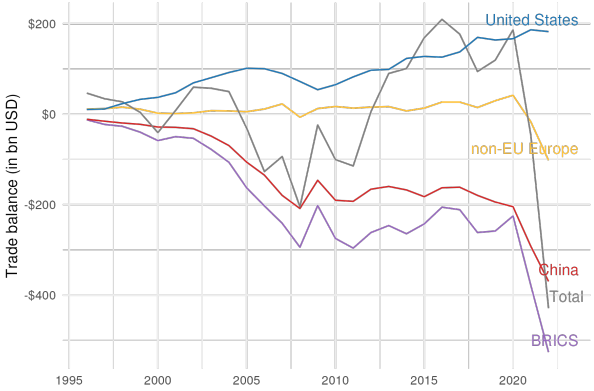
Figure 1b looks at the EU's trade balance. During the Covid-19 crisis, the EU's overall trade balance deteriorated sharply and turned strongly negative in 2022 due to a sudden increase in the value of imported energy products (natural gas, petrol) due to the war of Russia in Ukraine. Even against this backdrop, the EU trade balance increased because of unexpectedly strong GDP growth and the

Figure 1: Evolution of US and EU27 trade balances over time

(a) US trade balance over time



(b) EU trade balance over time



Notes: US Bureau of Economic Analyses and Eurostat. Own illustrations.

depreciation of the Euro against the Dollar.

The Biden administration's "**Buy American**" policy is a key aspect of a new American industrial policy enacted by Congress in the form of four laws that subsidize key sectors of the US economy. The American Rescue Plan Act (2021) provides some $40 billion in industrial subsidies; the Infrastructure and Jobs Act (2021) adds some $1.2 trillion; the Inflation Reduction Act (2022) contains some $369 billion in subsidies for electric vehicles and renewable energy; and the Chips Act (2022) adds $252.7 billion in subsidies for semiconductor chips technology. These laws coupled with new "buy American" standards constitute a venture into industrial policy protectionism and away from free trade ideals.

Biden's **trade policy** kept a low profile. It seems that his administration could not or should not address trade matters that would raise even minimal opposition or controversy. Thus, the Biden administration allowed trade policy to drift in a similar direction as under Trump. For example, (1) tariffs and other trade restrictions imposed by the Trump administration under section 232 of the Trade Expansion Act and sections 201 and 301 of the Trade Act of 1974, have remained, at least for now; (2) trade and investment sanctions on China have remained and were legally secured and enlarged; (3) although the Biden administration played a key role in the appointment of Ngozi Okonjo-Iweala as new Director General of the WTO, it has not pushed for a revival of the WTO. Finally, negotiating new free trade agreements was not a high priority for the Biden administration.

The United States under Biden continued to show little interest in restoring the **WTO** as a trade agreement negotiation forum. First, the United States has no present interest in any form of a

comprehensive, multilateral trade agreement. Such an agreement would not have any chance of gaining the approval of Congress. Second, the United States has lost confidence in the ability of the WTO as a negotiating forum. The specialized trade agreements that the US advocates, such as an environmental goods agreement and a digital trade agreement, do not find favor among most WTO members. Thus, the US commonly turns to other negotiating forums, such as the OECD, the G-7, or the State-to-State dispute mechanism of the United States-Mexico-Canada Agreement (USMCA).

For the Biden administration, negotiating new **free trade agreements** was not a priority. Among four trade negotiations notified in 2020 (with the EU, Japan, the UK, and Kenya), only one (the US-Kenya negotiations) continued but Congress was not receptive to approving any important new trade initiative. Free trade agreements did not fit well with Biden's announced "worker-oriented" trade policy.

Containing **China's rise** as an economic superpower has continued to remain as important an objective for the Biden administration as for Trump. The Biden administration has left the Trump tariffs against China in place and has responded to China's excessive subsidization with subsidies of its own. It enacted the Chips Act which provides $52.7 billion in emergency supplemental appropriations over five years to develop domestic manufacturing capability and workforce development to greatly expand the domestic production of semiconductor chips. The Chips Act also provides some $200 billion that are available for the development of new technologies, such as robotics, artificial intelligence, and quantum computing.

It appears realistic that US trade policies remain protectionist in the coming four years. However, Donald Trump and his trade policy advisors (i.e, Peter Navarro, Robert Lighthizer) appear to have tightened up their policy stance towards China and the WTO, while Kamala Harris seems to value multilateral institutions more than President Biden.

In this policy brief, we analyze proposed changes to US trade policy by both leading candidates, Donald Trump for the Republican Party, and Kamala Harris for the Democratic Party.[2] In Section

[2]Several comparable analyses have been conducted, focusing particularly on Trump's proposed 60% tariffs on products imported to the US from China, and 10% tariffs on those imported from elsewhere. Our study includes a larger array of scenarios, including EU-US negotiations and the effects of sharpened fragmentation. Bouët, Sall, and Zheng (2024), using CEPII's MIRAGE model (a large-scale trade model similar to ours), simulate various trade policy scenarios, estimating that global GDP would decrease by 0.5% with sharper contractions in the US (-1.3%) and China (-1.3%), while trade partners like Mexico would benefit due to privileged access under USMCA. Baur, Flach, and Hillrichs (2024) assess the effects of various scenarios on German exports and the broader German economy. Their simulation with the ifo Trade Model, effectively an earlier version of the model used in our analysis, suggests that while Germany would face significant declines in exports to the US and China, trade diversion to alternative markets would partially offset these losses, resulting in an overall 2% decrease in German exports. They conclude that the EU should continue to strengthen the single market and pursue new trade agreements to safeguard against potential

2, we present several pertinent empirical facts describing recent trends and the current situation. We provide an overview of the policy proposals put forward by the Trump and Harris campaigns in Sections 3.1 and 3.2. In section 4 we summarize the expected mechanisms at stake. In section 5 we take these proposals and possible international reactions to a quantitative model of the world economy and simulate various scenarios, focusing on the impact on Europe. Specifically, we simulate three sets of scenarios. First, we study US policies in which the US imposes additional tariffs on all trading partners and extra high ones on China (as proposed by Donald Trump). The trade partners either retaliate or not and the US includes its FTA-partners or not. Second, we study the effects of a severely damaged World Trade Organization, of a world economy sliding into fragmented blocs, and the culmination of the two. Finally, we also investigate scenarios in which the EU and the US engage in a tariff war (as was threatened but avoided in July 2018), or in a mini trade deal that covers either only industrial goods or also agricultural goods. In all calculations, we distinguish between short-run effects (materializing if the trade policy shocks arrive unexpectedly and hit countries unprepared) and long-run effects (materializing after full adjustment of all affected economies). We conclude by discussing potential European responses in Section 6.

2 Descriptive evidence

In this section, we present evidence on the relative importance of the US for the EU economies compared to other partner countries. Focussing on goods trade, we also discuss how the situation has changed over time. For the former task, we draw on current account data from Eurostat, for the latter we make use of global trade data provided by CEPII's BACI database (Gaulier and Zignago, 2010).

US protectionism. In Baur, Flach, Link, et al. (2024) they find that 44% of German manufacturing firms anticipate adverse impacts should Trump win the election. Despite this concern, only a minority of firms have concrete plans to adjust their operations, reflecting either existing trade adjustments or an expectation of continuity in US trade policy regardless of the election outcome. Several studies use off-the-shelf macroeconomic models (rather than trade models) to study the effects of trade conflicts. Such models have only a small number of geographical units and sectors, but they allow for a more precise modeling of dynamics. Obst, Sultan, and Matthes (2024a) analyze the potential economic impacts on transatlantic trade, simulating various scenarios of tariff hikes on EU-US trade using the Oxford Economics Global Economic Model. Their findings indicate that US GDP would initially decline by up to 1.5% in 2025 under a mutual 20% tariff scenario, while the EU and Germany face lasting negative effects with up to 1.5% GDP losses by 2028, driven by reduced exports and private investment without significant recovery over time. Dullien, Stephan, and Theobald (2024) analyze potential impacts on Germany's economy using the NiGEM model, finding Germany's GDP could drop by over 1% within the first two years, with sustained negative effects due to heightened import costs and reduced export demand, particularly in light of existing economic strains from recent energy price shocks and international trade pressures. McKibbin, Hogan, and Noland (2024) explore several policy proposals from Trump's 2024 campaign, including mass deportations, broad tariffs, and reduced Federal Reserve independence. Their analysis of trade policy, particularly a universal 10% tariff and a 60% tariff on Chinese imports, reveals significant risks to US GDP, inflation, and sectoral stability, with trade-exposed sectors like manufacturing facing the steepest declines.

The EU's bilateral current account relationship with the US in comparison, 2023

Figure 2 looks at the EU's ten most important bilateral economic relationships in the year 2023 through the lens of the current account. This perspective is the right one if one is interested in the economic importance of various partner countries for the EU. Importantly, it not only investigates goods trade but also services trade and primary income (the investment or labor income earned by EU residents in extra-EU markets).[3]

Several important facts stand out: First, the US is, by wide margins, still the EU's largest economic partner. The EU has larger goods imports from China, but in all other categories, transaction values are substantially larger with the US. The turnover (credit/exports and debit/import sides together) amounts to 2280 bn EUR with the US and to 861 bn EUR with China. Integrating Hong Kong into this picture changes very little but would lead to China overtaking Switzerland as the EU's third most important partner. The UK is the second most important partner of the EU.

Second, the EU has a much more balanced relationship with the US when services trade and primary income are taken into account next to goods trade. US payments to the EU make up about 1160 bn EUR while EU payments account for 1120 bn EUR, the US deficit is only 40 bn EUR; data from the US Bureau of Economic Analysis (BEA) corroborates this perspective (the US deficit is even smaller).[4]

These facts are important and play a key role in our simulation exercises – services trade needs to be incorporated into the simulation model and be given the appropriate weight – and for the EU's policy stance towards the US – while the US has a threat point in the area of goods trade, the EU enjoys one in the area of services trade.

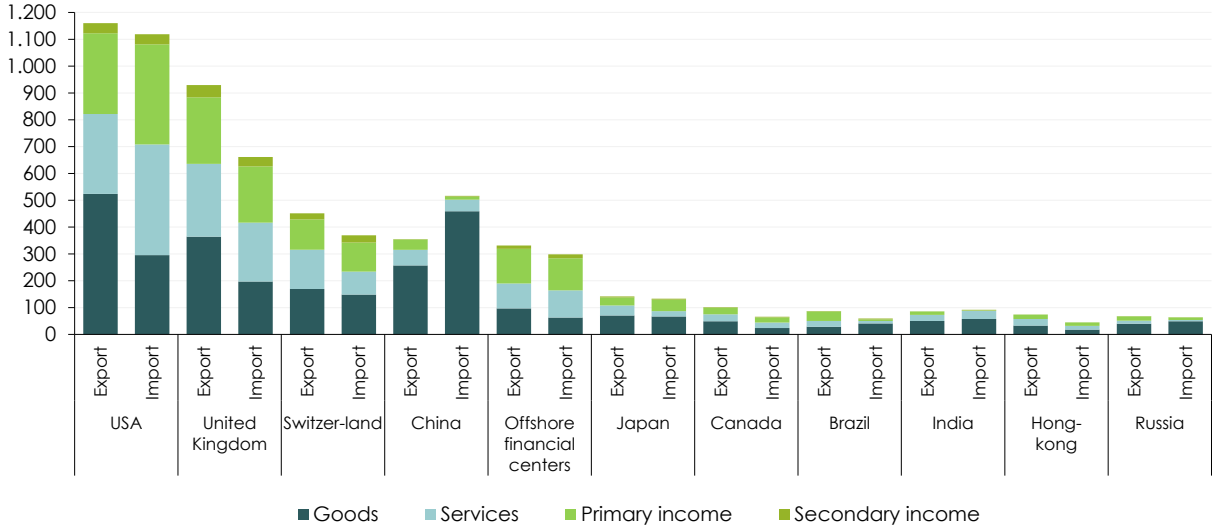
The Rise of China in Global Goods Trade

Figure 3 shows the evolution of goods trade. It distinguishes between trade of manufacturing goods, which comprise, among other things, items such as transportation equipment, all sorts of machinery, electrical goods, furniture, and toys on the one hand, and all trade (manufacturing trade plus trade

[3] Figure 2 also looks at secondary income, another component of the current account. Secondary income describes payments without a clear economic counterpart, such as remittances of migrants or payments to international organizations.

[4] Braml and G. Felbermayr, 2019 study the EU-US bilateral current account position in more detail and explain the data discrepancies between Eurostat and the BEA.

Figure 2: The EU's Balance of Payment with its Top Economic Partners



Notes: Eurostat. Own illustration.

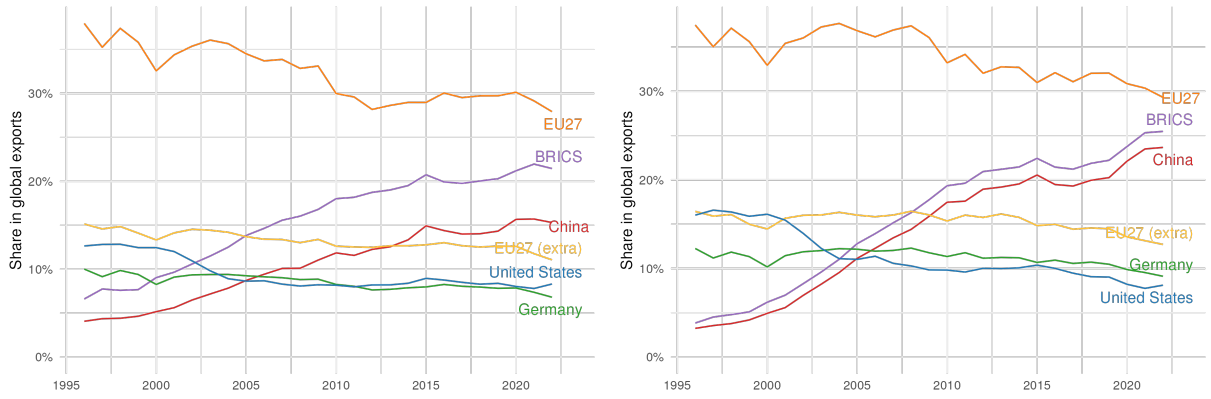
in agri-food products, raw materials, energy and the like) on the other hand. Both charts show the rise of China. Its exports of manufacturing goods amounted to about 4% of the global aggregate in 1996. Twenty years later, in 2016, China's share stood at about 20%. In 2022, the last year covered in the BACI data, about 24% of global manufacturing goods exports came from China. This is substantially more than the country's share in global GDP, which – evaluated at current US dollars – stood at 17.5% in 2022. President Trump's trade policy measures, meant to curb China's rise as the powerhouse of manufacturing, therefore do not look successful.

In 1996, US and Extra-EU manufacturing exports were approximately of similar size. However, after China entered into the World Trade Organization in 2001, the US' share quickly fell from about 16% to 11% in four years. The EU's share remained relatively constant at 15%, helped by an expansion of EU production networks to low-cost Eastern Europe. From 2016 onwards, the EU's share has started to decline, too, mostly driven by Germany whose share has gone down from about 11% to 9% since then. If politicians are concerned about losing manufacturing market shares to China, the data show that, since 2016, this is a shared concern across the Atlantic.

Non-China BRICS countries (Brazil, Russia, India, and South Africa) have made only very modest gains in global manufacturing export share. This is very different when looking at total trade. The reason is that the non-China BRICS countries have expanded their global role outside the

manufacturing sector.

Figure 3: Evolution of total export and manufacturing export shares



(a) Shares in total global exports

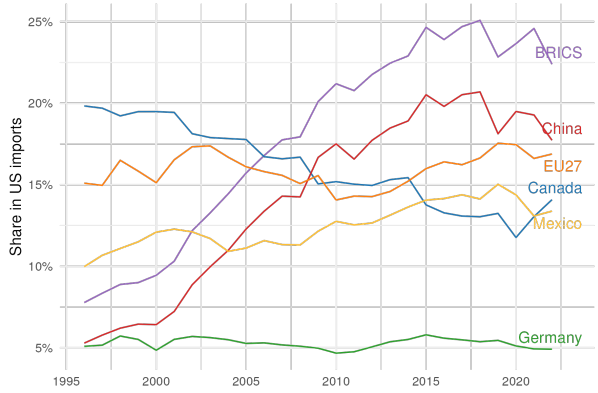
(b) Shares in global manufacturing exports

Notes: BACI Data Base of CEPII. Own illustrations. Manufacturing is defined as comprising HS-sections 84-95 (transportation, machinery, electrical goods, furniture, toys.) Percentages refer to global totals that include intra-EU trade.

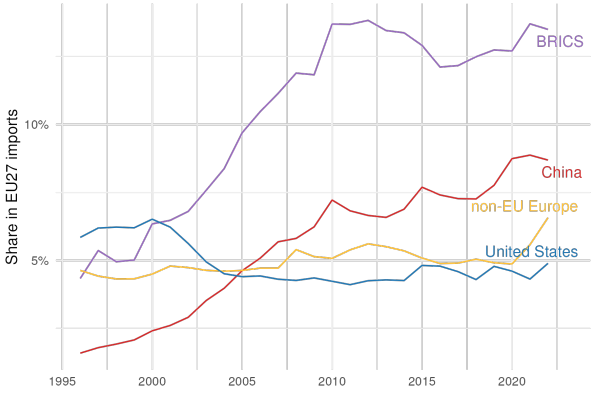
Are the US and the EU Derisking Their Imports?

Figure 4: Evolution of import shares in the US and EU27

(a) Shares in US imports



(b) Shares in EU27 imports



Notes: BACI Data Base of CEPII. Own illustrations. Percentages refer to global totals that include intra-EU trade.

Figure 4a displays the evolution of import shares in the US between 1995 and 2022 for BRICS, China, EU27, Germany, Mexico, and Canada. In 2022, BRICS countries accounted for 22% of US imports, with a noticeable rise starting in the early 2000s. China alone held 18% of US imports,

while the EU27 contributed 17%. Germany specifically made up 5%, showing a slight decline in recent years. Mexico and Canada, key trading partners under NAFTA/USMCA, accounted for 13% and 14% of US imports, respectively, in the latest figures. The figure highlights the increasing shares of imports from BRICS countries and China in particular between 2000 and 2015 and a levelling-off thereafter. Regional partners like Mexico and Canada have maintained important shares, while the former has been growing from 10% in 1995 to almost 15% just before the pandemic, while the latter has decreased from 20% to just below 15%. EU27 countries' share has remained largely stable in the past decades, hovering between 15–17%.

Analogously, Figure 4b shows the evolution of average import shares in the EU27 from 1995 to 2022 for BRICS, China, the United States, and non-EU Europe. Most notably, the share of intra-EU27 trade is *very* stable at around 60% and not displayed here. In 2022, the latest year in the available data, BRICS countries accounted for approximately 14% of EU27 imports, maintaining a dominant share after a sharp rise in the early 2000s. China alone made up 9% of EU27 imports, reflecting the growing significance of Chinese goods in EU imports. Non-EU Europe represented another 7% of imports, and the United States' share stood at 5%, showing stability but a slight increase in the most recent years. The numbers underscore the global importance of BRICS countries and China in particular gained between 2000 and 2015. At the same time, unsurprisingly, the figure underlines relatively stable import shares from traditional partners like the United States and non-EU Europe.

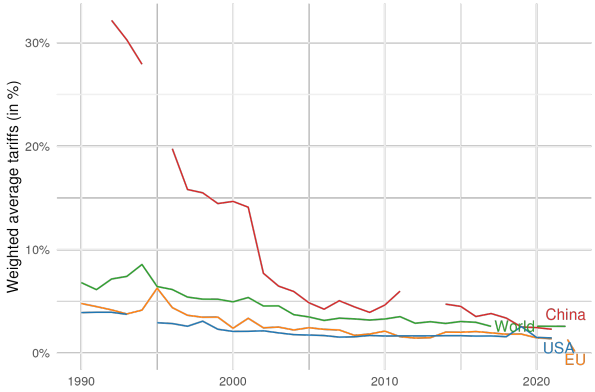
3 Proposed future policies

3.1 Trump campaign

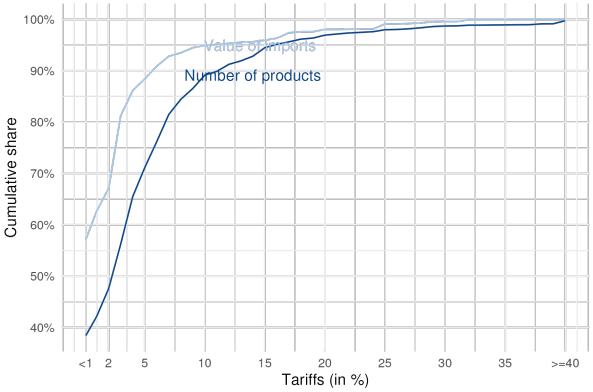
New tariffs against trade partners The most important field of action in the area of trade policy would be new and higher tariffs. President Trump proposes a 10% surcharge tariff on all goods imported into the US. Presumably, the extra tariffs would not apply to countries having free trade agreements with the US. They would also not apply to services imports. Against China, Trump talks about tariffs of 60%. The tariff revenue is meant to finance a reduction in income taxes. Just how unusual these proposed tariffs are becomes clear when looking at Figures 5a and 5b. Figure 5a illustrates the historical trend of weighted average tariffs for China, the United States, the European Union, and the world average from 1990 to today. The most notable decline is observed in China, where average weighted tariffs started above 30% in the early 1990s and dropped significantly to

Figure 5: Evolution of tariffs and distribution of US tariff schedules

(a) Evolution of weighted average tariffs



(b) Distribution of US tariffs in 2022



Notes: World Bank. Own illustration.

below 2.7% by 2020. This sharp decline coincides with China's accession to the WTO in 2001 and its integration into the global trading system. Average tariffs in the US and EU remained relatively stable, hovering below 5% in the 1990s, with a downward trend over the decades to now around 2.5%. The only exception for the United States can be seen in 2019 when — albeit briefly — US tariffs increased due to what was then dubbed the "Trump Tariffs". Overall, the world average mirrors this trend, reflecting global tariff reductions driven by international trade agreements and liberalization efforts.

Figure 5b shows the distribution of US most-favored-nation tariff rates in 2022, mapping these against the cumulative number of products and the cumulative value of imports associated with those rates. The curves show that the vast majority of imports, as well as the number of products, are subject to *very* low tariffs. Almost 90% of the value of imports and more than 70% of products are subject to tariffs lower than 5%, and 66% of the value of imports and close to 50% of products face tariffs lower than 2%. Note that in 2022 only up to 58% of imports were affected by tariffs at all — 34% were traded within US FTAs and the remaining 8% by trading arrangements covering imports from developing countries, like the GSP or AGOA.[5] Currently, only 10% of products and fewer than 5% of import value face tariffs equal to or higher than 10%, making the proposed tariffs a dramatic increase in imposed duties.

[5]The 42% of tariff-free imports are a lower bound as these numbers assume a 100% preference utilization rate.

Reciprocal Trade Act (RTA). The EU (trade surplus 192.6 Bill USS. in FY2022, to which Germany contributed 74.1 Bill. USS$) would be exposed to higher US tariffs in sectors where EU MFN tariffs are higher than those in the US.[6]

Except for a few labor-intensive manufactured products, in all sectors, the EU applies higher MFN tariffs than the US. The agricultural sector would face the strongest rise in tariff-based entry barriers to the US, next to the transport sector. Overall, the tariff differential would be below 2%, the lowest among all countries having a trade surplus with the US. Following the Navarro estimates, implications for the entire trade balance would be small With the EU, the US trade deficit would shrink by 15% only. Navarro sees higher NTBs in partner countries than in the US as a major reason for this small effect. He ignores imperfect competition. Notwithstanding NTBs, the estimates are flawed. The trade deficit of the US against the EU measured at value added and not at gross output is very much smaller as the EU has higher shares of imported intermediates than the US. For the current account deficit (driven by savings rate differentials) the impact of the RTA is the the smallest. Macroeconomically, the RTA could fuel inflation in the US, weaken the dollar as the most important global currency, reduce the positive net foreign equity position of the US, and raise doubts about the US's willingness to serve its debts in bond markets.

De-Coupling from China. Trump is serious about a maximum of decoupling the US from trade and factor movements with China (including labor, students, and capital). This could have negative implications for German firms producing in China for exports to the US, especially those being in joint ventures with Chinese firms. Furthermore, pressure upon the EU market to absorb Chinese supply now diverted from the US market could rise provoking further bilateral trade conflicts between the EU and China. As a manufacturing hub in the EU, such conflicts could see Germany as a main actor and eventually victim.

US Break with the WTO. The Navarro "fair trade" narrative includes a break with global rules under the WTO MFN framework allegedly being already under Chinese control. Unilateralism followed by pressure to conclude bilateral agreements under the RTA premises would substitute for the WTO framework. The target of such a strategy could be to induce partner countries to lower their tariffs to the US level without counter-concessions from the US. Should partner countries give in without lowering tariffs to third countries as well as the MFN rule would require, US exporters would benefit from a sizable competitive advantage in these markets against a third country, i.e. Germany.

[6] WTO Tariff Profiles US vs EU: https://www.wto.org/english/res_e/booksp_e/world_tariff_profiles23_e.pdf.

Trade diversion against German exporters would likely be highest in agricultural products where tariff differentials are the highest.

Onshoring instead of offshoring. President Trump wants US firms to invest less abroad and more in the US. This applies in particular to investment in "hostile" host countries (China) but could also impact negatively US investment in Europe (hosting almost 60% of US investment abroad) and – more sector-specific- to Germany, hosting almost 20% of US FDI in machinery. Should machinery investment include data mining and storage, the Trump administration could demand data to be stored in the US, eventually opening a conflict on the new Data Privacy Framework agreed upon in 2023.

3.2 Harris campaign

In contrast to former president Trump, Kamala Harris' trade policy stance has remained vague on details. However, as Vice President, she supported the broader goals and strategies laid out by the Biden administration. One of her few direct statements on trade policy comes from a 2019 debate, where she said,

> *"When we look at this issue, my trade policy, under a Harris administration, is always going to be about saying, we need to export American products, not American jobs. And to do that, we have to have a meaningful trade policy. I am not a protectionist Democrat. Look, we need to sell our stuff. And that means we need to sell it to people overseas. That means we need trade policies that allow that to happen."*[7]

This suggests that a Harris administration would aim to maintain current policies while seeking to open new markets for US products.

Worker-Centered Trade Policy. President Biden pursued a "worker-centered" approach that followed from his close long-term relationship with trade unions. In practice, this means policies that benefit American workers by shielding them from foreign competition, e.g., by raising barriers to imports of in-puts (outsourcing) and final goods. Corporate interests, in particular profits, therefore receive a smaller weight in policy formulation. In speeches, Harris has advocated for stronger labor

[7] See https://ielp.worldtradelaw.net/2019/09/trade-talk-in-last-nights-democratic-debate.html.

standards in trade agreements to ensure that American jobs are not undercut by lower labor costs abroad.

Fair Trade and Equity. Harris has emphasized the need for fair trade policies that address income inequality, both domestically and globally. She has supported policies that protect vulnerable communities and ensure that trade benefits are more equitably distributed. This includes policies to protect domestic industries from unfair foreign competition, as well as measures to ensure that workers and small businesses have a stake in the global economy. In practice, "fairness" is often an ill-defined concept; policies that strive for it often turn out to be protectionist.

China. Harris would likely continue the Biden administration's tough stance on China, particularly regarding intellectual property theft, forced technology transfer, and unfair trade practices. Harris supports policies that seek to address these issues through bilateral deals but also — and here is a key difference to Donald Trump — through multilateral agreements. The administration has maintained tariffs on certain Chinese goods and has worked to counter China's influence in global trade, particularly in strategic industries like semiconductors. Harris is expected to continue applying Section 301 tariffs, particularly on products such as electric cars, as outlined in the USTR May 2024 report.

Multilateralism. In contrast to the Trump approach and possibly also to the outgoing administration, Harris has supported a return to multilateralism in trade policy, which contrasts with the more unilateral approach taken by the previous administration. This includes working through organizations such as the World Trade Organization (WTO) and strengthening trade relationships with allies, particularly in Europe and the Asia-Pacific region. She has also advocated for trade deals that support US foreign policy objectives, such as bolstering democratic values and human rights.

Supply Chain Resilience. Very much in line with the outgoing administration, Harris has emphasized the need for more resilient and diversified supply chains, particularly for critical goods like medical supplies and semiconductors. She has supported efforts to reduce dependency on foreign suppliers for essential goods and to bring manufacturing back to the US or diversify sourcing among allied countries. She belongs to the "diversification" rather than to the "decoupling" fraction among trade policy practitioners.

Technology and Digital Trade. While Joe Biden and Donald Trump have focused mostly on manufacturing jobs, Kamala Harris' Californian origins may imply a stronger interest in high-tech services. This may mean more leverage for the EU, as the US is the world's largest net exporter of services. In speeches, Harris has expressed the need to modernize trade agreements to account for the digital economy. This includes promoting rules on digital trade that protect data privacy, cybersecurity, and intellectual property rights. It also involves ensuring that digital trade policies align with broader goals around equity and access to technology.

Environment and Climate. Vice President Harris has been a strong advocate for climate action. She may see trade policy as a tool to advance these goals. In speeches, she has expressed support for trade agreements that promote clean energy, reduce carbon emissions, and protect the environment. This approach would likely include provisions in trade deals that incentivize green technologies and penalize countries that do not meet environmental standards. In this regard, the EU may find a stronger ally in Kamala Harris than in President Biden. The idea of promoting a "Climate Club" may be easier to implement than with Biden and, of course, Trump.

Agriculture and Small Farms. A Harris administration would likely seek to open the EU's agricultural market to more US exports. Currently, the EU's simple MFN applied tariff in agriculture is 11.4%, compared to just 5.1% in the US Democrats, including Harris, aim to support small farms and prevent further declines in farmers' incomes by improving access to international markets. The EU ranks only fifth as a US export market for agricultural products, significantly behind China, Canada, Mexico, and Japan. Harris would likely use trade talks to push for lower agricultural tariffs, reflecting her broader goal of protecting American farming communities.

Trade Participation. President Harris would likely promote policies that help small businesses and promote gender equity. In her previous role, she has supported trade initiatives that provide opportunities for small and minority-owned businesses to participate in the global economy. In this context, she has emphasized the importance of removing barriers for women entrepreneurs and small business owners in international trade.

4 Economic mechanisms at stake

Here we examine the economic mechanisms likely to translate the electoral platforms just mentioned into an impact on international trade and the European and American economies.

4.1 A triple objective

Donald Trump's trade policy proposals have a triple objective. The first is to reverse the de-industrialization of the United States, based on the assumption - largely dictated by the political economy of swing state voting - that traditional manufacturing jobs are good jobs. From this first point of view, the aim is to protect American industry from outside competitors.

The second objective is geostrategic: to slow down China's technological catch-up and curb the growth of this world power. From this second point of view, putting sand in the gears of global value chains is a priori an effective instrument, given the high involvement of Chinese factories in these value chains. Tariffs on China should therefore rise much more sharply than on other partners, in line with the trade war already underway against the country.

The third objective is fiscal. Donald Trump's election platform calls for further tax cuts targeted at high-income earners and businesses, and these must be financed: as in many developing countries, customs revenues would then appear to be a significant source of income for public budgets.[8]

Are higher tariffs able to fix these three problems at once?

4.2 A weakening of the multilateral framework

To answer this question, it is worth taking a detour into economic theory before simulating stylized economic policies. What are the expected effects of an increase in tariffs in violation of the basic rules of the World Trade Organization? We are not talking here about anti-dumping duties, safeguard clauses, or countervailing taxes on foreign subsidies aimed at re-establishing healthy competition between foreign and American producers, but rather about a unilateral increase in customs duties applying to all trading partners and discriminating between them. The first implication is a weakening

[8] We are not referring here to the rhetoric of reducing the current account deficit: this deficit stems from a macroeconomic imbalance, i.e. a shortage of US savings, which means importing foreign savings.

of the multilateral trade rules put in place by industrialized countries in the past, notably the United States.

The first victim of this policy is indeed the WTO. While this multilateral organization has helped to reduce barriers to trade since its creation thirty years ago, it has above all reduced uncertainty for exporters and offered a framework within which trade disputes could be resolved, based on a set of mutually accepted rules. This reduction in uncertainty has fostered investment, country specialization, and the spread of technical progress through trade, benefits which will be partly lost as a result of this weakening. The extent of this will ultimately depend on the reaction of the EU, China, Japan, India, Brazil, and other major players in international trade: will they choose to retaliate within the framework of WTO rules or to free themselves once and for all from multilateral rules, including in their bilateral relations?

4.3 The complex effects of higher tariffs

Turning to tariffs, several questions need to be distinguished. Firstly, are tariffs applied uniformly to all partners, or are they differentiated? US consumers (or US producers sourcing components on the international market) make their choices based on relative prices: As tariffs drive up production costs, US goods become more expensive in absolute terms, but less expensive in relative terms than imports. Similarly, German goods become more costly in the United States, but less costly than Chinese products if the tariff is 10% on European products and 60% on Chinese products. Finally, Canada and Mexico could be the great beneficiaries of this protectionist scenario, as they are shielded from higher tariffs by their presence in the USMCA. Sanctions on steel had not spared them however, and we can therefore assume that Donald Trump will not hesitate to tear up the USMCA agreement, as he had noisily done with the TPP.

The second issue with tariffs concerns value chains: by increasing tariffs on imported goods entering the production process in the United States the competitiveness of US industries takes a blow, undermining the expected benefits of tariff protection (Bellora and Fontagné, 2019). Reciprocally, by retaliating against American tariffs, Europe would increase the cost of producing goods incorporating American components, thereby reducing European exports of these goods.

Thirdly, regardless of the previous mechanism, not all American industries will react in the same way to the same level of protection (e.g. 10%). Indeed, the response of US demand to an increase in import prices (the price elasticity of demand) differs greatly from one product to another. A uniform

policy will therefore not produce uniform results.

Another question concerns the response of foreign prices to US tariffs: this response will determine the level of tax borne by US consumers (how much of the tariff will they pay?) and the level of protection enjoyed by US producers (by how much will their competitors' prices rise?). A central mechanism here is the evolution of the US terms of trade (the ratio of the price of exports to that of imports). In theory, a large country imposing a tariff forces foreign exporters to lower their prices, because of its market power. This is the optimal tariff argument: it is not in a large country's narrow interest to engage in completely free trade. Beyond the fact that the optimal tariff for the United States is much lower than the level of tariffs evoked during the presidential campaign, the experience of the trade war with China suggests that foreign prices have not fallen, except through an appreciation of the US dollar. To the extent that tariffs have been passed through to the US market, protection was more inflationary and more damaging to the purchasing power of American consumers.

Lastly, and this is a major concern for European countries, an increase in US tariffs discriminating against Chinese exports will necessarily involve a diversion of these exports to alternative markets, with the EU potentially being the first to be affected. The expected increase in European imports of Chinese products could then harm economic activity, potentially initiating a cascading of protectionist measures aimed at curbing these imports. At the same time, however, the EU could make up for Chinese exports that disappear due to tariffs.

We now summarize the outcome of simulations synthesizing the outcome of these combined economic channels.

5 Simulation Analysis

Model, Data, and Calibration

In the following, we use a large-scale international trade model — the KITE model — to quantify the effects of tariffs on trade flows, sectoral value-added, and the overall welfare of countries. The model is based on Caliendo and Parro (2015) and has been customized by researchers at the Kiel Institute and at the Austrian Institute for Economic Research (WIFO) to incorporate the latest available data. Aichele, G. J. Felbermayr, and Heiland (2014) and Chowdhry et al. (2024) provide the elements of

the model, more details are found in Appendix A. Here it suffices to say that the model belongs to the class of so-called New Quantitative Trade Models (NQTM). It combines Ricardian elements with product differentiation and features perfect competition in all markets.

The model is calibrated to replicate the observed trade flows, sector-level outputs, and aggregate income for 160 countries or regions and 65 sectors. The data on input-output linkages is taken from the GTAP 11 dataset (Aguiar et al., 2023), while data on trade flows from the BACI dataset (Gaulier and Zignago, 2010) and tariffs from MacMap (Bouët, Decreux, et al., 2008; Guimbard et al., 2012).[9] We take trade elasticity estimates from Fontagné, Guimbard, and Orefice (2022). We produce long- and short-run simulations, by reducing these elasticities by a factor of 4 inspired by the "le Chatelier" dynamics in Baqaee et al. (2024).[10]

This canonical trade model takes several macroeconomic variables as given, e.g., the savings rate or sector-level technologies. In contrast to the macroeconomic model used by Obst, Sultan, and Matthes, 2024b who also analyze scenarios regarding EU-US trade relations, the KITE model features almost all countries of the world separately (therefore allowing for different adjustments in different countries), a large number of separate sectors (therefore capturing the rich patterns of comparative advantage of countries), and intra- and inter-national input-output links (thus accounting for global production networks and supply chains).

Starting from the baseline data for input-output linkages for the year 2017, in a first step, we adjust the model such that it captures salient features of the situation as of 2024. In particular, as in Chowdhry et al., 2024, we update current trade shares from BACI and value added using observed GDP growth rates taken from the World Bank database, and incorporate the tariffs being applied by countries since June 2024, including, e.g., the tariffs on BEVs from China imposed by the US Administration (100%), by India (70%), by Turkey (40%), and by the EU (on average 21.3%), and by various other countries. This serves as a "benchmark" scenario against which all subsequent scenarios are calculated. Deviations from this benchmark are calculated as changes.

We look at three sets of scenarios. First, we simulate the effects of several US policies that would shape the global economy:

[9] See https://www.macmap.org/

[10] The key idea behind these simple dynamics in an otherwise static model is that trade elasticities are significantly lower in the short run — for instance, Fajgelbaum et al. (2020) estimate the aggregate short-run elasticity to be around 1.5 after one year. In contrast, the average long-run elasticity is typically estimated at around 4 (Head and Mayer, 2014). The approach thus captures a conservative short-run effect within the first year, during which customers and suppliers face constraints in adjusting to a trade cost shock.

US Policy Scenario 1 (US tariffs): In violation of the US' commitments under the WTO, the US imposes a 10% tariff on all non-FTA partner countries and a 60% tariff on imports of Chinese goods.

US Policy Scenario 2 (US tariffs + retaliation): The US implements the tariffs described above and affected countries retaliate with the same tariff levels vis-à-vis the United States (in line with WTO rules).

US Policy Scenario 3 (US tariffs, no FTAs): The US additionally extends tariffs to countries with which it currently has free trade agreements (FTAs), effectively breaching its contractual obligations. All trade partners retaliate with reciprocal additional tariffs.[11]

We also investigate three scenarios that simulate a general deterioration of global economic cooperation. Under the impact of a fiercer Sino-American conflict, the WTO could be lethally damaged. Also, the EU could be forced to take sides. Because its overall bilateral current account relationship with the US is substantially larger than with China, and the US has a potent threat point against the EU — a withdrawal of its military security shield — the EU would most likely side with the US.

Global Scenario 1 (WTO Deterioration): We simulate an end of the WTO's role in facilitating global trade. We do so by removing the effect a membership of the WTO has had on average on bilateral trade flows.[12]

Global Scenario 2 (Global Fragmentation): We simulate the scenario described in Baqaee et al., 2024, where the escalation between the US and China leads to a general fragmentation of the global economy into three blocs: US, EU, and other G7 countries in one bloc; China, Russia, and its allied countries;[13] as well as a bloc of neutral countries.

Global Scenario 3 (WTO Deterioration and Global Fragmentation): This scenario combines the two scenarios above. The fragmentation of the world economy into blocs might well be both the consequence and the cause of a collapse of the WTO system.

Finally, we look at three scenarios specific to the EU-US relationship — one that models an escalation and two with bilateral "deals". The scenarios are motivated by the so-called Rose Garden Truce

[11] In addition to the increased tariffs between the US and FTA partner countries, this removes reductions in other non-tariff measures friction, i.e., the average FTA effect found in gravity estimates between those countries.

[12] G. Felbermayr et al., 2024 estimate a coefficient of 0.366, yielding an increase of NTBs by $(exp(0.5 \cdot 0.366/\theta^k)$, where θ^k is the sectoral trade elasticity following Fontagné, Guimbard, and Orefice, 2022.

[13] We define as China and Russia-allied countries those countries, supporting Russia in the UN General Assembly concerning its invasion of Ukraine, and China concerning its human rights violations in Xinjiang.

between the EU and the US on July 25, 2018. That day, in the White House in Washington D.C., President Trump and EU Commission President Jean-Claude Juncker met for trade talks. Before the meeting, the US threatened to implement import tariffs on European cars, while the EU pondered introducing a digital sales tax targeting big tech firms from the US. Both measures would have been painful for each side. The presidents decided not to escalate the situation into a full-fledged trade war but, among other things, to eliminate tariffs on industrial goods. The meeting became known as the Rose Garden Truce. However, before the meeting, it was not obvious whether the Presidents would find a solution. After the deal, the US and the EU did not make progress in eliminating tariffs, possibly because the main US concern about EU protection, besides cars, is the sector of agricultural goods, which was left out in July 2018. So, if the same conflict comes up again, a replay could lead to different outcomes.

EU-US Scenario 1 (EU-US Escalation): This scenario simulates a **conflict** between the US and the EU, where the US imposes a 25% tariff on EU automobile exports, while the EU retaliates with a digital sales tax of 25% on US exports of digital services to the EU. We model the latter as a tariff on imports of digital services to the EU.

EU-US Scenario 2 (EU-US Deal – Manufacturing): This scenario models a potential "**mini-deal**" focused solely on manufacturing between the EU and the US, where both regions agree to eliminate tariffs on industrial goods. This simulates a partial trade agreement focused on the industrial sector, aiming to boost trade flows and reduce costs for manufacturers on both sides of the Atlantic.

EU-US Scenario 3 (EU-US Deal – Agriculture): In this scenario, the EU adopts the US tariff level vis-à-vis imports from the US for agricultural products. This reflects a potential trade deal where the EU reduces its agricultural tariffs from the current average of 11.4% to match the US average of 5.1%.

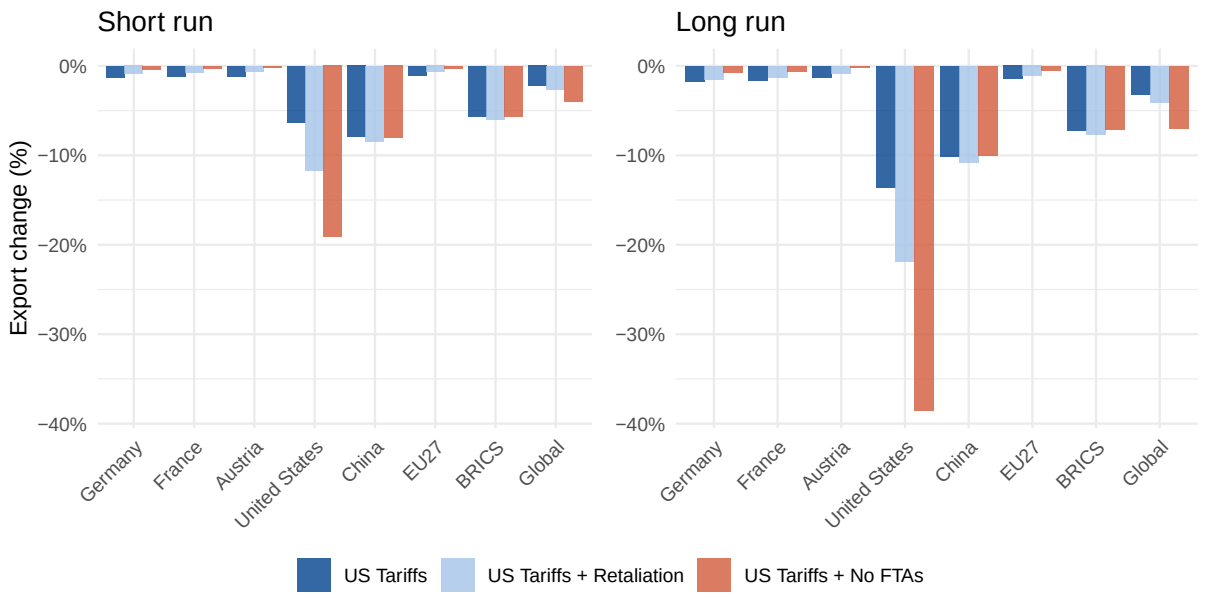
5.1 Results

Global Effects of US Policies

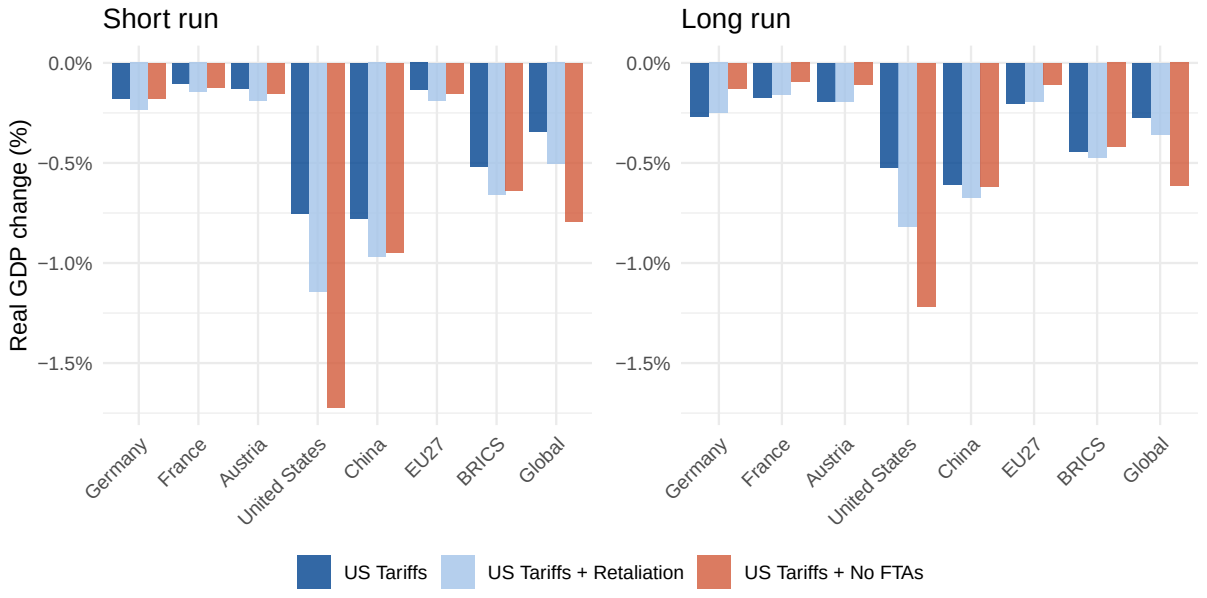
Figure 6 presents the changes in exports (top panel) and real GDP (bottom panel) across various countries and regions under three US policy scenarios.

Figure 6: Changes in exports and real GDP under US policy scenarios in the short and long run

(a) Change in exports



(b) Change in real GDP



Notes: Own simulation results obtained with the KITE model. Export changes are expressed in current US dollars.

The United States consistently experiences strong negative changes in exports across all scenarios.[14]

[14] This result is an example of the so-called Lerner symmetry, which states that an import tariff has the same effects

In the US Tariffs scenario (US Policy Scenario 1), where the US imposes tariffs on non-FTA partners, US exports decrease by -6.3% in the short run and -13.6% in the long run. In the US Tariffs + Retaliation scenario (US Policy Scenario 2), where affected countries apply retaliatory tariffs, the decline becomes more severe, with exports falling by -11.7% in the short run and -21.9% in the long run. Finally, in the US Tariffs + No FTAs scenario (US Policy Scenario 3), where tariffs are extended to all trading partners, US exports fall by a significant -19.1% in the short run and -38.6% in the long run. Real GDP in the US also shows notable declines, with the largest reduction of -1.7% in the short run and -1.2% in the long run in the US Tariffs + No FTAs scenario. These outcomes indicate that protectionist policies, while potentially benefiting certain industries, negatively impact the broader US economy, particularly when trading partners retaliate or are subject to increased tariffs.

China experiences pronounced export declines across these scenarios as well. Under US Tariffs + Retaliation (US Policy Scenario 2), Chinese exports drop by -8.5% in the short run and -10.8% in the long run. Real GDP for China also declines sharply, with the largest reduction of -0.97% in the short run in the same scenario, underscoring China's vulnerability to US trade restrictions, especially when coupled with retaliatory actions.

European countries, including Germany, France, and Austria, experience only very modest export declines in comparison across all US Policy Scenarios. Germany, for example, sees a -1.8% export decline in US Policy Scenario 1, while the EU average is slightly lower at -1.5%. Accompanying the moderate export losses, real GDP in the EU declines across all scenarios, yet more modestly than elsewhere, with decreases of 0.1% to 0.2%. These results indicate that the EU may be better shielded against US protectionist measures than other regions, as relative price competitiveness affects EU exports less, and the overall economy relies more heavily on intra-EU trade and supply chains, making it more resilient than commonly thought.

The BRICS economies see substantial export reductions, primarily influenced by China's response. In the US Tariffs + No FTAs scenario (US Policy Scenario 3), BRICS exports decrease by -5.6% in the short run and -7.1% in the long run. Real GDP also suffers, with the largest decrease of -6.6% in the short run under US Tariffs + Retaliation (US Policy Scenario 2), reflecting the BRICS economies' sensitivity to global trade disruptions.

Globally, exports decline across all scenarios, with the most significant reduction of -7% in the long run under US Tariffs + No FTAs (US Policy Scenario 3). Global real GDP also falls sharply, with the

as an equally sized export tax — hence reducing exports; see Costinot and Werning, 2019 or Itskhoki and Mukhin, 2023.

largest contraction of -0.79% in the short run under this scenario, indicating that while global trade volumes decrease, the broader economic fallout from tariffs and trade tensions also impacts overall global output.

Deterioration of Global Economic Cooperation

Figure 7 presents the impact of deteriorating global economic cooperation on total exports (top panel) and real GDP (bottom panel) across various countries and regions under three global scenarios.

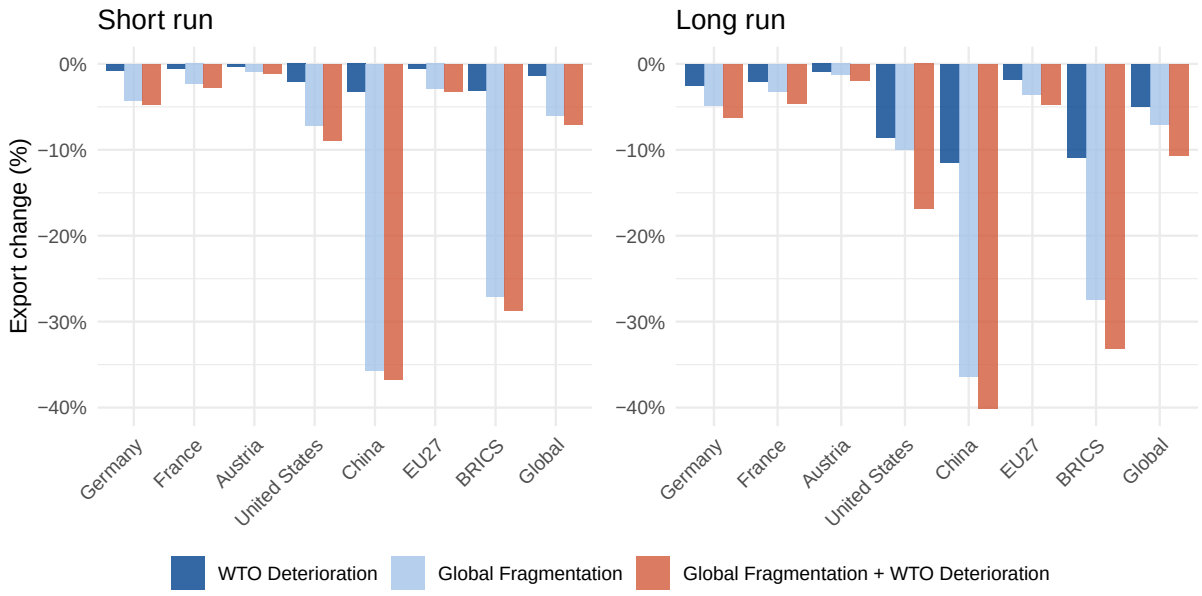
The United States experiences significant declines in exports across all scenarios. In the WTO Deterioration scenario, US exports decrease by -2.1% in the short run and -8.5% in the long run. The Global Fragmentation scenario causes US exports to fall even further, by -7.1% in the short run and -9.9% in the long run. The largest reduction occurs under the Global Fragmentation + WTO Deterioration scenario, with US exports dropping by -8.9% in the short run and -16.9% in the long run. Real GDP in the US also declines across these scenarios, with the largest reduction of -2.4% in the short run and -0.78% in the long run under Global Fragmentation + WTO Deterioration. This suggests that the US economy suffers considerably from the breakdown of global cooperation and increased trade barriers.

China faces substantial export losses across all scenarios. Under the WTO Deterioration scenario, Chinese exports decline by -3.3% in the short run and -11.5% in the long run. The Global Fragmentation scenario exacerbates these declines, with exports dropping by -35.7% in the short run and -36.4% in the long run. The most severe impact occurs in the Global Fragmentation + WTO Deterioration scenario, where Chinese exports fall by -36.8% in the short run and -40.1% in the long run. Real GDP in China similarly experiences sharp declines, with a reduction of -5.7% in the short run and -2.4% in the long run under the Global Fragmentation + WTO Deterioration scenario. These results highlight China's vulnerability to global fragmentation and its heavy reliance on integrated trade networks. While the numbers are a lot higher than those of other countries, they mirror previous results from Baqaee et al., 2024 and others who consistently show China to be more reliant on global value chains than other countries — leading to high costs of a breakdown of global trade relations.

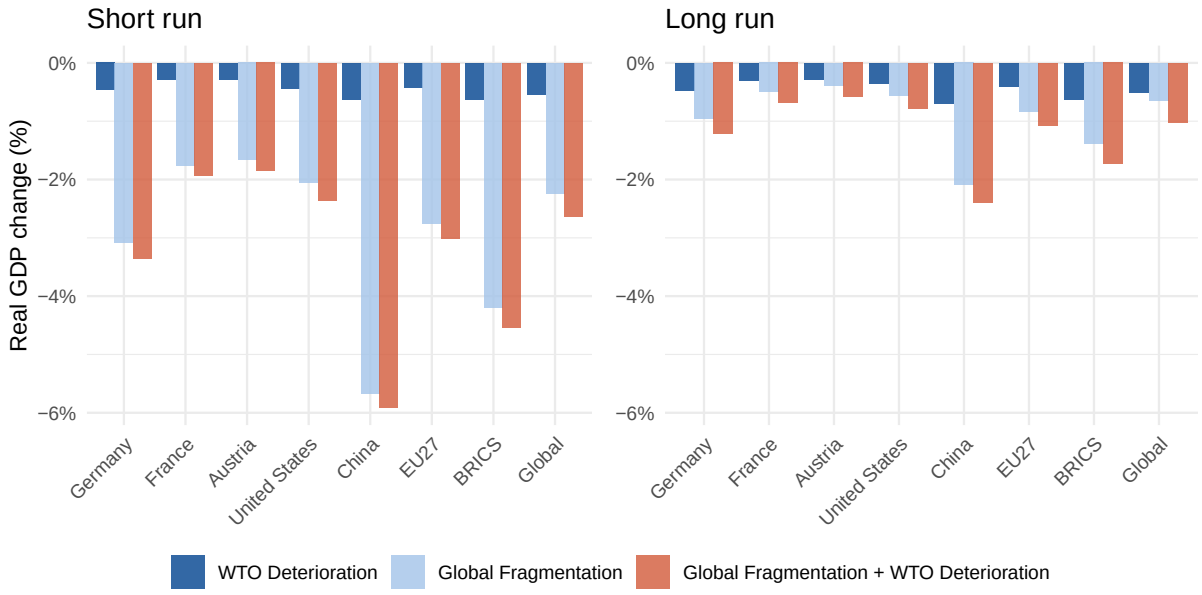
European countries, including Germany, France, and Austria, experience moderate export declines. In the WTO Deterioration scenario, Germany's exports fall by -0.7% in the short run and -2.5% in the long run, while Austria and France see declines of -0.3% and -2.0%, respectively. Under the Global Fragmentation scenario, Germany's export decline reaches -4.3% in the short run and -4.8%

Figure 7: Short- and long-run effect of deteriorating global cooperation on exports and real GDP

(a) Change in exports



(b) Change in real GDP



Notes: Own simulation results obtained with the KITE model. Export changes are expressed in current US dollars.

in the long run, while Austria and France face reductions of -0.9% and -3.2% in the long run. The Global Fragmentation + WTO Deterioration scenario leads to slightly larger export declines, with

Germany's exports down by -4.7% and France's by -4.6%. Mirroring these export declines, real GDP in the EU also falls, with Germany seeing the largest long-run reduction of -3.3% under Global Fragmentation + WTO Deterioration in the short run, and 1.2% in the long run. These results suggest that although EU exports are affected by deteriorating cooperation, the economic impact is somewhat cushioned by intra-EU trade networks. Notably — and of high policy relevance — is the result that these numbers are consistently higher than those in the first set of results simulating US protectionism — by a **factor of 2 to 4** — depending on the scenario and country in question. This means that European countries have much more to lose from a deteriorating global trading system, than from adverse US trade policies.

The BRICS economies see substantial declines in exports and real GDP, again driven by China to a large degree. In the WTO Deterioration scenario, BRICS exports fall by -3.1% in the short run and -10.9% in the long run. The Global Fragmentation scenario has an even larger impact, with export declines of -27.0% in the short run and -27.4% in the long run. The largest decline in exports occurs in the Global Fragmentation + WTO Deterioration scenario, where exports drop by -28.7% in the short run and -33.1% in the long run. Real GDP in the BRICS countries follows a similar downward trend, with the most significant reduction of -4.5% in the short run under Global Fragmentation + WTO Deterioration. These results highlight the BRICS economies' reliance on global trade and the challenges posed by a fragmented global economy.

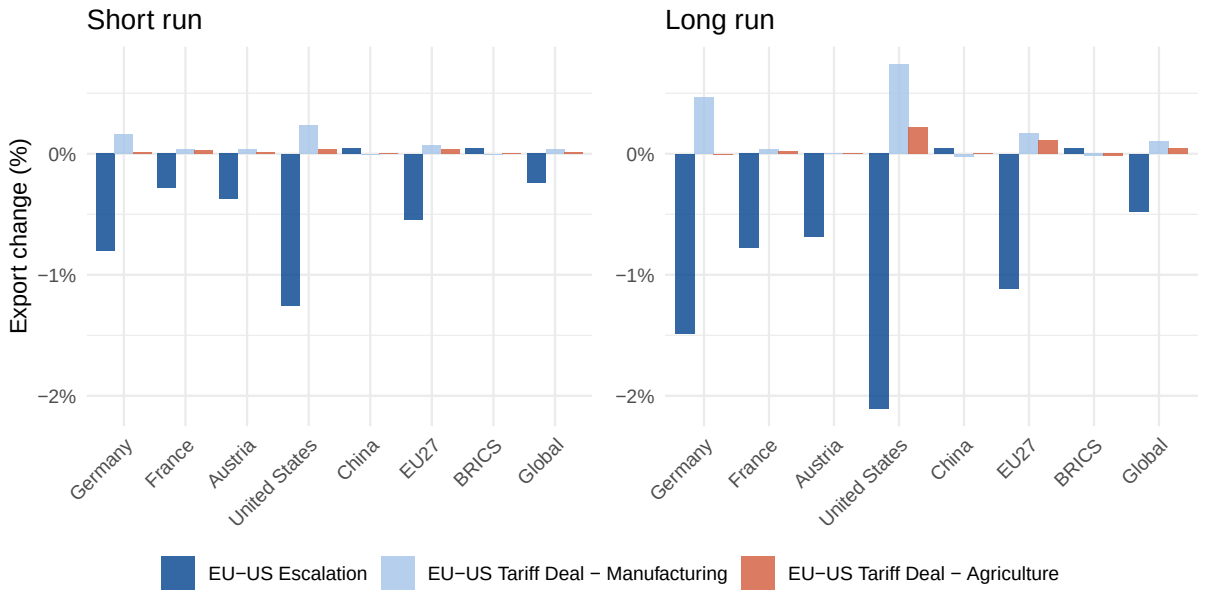
On a global scale, exports decline across all scenarios. In the WTO Deterioration scenario, global exports fall by -1.4% in the short run and -5.0% in the long run. The Global Fragmentation scenario results in a larger decline, with global exports decreasing by -6.0% in the short run and -7.0% in the long run. The most substantial reduction occurs under the Global Fragmentation + WTO Deterioration scenario, where global exports drop by -7.1% in the short run and -10.7% in the long run. Real GDP globally follows a similar pattern, with a short-run decrease of -2.6% and a long-run decrease of -1.0% in the Global Fragmentation + WTO Deterioration scenario. This indicates that, while individual countries may show varied results in terms of exports, the overall global economy suffers significantly from the breakdown of cooperation and increased protectionism.

EU-US Cooperation

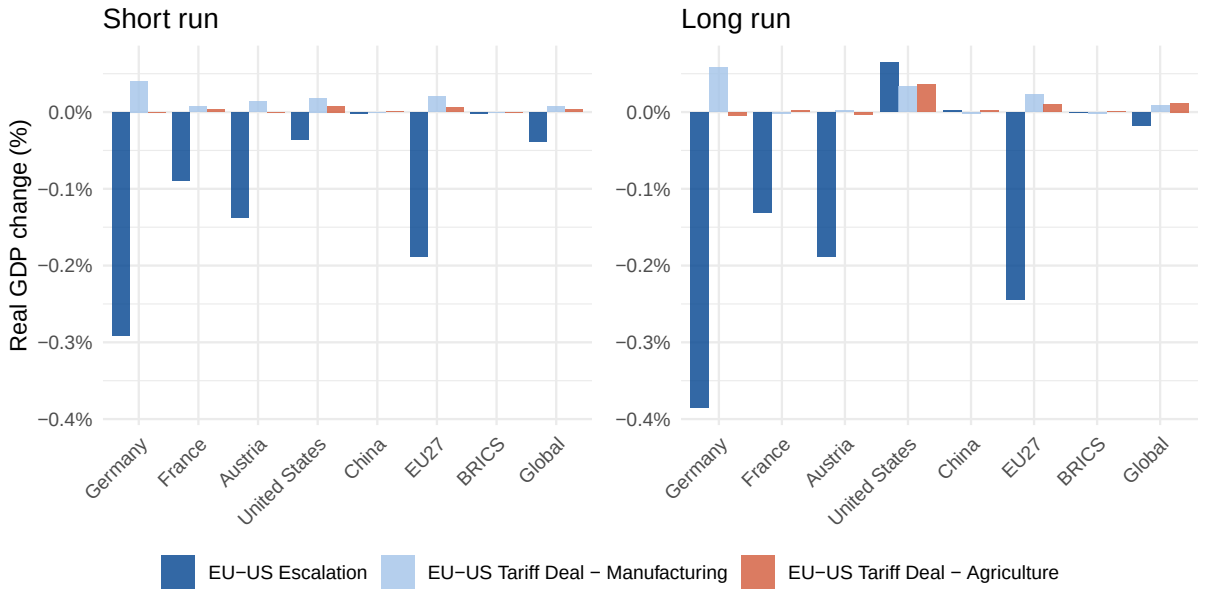
Figure 8 illustrates the impact of EU-US relations on total exports (top panel) and real GDP (bottom panel) under three scenarios: EU-US Escalation, simulating a conflict between the EU and US with

Figure 8: Short- and long-run effect of EU-US trade policies on exports and real GDP

(a) Short-run



(b) Long-run



Notes: Own simulation results obtained with the KITE model. Export changes are expressed in current US dollars.

digital services taxes and auto tariffs; EU-US Tariff Deal - Manufacturing, representing a potential "mini-deal" eliminating tariffs on industrial goods; and EU-US Tariff Deal - Agriculture, where tariffs

on agricultural products are reduced — a longstanding sticking point in EU-US trade relations.

In the EU-US Escalation scenario, where the EU imposes a digital services tax and the US retaliates with a 25% tariff on EU automobile exports, both regions experience declines in exports. US exports fall by -1.3% in the short run and -2.1% in the long run. The EU27 sees a decline of -0.5% in the short run and -1.1% in the long run, with Germany particularly affected, showing a drop of -0.8% in the short run and -1.5% in the long run, reflecting the importance of the automotive sector. Austria and France also experience export declines, with Austria seeing reductions of -0.4% and -0.7% and France experiencing drops of -0.3% and -0.8% in the short and long run, respectively. Real GDP in both regions also declines under the EU-US Escalation scenario. The EU27 sees a -0.19% reduction in the short run and -0.25% in the long run, while Germany's real GDP falls by -0.3% in the short run and -0.4% in the long run. Austria's GDP declines by up to 0.2% in the long run. The US shows a slight short-run real GDP decrease of -0.04%, but a marginal long-run increase of 0.06%, reflecting some gains in sectors shielded from EU competition.

In the EU-US Tariff Deal - Manufacturing scenario, where both regions eliminate tariffs on industrial goods, exports rise slightly. US exports increase by 0.23% in the short run and 0.74% in the long run. The EU27 also sees an increase, with exports up by 0.07% in the short run and 0.17% in the long run, with France and Germany benefiting more significantly in the long run, showing export increases of 0.34% and 0.47%, respectively. Austria's exports are effectively unchanged. Similarly, in terms of real GDP, the EU-US Tariff Deal - Manufacturing scenario has very modest but positive effects. Germany's real GDP rises by 0.04% in the short run and 0.06% in the long run, while the EU27 experiences slight gains of 0.02% in both time frames. The US also benefits ever so slightly, with a real GDP increase of 0.02% in the short run and 0.03% in the long run.

In the EU-US Tariff Deal - Agriculture scenario, where agricultural tariffs are reduced, export changes are generally small but positive. US exports increase by 0.04% in the short run and 0.21% in the long run. The EU27 sees similar modest gains, with exports increasing by 0.04% in the short run and 0.11% in the long run. Owing to the small share of the sector in their economies, changes in the exports of France and Germany remain minimal. For real GDP, the EU-US Tariff Deal - Agriculture scenario yields only very modest increases. US real GDP grows by 0.04% in the short run and 0.36% in the long run, while the EU27 shows smaller gains of 0.01% and 0.09%, respectively.

In all three scenarios, impacts on third countries, including BRICS economies and China, remain minor. Under the EU-US Escalation scenario, BRICS economies experience a minor export increase of 0.04% in both the short and long run, and China shows a similar export increase of 0.04% due to

trade diversion favoring non-EU suppliers. In the EU-US Tariff Deal - Manufacturing and Agriculture scenarios, BRICS and China experience slight export declines across both time frames, with BRICS exports falling by -0.02% and China by -0.01% in each case, reflecting a mild diversion toward increased EU-US trade. Globally, the impact on real GDP is minimal, with only slight variations across all scenarios.

Sectoral effects

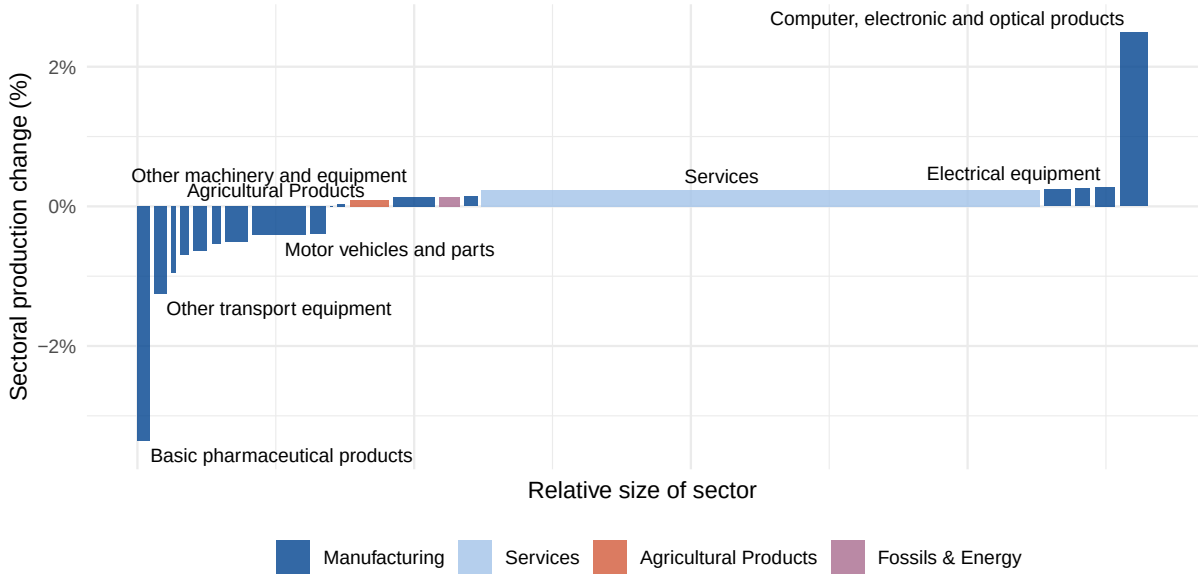


Figure 9: Sectoral production changes in Germany for US tariffs against all trading partners

The above results for selected economies and country groups can mask substantial heterogeneity across sectors within affected economies, especially in the scenarios affecting a broad array of sectors, like the US Policy and Global Scenarios. Figure 9 illustrates this for Germany, for the scenario where the US imposes comprehensive tariffs on all trading partners, including those with current FTAs. The long-run changes in sectoral production are mapped against each sector's current size in the economy, revealing distinct patterns: While the overall economy would contract by an average of 0.1% (see Figure 6b), several sectors would experience growth. Notably, services (+0.2%) and high-tech industries such as electrical equipment, computer, electronic, and optical products (+2.5%) show increases in economic activity. In contrast, key industries like automotive and pharmaceuticals would see moderate to sharp declines in output, ranging from -0.4% to -3.3%.

6 Policy Considerations

The protectionist turn in US trade policies poses a major challenge for EU policymakers. Various measures floated by Donald Trump and potentially a continuation of President Biden's approach by Kamala Harris confront the EU with threats to its economic performance and with difficult trade-offs. In the coming four years, the United States is likely to continue its relatively protectionist approach and its attempts to contain China.

The EU economy is highly exposed to changes in the trade policy regime of its most important bilateral economic partner, the US. It is threatened directly by tariffs or other protectionist measures targeting EU exporters, but most importantly, it would be adversely affected if the US continues to weaken the World Trade Organization (WTO) and to push toward a fragmentation of the world economy into a US-led and a China-led bloc. However, as under the first Trump administration, the US can be expected to engage in opportunistic deal-making with a few bilateral trade partners.

The EU is in a weak position, not because its bilateral economic relationship with the US would be highly imbalanced — European manufacturing exports to the US are exposed, but so are US services exports to the EU. Rather, the US holds a strategic threat point outside of the economic relationship: a potential withdrawal of assistance to Ukraine or, even worse, a weakening of security guarantees for Europe under NATO. To enhance strategic autonomy, the EU should prioritize defense investments and foster closer military cooperation among member states to reduce dependency on US security guarantees, thereby strengthening its negotiating position.

In a direct trade spat, where the US imposes tariffs on the EU's goods exports and the EU retaliates by imposing a digital services tax on its imports of US services, both economies would suffer reductions in their real GDPs in the short run, but the damage in the US would be substantially smaller than in Europe (-0.04% vs. -0.25%) and would even reverse sign in the long run. Thus, it makes sense for the EU to target US services industries in response to adverse US measures, as it did in 2018, but this strategy remains fragile and uncertain.

If the US and the EU were to conclude a trade agreement leading to zero tariffs on industrial goods, both would gain slightly in terms of real GDP. If agricultural goods were included as well, long-term gains would be slightly higher for the US and lower (yet still positive) for the EU. Against this backdrop, to avoid a costly trade war with the US, the EU should actively offer a limited trade agreement on industrial tariffs. This approach was already on the table in 2018 but has seen little

progress since then. Such a mini-deal would be much preferable for the EU compared to a tit-for-tat tariff escalation and could mitigate short-term GDP losses for the US. The agreement would serve as a key step in rebuilding transatlantic trust and deterring future protectionist escalations by the US, particularly if coupled with commitments to continued cooperation on trade standards and regulatory alignment.

The US is likely to request more European support in containing China in exchange for continued military help in Ukraine or, more broadly, for maintaining its strong presence in the EU through NATO. Economically, the EU has much more to lose from additional restrictions in the transatlantic relationship than from an intensified decoupling from China. Hence, while the EU would prefer to maintain its relationship with China, if pressured, it may have to side with the US. To preserve economic resilience, the EU should accelerate diversification efforts within Asia and other regions, allowing it to maintain a balanced relationship with China while safeguarding against potential US pressures. In order to maintain strategic room for maneuver, the EU must act much more quickly in building up its own military capabilities.

Finally, the EU and, in particular, Germany, would suffer significantly from a breakdown of the WTO or a fragmentation of the world economy into hostile blocs. The impact on real GDP is substantially greater than unilateral protectionist measures by the US, with effects up to 2 to 4 times larger. Given that fragmentation's impact on EU GDP is so much greater, the EU's highest priority must be to defend the world trade order, including efforts to bolster the WTO's authority and mechanisms.

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A Technical description of the KITE Model

The KITE model builds on Caliendo and Parro (2015) and its implementation is similar to that of Aichele, G. J. Felbermayr, and Heiland, 2014, Hinz and Monastyrenko (2022), and Chowdhry et al., 2024. There are N countries, indexed o and d, and J sectors, indexed j and k. Production uses labor as the sole factor, which is mobile across sectors but not across countries. All markets are perfectly competitive. Sectors are either wholly tradable or non-tradable.

There are L_d representative households in each country that maximize their utility by consuming final goods C_d^j in the familiar Cobb-Douglas form

$$u(C_d) = \prod_{j=1}^{J} C_d^{\alpha_d^j} \quad \text{with} \quad \sum_{j=1}^{J} \alpha_d^j = 1.$$

where α_d^j is the constant consumption share on industries j's goods. Household income I_d is derived from the supply of labor L_d at wage w_d and a lump-sum transfer of tariff revenues. Intermediate goods $\omega^j \in [0,1]$ are produced in each sector j using labor and *composite* intermediate goods from all sectors. Let $\beta_d^j \in [0,1]$ denote the cost share of labor and $\gamma_d^{k,j} \in [0,1]$ with $\sum_k \gamma_d^{k,j} = 1$ the share of sector k in sector j's intermediate, such that

$$q_d^j(\omega^j) = z_d^j(\omega^j) \left[l_d^j(\omega^j)\right]^{\beta_d^j} \left[\prod_{k=1}^{J} m_d^{k,j}(\omega^j)^{\gamma_d^{k,j}}\right]^{1-\beta_d^j}$$

where $z_d^j(\omega^j)$ is the overall efficiency of a producer, $l_d^j(\omega^j)$ is labor input, and $m_d^{k,j}(\omega^j)$ represent the composite intermediate goods from sector k used to produce ω^j. With constant returns to scale and perfectly competitive markets, unit cost are

$$c_d^j = \frac{\Upsilon_d^j w_d^{\beta_d^j}}{z_d^j(\omega^j)} \left[\prod_{k=1}^{J} (P_d^k)^{\gamma_d^{k,j}}\right]^{1-\beta_d^j}$$

where P_d^k is the price of a composite intermediate good from sector k, and the constant $\Upsilon_d^j = \prod_{k=1}^{J} (\gamma_d^{k,j} - \beta_d^j \gamma_d^{k,j})^{-\gamma_d^{k,j} + \beta_d^j \gamma_d^{k,j}} (\beta_d^j \gamma_d^j)^{-\beta_d^j \cdot \gamma_d^j}$. Hence, the cost of the input bundle depends on wages and the prices of *all* composite intermediate goods in the economy. Producers of composite intermediate goods supply Q_d^j at minimum costs by purchasing intermediate goods ω^j from the lowest

cost supplier across countries, so that

$$Q_d^j = \left[\int r_d^j(\omega^j)^{1-1/\sigma^j} d\omega^j\right]^{\sigma^j/(\sigma^j-1)}.$$

$\sigma^j > 0$ is the elasticity of substitution across intermediate goods within sector j, and $r_d^j(\omega^j)$ the demand for intermediate goods ω^j from the lowest cost supplier such that

$$r_d^j(\omega^j) = \left(\frac{p_d^j(\omega^j)}{P_d^j}\right)^{-\sigma^j} Q_d^j$$

where P_d^j is the unit price of the composite intermediate good

$$P_d^j = \left[\int p_d^j(\omega^j)^{1-\sigma^j} d\omega^j\right]^{1/(1-\sigma^j)}$$

and $p_d^j(\omega^j)$ denotes the lowest price of intermediate good ω^j in d across all possible origin locations, i.e.

$$p_d^j = \min_o \left\{p_{od}^j\right\}. \tag{1}$$

Composite intermediate goods are used in the production of intermediate goods ω^j and as the final good in consumption as C_d^j, so that the market clearing condition is written as

$$Q_d^j = C_d^j + \sum_{k=1}^{J} \int m_d^{j,k}(\omega^j) d\omega^j \tag{2}$$

Trade in goods is costly, such that the offered price of ω^j from o in d is given by

$$p_{od}^j = \phi_{od}^j \cdot \frac{c_o^j}{z_o^j(\omega^j)} \tag{3}$$

where ϕ_{od}^j denote generic bilateral sector-specific trade frictions. These can take a variety of forms — e.g. tariffs, non-tariff barriers, but also sanctions. In that case we can specify

$$\phi_{od}^j = \tau_{od}^j \cdot \kappa_{od}^j,$$

where $\tau_{od}^j \geq 1$ represent sector-specific ad-valorem tariffs and $\kappa_{od}^j \geq 1$ other iceberg trade costs. Tariff

revenue $(\tau_{od}^j - 1)$ is collected by the importing country and transferred lump-sum to its households.

Ricardian comparative advantage is induced à la Eaton and Kortum (2002) through a country-specific idiosyncratic productivity draw z^j from a Fréchet distribution.[15]

The price of the composite good is then given as

$$P_d^j = A^j \left[\sum_{o=1}^{N} \lambda_o^j (c_o^j \phi_{od}^j)^{-\theta^j} \right]^{-1/\theta^j} \tag{4}$$

which, for the non-tradable sector towards *all* non-domestic sources collapses to

$$P_d^j = A^j (\lambda_d^j)^{-1/\theta^j} c_d^j \tag{5}$$

where $A^j = \Gamma(\xi^j)^{1/(1-\sigma^j)}$ with $\Gamma(\xi^j)$ being a Gamma function evaluated at $\xi^j = 1 + (1-\sigma^j)/\theta^j$. Total expenditures on goods from sector j in country d are given by $X_d^j = P_d^j Q_d^j$. The expenditure on those goods originating from country o is called X_{od}^j, such that the share of j from o in d is $\pi_{od}^j = X_{od}^j / X_d^j$. This share can also be expressed as

$$\pi_{od}^j = \frac{\lambda_o^j (c_o^j \phi_{od}^j)^{-\theta^j}}{\sum_{h=1}^{N} \lambda_h^j (c_h^j \phi_{hd}^j)^{-\theta^j}} \tag{6}$$

Total expenditures on goods from sector j are the sum of the firms' and households' expenditures on the composite intermediate good, either as input to production or for final consumption

$$X_d^j = \sum_{k=1}^{J} (1 - \beta_d^k) \gamma_d^{j,k} \sum_{o=1}^{N} X_o^k \frac{\pi_{od}^k}{\tau_{od}^k \zeta_{od}^k} + \alpha_d^j I_d \tag{7}$$

with $I_d = w_d L_d + R_d + B_d$, i.e., labor income, tariff revenue and the aggregate trade balance. Sectoral trade balance is simply the difference between imports and exports

$$B_d^j = \sum_{o=1}^{N} X_{od}^j - X_{do}^j \tag{8}$$

and the aggregate trade balance $B_d = \sum_{j=1}^{J} B_d^j$, and $\sum_{d=1}^{N} B_d = 0$, with B_d being exogenously

[15] The productivity distribution is characterized by a location parameter λ_o^j that varies by country and sector inducing *absolute* advantage, and a shape parameter θ^j that varies by sector determining *comparative* advantage.

determined. The total trade balance can then be expressed as

$$\sum_{j=1}^{J}\sum_{o=1}^{N} X_d^j \frac{\pi_{od}^j}{\tau_{od}^j \zeta_{od}^j} - B_d = \sum_{j=1}^{J}\sum_{o=1}^{N} X_o^j \frac{\pi_{do}^j}{\tau_{do}^j \zeta_{do}^j}. \tag{9}$$

A counterfactual general equilibrium for alternative trade costs in the form of $\hat{\phi}_{od}^j = \phi_{od}^{j\prime}/\phi_{od}^j$[16] can be solved for in changes following Dekle, Eaton, and Kortum, 2008.

[16] I.e. where any variable $\hat{x}$ denotes the relative change from a previous value x to a new one x'.

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