Geopolitical Implications of the EU's Carbon Border Adjustment Mechanism

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Abstract

In July 2021, the European Union (EU) presented its proposed carbon border adjustment mechanism (CBAM). The CBAM is an important part of the European Green Deal to achieve carbon neutrality in the EU by 2050. Initially, the CBAM introduces a carbon price on EU imports in five sectors: aluminum, cement, electricity, fertilizer, and iron and steel. Carbon border adjustments — although complicated and costly to design and implement — reduce carbon leakage, shift the cost of abatement from countries with high emissions pricing to ones with low (or no) prices, and reduce competitiveness pressures on emissions-intensive and trade-exposed industries in high emissions-price countries. The EU's goal with the CBAM is to incentivize its trading partners to raise their climate ambitions and reduce the risk of carbon leakage to non-EU countries. This chapter analyzes the geopolitical impact of the CBAM as a normative and regulatory tool to incentivize environmental policy reforms in non-EU countries. However, international resistance immediately formed and this chapter focuses on the response of the EU's major trading partners in the five sectors: China, Russia and Turkey. We argue that the EU has limited leverage over these countries as geopolitical relations and self-interests differ significantly. We investigate how the draft CBAM regulation was received by public and private stakeholders in China, Russia and Turkey. We conclude that, in order to prevent retaliatory actions — for example in the form of legal disputes at the World Trade Organization — the EU needs to deliver concrete strategies that mitigate the potential impacts on its trade relationships, particularly with developing countries.

Keywords: CBAM, European Green Deal, normative power, carbon leakage, international trade, geopolitical relations, climate change, emissions reduction strategies, EU environmental policy, Paris Agreement.

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Introduction

The Paris Agreement is an outcome-focused environmental treaty, which aims to keep the global average temperature increase below 2 degrees Celsius, preferably 1.5, compared to pre-industrial levels (United Nations, 2021). However, it does not prescribe how signatories should achieve this outcome. The targets and measures are voluntary and vary widely across countries. Numerous industrialized countries have implemented emissions reduction policies in the absence of concerted global action. Such disproportionate emissions-reduction efforts may lead to the relocation of economic activity to countries that do not have or have less-stringent climate policies leading to limited reductions in global emissions — carbon leakage.

To prevent this and encourage decarbonization outside of its borders, on July 14, 2021, the European Commission (EC) released a regulatory proposal for a carbon border adjustment mechanism (CBAM) (European Commission, 2021d). The draft CBAM regulation proposes an emissions tax payable on aluminum, cement, electricity, fertilizer, and iron and steel imported by the European Union (EU).[1] In this chapter, we explore reactions to the draft CBAM regulation by public and private stakeholders within the EU and its main trading partners in the affected sectors (China, Russia, and Turkey) on the regulation's design, feasibility and fairness.

The CBAM would affect the EU's trading partners differently; the regulation will initially apply to a select number of emission-intensive industries at high risk of carbon leakage. Although the EU states the CBAM is a measure to prevent carbon leakage, the geopolitical implications of the CBAM for the EU may be significant since the EU is the main market for emission-intensive goods from major exporters like China and Russia. We rely on international trade statistics to identify the EU's trading partners that would be most affected by the CBAM and to guide the focus of our discussion on the geopolitical implications of the proposal.

The CBAM proposal is the EU's attempt to use its normative and regulatory power[2] to incentivize climate policy reforms in third countries.[3] However, we argue that the EU's normative and regulatory power is limited, particularly in China and Russia due to sensitive geopolitical

[1] Affected industries are aluminum, cement, energy, fertilizers, and iron and steel. A full list of emissions covered by the draft regulation for each individual industry is published by the EC (European Commission, 2021a). For all five industries, the focus is on carbon dioxide (CO_2) but fertilizers also include nitrous oxide and aluminum includes perfluorocarbon (PFC) emissions.

[2] See Manners (2002); Pace (2007).

[3] "Third countries" are neither in the EU nor the European Economic Area which includes Iceland, Liechtenstein and Norway. Switzerland would also be exempt from a CBAM because it has a bilateral trade agreement with the EU.

relations which have been greatly affected following Russia's invasion of Ukraine on February 24, 2022. Furthermore, the EU faces internal frictions as individual member states and industry leaders aim to reformulate the CBAM proposal. We investigate how the draft CBAM regulation was received by public and private stakeholders in China, Russia and Turkey. We also discuss the internal conflict between the EU Commission and the member states before analyzing the potential resistance of China, Russia and Turkey against the CBAM proposal.

In the next section, we outline the specifics of border carbon adjustment (BCA) regulations before discussing the details of the EU's CBAM. We then present our conceptual framework. The framework relies on the concept of normative power (Manners, 2002) to explain the CBAM's potential role in incentivizing climate policy reforms in third countries. We proceed with discussing the geopolitical implications of the CBAM for the relationship between the EU with China, Russia, and Turkey while considering the role of the EU as a normative power in environmental world politics. We conclude that the EU needs to initiate bilateral conversations with its main trading partners on the framing and purpose of this regulation in order to prevent retaliatory actions and erosion of trust.

Purpose of Border Carbon Adjustments

Uncoordinated actions to reduce global emissions and the transboundary nature of greenhouse gas (GHG) emissions mean differences in environmental regulations may undermine achieving the Paris Agreement target. The outcome of these differences in regulations is of particular concern for the EU and other parties to the Paris Agreement implementing ambitious emissions-reduction policies. More strictly regulated firms in countries with stringent emissions-reduction regulations may decrease output as they lose competitiveness in domestic or global markets compared to less strictly regulated firms, or relocate to countries with weaker or no environmental standards. The resultant increase in emissions in part offsets the emissions reduction in strictly regulated countries, leading to cross-border carbon leakage. Leakage is central to the policy debate on unilateral emission regulations; particularly for emissions-intensive and trade-exposed industries where emissions-intensive inputs represent a significant share of total production costs.

In response to such concerns, a border carbon adjustment (BCA) is a policy option to 'level the playing field' in international trade. As a duty on emission-intensive goods, a BCA discourages imports. As an alternative to globally coordinated measures, a BCA, although complicated and

costly to design and implement, limits carbon leakage by shifting part of the economic burden to countries with less stringent emission-regulations.[4] BCAs are also a coercive tool to incentivize or pressure trade partners to adopt more-stringent environmental policy.

The EU's main motivation in proposing the CBAM is to minimize the risk of carbon leakage by equalizing the cost of carbon between imported and domestically produced goods. The CBAM would cover mainly direct CO_2 emissions embedded in imported goods to make trading partners face an emissions price similar to what they would face if they produced the same goods in the EU. The EU is not the only jurisdiction considering a BCA. Notably, as Droege and Fischer (2020, p. 30) point out "nearly every example of draft climate legislation circulating in the US Congress includes BCA." The state of California has a BCA that applies to emissions from electricity imported from other U.S. states (McWilliams & Tagliapietra, 2021). In 2020, Canada also announced its intentions to explore a BCA and released an initial assessment report in August 2021 (Department of Finance, 2020). If the EU adopts the CBAM, it will apply to imports into the EU27, the European Economic Area (EEA) and Switzerland.[5]

Cornerstones of the EU's Draft CBAM Proposal

The CBAM is part of the broader "Fit for 55" climate plan which aims to reduce the EU's net emissions at least 55% below 1990 levels by 2030 through a set of proposals that is supposed to deliver on the EU's climate goals from the 2019 European Green Deal (European Commission, 2019).[6] The EC, as the executive branch of the EU, pledged to achieve net zero emissions by 2050 (European Commission, 2021c). The CBAM is one element among 13 policies presented in the

[4] Leakage-prevention is only partial, as a BCA protects domestic production's internal market share from lower-cost imports (where the cost difference is from less stringent environmental policy elsewhere). A complimentary tool that protects domestic firms' international and domestic competitiveness is an output-based pricing system, which provides an output subsidy to emissions-intensive and trade exposed production, mitigating the costs of environmental policy. See Droege & Fischer (2020).

[5] According to the draft proposal (European Commission, 2021d), the CBAM will apply to imports into EU27 (Austria, Belgium, Bulgaria, Croatia, Republic of Cyprus, Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Poland, Portugal, Romania, Slovakia, Slovenia, Spain and Sweden), the members of the European Economic Area (EU27 plus Iceland, Norway and Liechtenstein) and Switzerland. Note that the UK is no longer part of the EU and there is no clear indication if the UK (plus Northern Ireland) will be exempt at this point.

[6] According to the EC, the European Green Deal will "transform the EU into a fair and prosperous society, with a modern, resource-efficient and competitive economy where there are no net emissions of greenhouse gases in 2050 and where economic growth is decoupled from resource use" (European Commission, 2019, p. 2). The Green Deal is a holistic policy program focusing on areas including climate, energy, agriculture, industry, environment and oceans, transport, finance and regional development, and research and innovation.

"Fit for 55" plan. Details on many of these measures and policy objectives remain vague since the EC has not yet released the corresponding amendments. However, as highlighted in the documents issued by the EC, the CBAM would reduce the risk of carbon leakage and ensure a level playing field for select EU industries by equalizing the price of emissions between domestic products and imports.

Initially, the CBAM will have restricted coverage and apply to five industries with a relatively higher exposure to emissions pricing and international trade: aluminum, cement, fertilizer, iron and steel, and electricity generation. The emissions from these accounted for about 55% of all industrial emissions in the EU27 in 2020 (European Commission, 2021b). Iron and steel production is the highest emitter at 30% of industrial emissions. Aluminum emits the lowest amount of direct emissions due to its reliance on electricity. The EC (European Commission, 2021b, p. 43) states, "looking at total CO_2 equivalent emissions, CBAM sectors together with electricity generation accounted for nearly 40% of emissions in 2020." Currently, there is no timeline for including indirect emissions as the EU Commission "will evaluate how the CBAM is working and whether to extend its scope to more products and services – including down the value chain, and whether to cover so-called 'indirect' emissions" (European Commission, 2021d, p. 41)[7]. However, the European Parliament proposed an amendment that "by 31 December 2023 the Commission shall present a report to the European Parliament and the Council containing a calculation method to enable the extension of the scope of embedded emissions to indirect emissions and an impact assessment of that extension" (European Parliament, 2021, p. 37).

The Commission shall collect the information necessary with a view to extending the scope of the regulation to indirect emissions and goods other than those listed in Annex I, and develop methods of calculating embedded emissions based on environmental footprint methods. Since the CBAM would cover imports' direct emissions, it complements the internal emissions-pricing scheme of the EU, the EU ETS. For the industries subject to the EU ETS, total emissions are capped, and industrial facilities buy or receive allowances that cover their emissions. Although the allowances are in principle sold through competitive auctions, some industries receive free allowances to adjust for competitiveness pressures from non-EU producers; the number of free allocations is declining over time (Dobson & Winter, 2018). Under the draft CBAM proposal, the

[7] Indirect emissions refer to "emissions from the production of electricity, heating and cooling, which is consumed during the production processes of goods" (European Commission, 2021d, p. 28).

auction price of the ETS allowances determines CBAM certificates' price and when ETS free allowances are eliminated in 2035, the CBAM will apply to all the industries currently covered by the ETS.[8]

The EU envisions a transitional phase between 2023 and 2025 to navigate the tradeoffs between the objectives and the proposal design. An outstanding question is to what extent the EU member states can come to an agreement during negotiations in the European Parliament (EP). Conflict and debates about the CBAM proposal are likely to emerge during the time-consuming negotiations between the EC and the EU member states (Imeri & Barzilska, 2021). This means that the EU's current proposed dates may not be realistic from an administrative and practical perspective given the lengthy legislative processes. This includes an assessment of including indirect emissions in the CBAM. Determining emissions embedded in imports will depend on the chosen mechanism. Under the EU ETS, the covered facilities are subject to a price based on their actual emissions and for fair treatment, the scope of the CBAM may be the same. However, this entails a significant administrative cost on both the importers and the implementing bodies in the EU. Establishing a default average emission-intensity value for each industry or product is another option considered by the EU, which would reduce the costs associated with the management of the system and the accuracy of the CBAM as a tool to level the playing field.[9]

During COP26, Frans Timmermans (the EC's Vice President) explained that the EU "will increasingly create a space across the planet where countries will take comparable measures to decarbonize their economies which will make the CBAM not necessary or only in a limited way" (Timmermans, 2021). This could imply the formation of a "climate club" whereby countries agree to cap emissions, or the EU could grant exemptions from the CBAM to countries that implement a national mechanism to price or cap emissions. The more countries adopt climate policies to limit emissions, the less likely a CBAM will be necessary to prevent carbon leakage (Burke, 2021). However, the reactions of industry proponents and third countries that we discuss in this chapter show the CBAM's implementation is uncertain.

[8] The EU ETS covers emissions from the following industries: electricity and heat generation; energy-intensive sectors including oil refineries, steel works, and production of iron, metals, cement, lime, glass, ceramics, pulp, paper, cardboard, acids and bulk organic chemicals; and commercial aviation within the EEA. It also includes nitrous oxide (N_2O) from production of nitric, adipic and glyoxylic acids and glyoxal; and PFCs from production of aluminium (European Commission, 2021a).

[9] For a discussion of the challenges of implementing BCAs, see Böhringer et al. (2022).

The Normative Power of the EU and its role as a "Climate Leader"

Manners' (2002) concept of normative power(Manners, 2002) illustrates the EU's external relations, which are influenced by a set of normative principles and shared beliefs that form the core of the EU's self-understanding and are codified in EU legislation and laws.[10] Wunderlich (2020, p. 1109) argues that the EU "aims to establish itself by differentiation, that is, as a different kind of power and a force for collective good". The EU achieves this through promotion of its universal values and shared interests, alongside the powers of attraction and persuasion of third countries (Manners, 2002). Based on the European Green Deal, Eckert (2021, p. 2) identifies several environmental and social norms that the EU aims to "diffuse" through policy reforms in third countries: climate neutrality, zero pollution, a circular economy and a "just transition both inside the EU and globally".

Pace (2007) presents several mechanisms the EU uses to exert political and economic pressure on third countries: dialogue, bilateral contractual relations (or politically binding agreements), and specific policy initiatives in key areas like energy. Several scholars discuss the role of the EU as a "global climate leader" in climate change mitigation policy (Parker et al., 2017; Parker & Karlsson, 2017; Torney, 2019). Parker and Karlsson (2017) emphasize that throughout the last two decades, the EU spearheaded several initiatives (like the 20-20-20 targets[11]) and continues to be a main supporter of the Paris Agreement.

Lütz et al. (2021, p. 206) find that the EU "has been perceived as an environmental pioneer at the international level" and that the EU "has developed a leading position in the emergence of the climate regime and has provided significant impetus for further development". This is remarkable because climate policy is a shared competence between the EU Commission and the EU member states which means that the EU member states must unanimously agree on policies. However, the EU "is considered to be one of the most important actors in international climate policy" through its "professionalized negotiation structure" which places the EU in a strong negotiation position vis-a-vis its member states (Lütz et al., 2021, p. 206). Currently, the EP proposes that the EU "may conclude agreements with third countries with a view to take account

[10] The EU's "normative basis" builds on five core norms: peace, liberty, democracy, rule of law, and respect for human rights (Manners, 2002, p. 242).

[11] In December 2008, the EU adopted a climate and energy package targeting GHG reductions of 20% below 1990 levels, increasing EU energy efficiency by 20%, and 20% of energy consumption from renewable sources, was all by 2020 (Peña & Rodríguez, 2019).

of carbon pricing mechanisms and carbon reduction measures of equivalent efficiency other than carbon pricing mechanisms" (European Parliament, 2021, p. 21).

In this chapter, we argue that, as reflected by reactions to draft proposal, while the CBAM may induce emissions-reduction strategies in third countries, its success in incentivizing climate policy adoption relies on the normative power of the EU. Figure 1.1 presents a timeline of the key events shaping reactions to the CBAM.

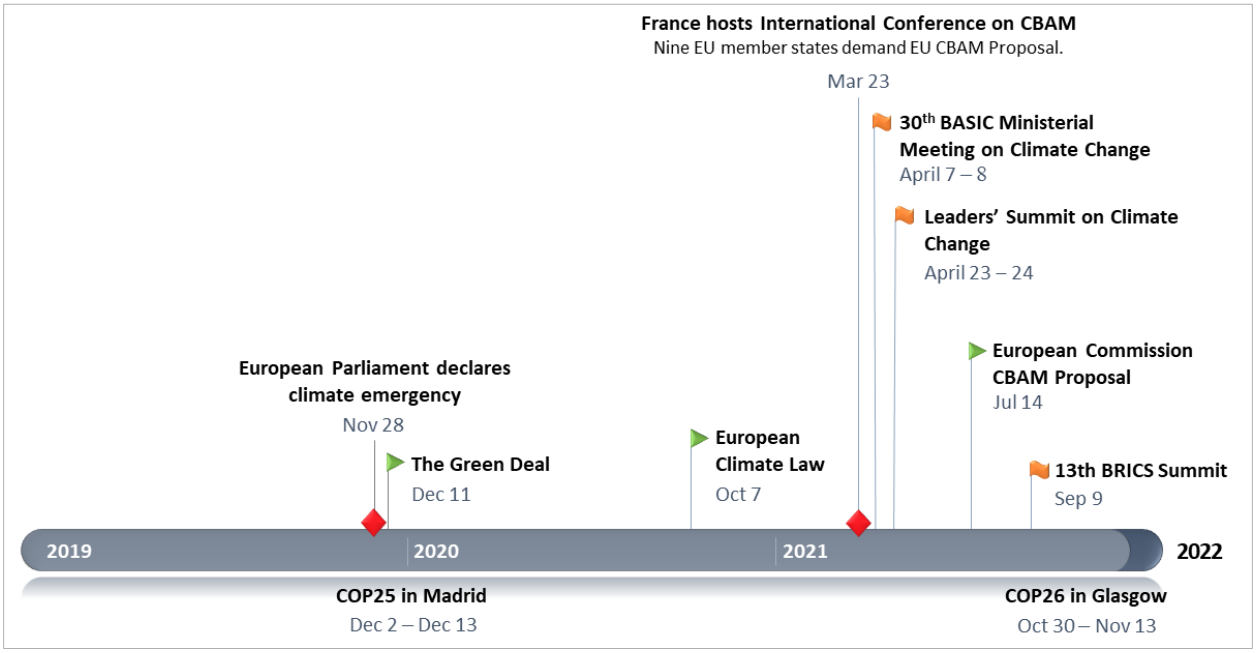

Figure 1.1. Timeline of International Key Events related to the EU Commission's CBAM Proposal 2019–2021.

Source: Prepared by Authors.

While the reactions expressed during these events imply the normative power of the EU, internal and external forces, manifested through the economic interests of public and private stakeholders, compel the EU to deliver concessions to third countries. These concessions undermine the normative power of the EU and the multilateral participation necessary to achieve Paris Agreement targets. Next, we present the reactions to the draft CBAM proposal in the EU and by its main trading partners.

Reactions of the EU member states and industry leaders to the draft CBAM proposal

Since the CBAM is a climate policy potentially affecting trade flows, it is likely to incite intense geopolitical debates among EU members, industry proponents, and the EU's main trading partners. All 27 EU member states are expected to defend their national interests during the negotiations, which will be influenced by the effects on their domestic industries. Several EU member states, like Finland (Kuusi et al., 2020) and France (Ministry for Europe and Foreign Affairs, n.d.), have already commissioned reports on the potential domestic effect of the CBAM, and these reports may indicate the direction of their vote on the proposal in the EC. Another example is the European Automobile Manufacturers' Association (ACEA), which announced its expectations for the regulation, including maintaining the industry's global competitiveness and avoiding retaliation from third countries (ACEA, 2021).

On March 23, 2021, several cabinet ministers from nine EU member states[12] coauthored an op-ed calling on the EC to develop a CBAM proposal that ensures non-discrimination and a "good articulation with the EU ETS which could mirror the European carbon market" (Blümel et al., 2021). On the same day, France held an international conference discussing design and implementation of a potential CBAM. France holds the Presidency of the Council of the European Union from January to June 2022 and has declared that a priority is developing a governance and implementation framework for the CBAM (Ministry for Europe and Foreign Affairs, n.d.). In April 2020, France proposed its own expectations for the CBAM (Table 1.1.).

As a large economy within the union, Germany's reaction to the CBAM is important for the proposal's success. German industry proponents, like the Federation of German Industries (BDI), argue that central design and implementation questions remain unanswered in the CBAM proposal, such as exemption criteria. Similarly, Chief Executive Wolfgang Große Entrup of Germany's Chemical Association stated that "it is not enough [for the EU] just to be a role model for the world" but rather, the CBAM must uphold Germany's industrial competitiveness (Kurmayer, 2021). In general, German industry leaders expressed concerns regarding the proposal and that they would prefer the status quo of the EU ETS. EU industry leaders claim that the CBAM

[12] Cabinet ministers from the following EU members authored the op-ed: Austria, Czech Republic, Denmark, France, Lithuania, Luxembourg, Slovakia, Spain, the Netherlands.

"only protects companies within the EU and is associated with considerable legal and bureaucratic hurdles" (Kurmayer, 2021). There is strong internal resistance to the CBAM proposal among EU-based private stakeholders.

French CBAM Proposal delivered to the European Commission in April 2020
• "Require those importing goods from outside the EU to acquire specific carbon quotas from a market mirroring the EU Emissions Trading System (EU ETS)".
• "Gradually replace the system of free allocation of ETS allowances following a transitional phase that would run until 2025".
• "Initially select a limited number of pilot sectors, including the highest-emitting activities and those most exposed to the risk of carbon leakage, such as steel and cement".
• "Consider the climate policies of third countries and their level of development in the design of the mechanism".
• "Provide a solution, in the form of compensation, to the issue of exporting sectors, to limit carbon leakage on other markets".

Table 1.1. French CBAM Proposal delivered to the European Commission in April 2020.

Source: Quoted from Ministry for Europe and Foreign Affairs, n.d.

Global Implications of the CBAM – Reactions from the EU's Main Trading Partners

The draft CBAM proposal also sparked significant reactions from the EU's main trading partners. As shown in Table 1.2., China, Russia and Turkey are important trading partners in the five potentially affected sectors. These three countries are not the main trading partners in all five sectors, but are in the top three for at least two of the sectors.

EU Imports' County of Origin for CBAM-affected Industries, 2019								
Aluminum	Norway 3,116 18%	Russia 2,425 14%	China 1,545 9%	United Arab Emirates 1,206 7%	Switzerland 1,170 7%	UK 1,078 6%	Turkey 1,059 6%	Iceland 1,046 6%
Cement	Turkey 106 35%	Colombia 26 9%	Ukraine 24 8%	Belarus & Herzegovina 22 7%	Bosnia 14 5%	Morocco 10 4%	China 2 1% (18th)	Russia 0.7 <1% (29th)
Electricity Generation	Switzerland 709 21%	Russia 613 18%	Norway 483 14%	Serbia 478 14%	Ukraine 323 10%	Bosnia 242 7%	Turkey 56 2% (10th)	China n/a
Fertilizer	Russia 1,492 34%	Egypt 451 10%	Algeria 420 10%	Morocco 355 8%	Belarus & Herzegovina 209 5%	Trinidad & Tobago 192 4%	Turkey 89 2% (11th)	China 67 2% (15th)
Iron and Steel	China 4,876 14%	Russia 4,740 14%	Turkey 4,262 12%	UK 3,674 10%	Ukraine 2,726 8%	South Korea 2,528 7%	India 2,495 7%	Switzerland 1,266 4%

Table 1.2. Main Sources of Imports (Import Value (in million €) and Share of Total Industry Imports by value, 2019)

Source: Trade data for 2019 is from Eurostat Comext "EU trade since 1988 by HS2,4,6 and CN8" Available from: https://ec.europa.eu/eurostat/web/international-trade-in-goods/data/focus-on-comext. Product codes from Annex I of https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=celex:52021PC0564.
Note: We use 2019 data given the supply chain disruption from the COVID-19 pandemic may have affected more current trade statistics.

The draft CBAM proposal lacks detail on crucial design elements, such as crediting trade partners' climate action. Nevertheless, the potential CBAM immediately prompted strong reactions from several third countries (Gläser & Caspar, 2021); see Table 1.3.

CBAM Criticisms by the EU's Main Trading Partners		
Protectionism	**Revenue Generator**	**Unilateral decision-making**
• Allegedly protectionist and a trade barrier under a climate pretext. • Competitiveness of domestic industry.	• CBAM revenues could be seen as income for the overall EU budget. • Funds from less affluent countries redirected into the EU.	• The EU failed to consult with third country trading partners. • Accusation of acting on a unilateral basis.

Table 1.3. Main Criticism of the CBAM by the EU's main trading partners.

Source: Adapted from "Less confrontation, more cooperation". Gläser, A. and Caspar, O. (2021). *Germanwatch – Policy Brief*. Available from: https://germanwatch.org/en/20355

In a joint statement responding to the CBAM, China, South Africa, Brazil, and India expressed "grave concern" (Republic of South Africa, 2021). These four countries argue that BCAs are, in general, discriminatory according to the principles of Equity and Common but Differentiated Responsibilities and Respective Capabilities[13] (Republic of South Africa, 2021). Under these principles, industrialized countries should be championing emission reduction strategies by also supporting developing and least-developed countries (LDCs).

Moreover, although the EU claims the CBAM was designed in compliance with WTO rules, scholars emphasize that a CBAM may be considered protectionist by the EU's trading partners and thus contradict WTO rules, in particular the General Agreement on Tariffs and Trade (Kolev et al., 2021). Therefore, EU trading partners may impose retaliatory measurements against the EU in order to express their discontent with such policies. This could also prompt judicial challenges, if third countries formally complain to the WTO against the CBAM (Mehling, 2019).

Before examining the individual reactions of China, Russia and Turkey to the EC's proposal, we discuss the countries' respective emissions reduction policies. This provides

[13] These principles are outlined in the 1992 United Nations Convention on Climate Change: "The Parties should protect the climate system for the benefit of present and future generations of humankind, on the basis of equity and in accordance with their common but differentiated responsibilities and respective capabilities. Accordingly, the developed country Parties should take the lead in combating climate change and the adverse effects thereof" (United Nations, 1992, p. 4).

important context for their current climate change mitigation objectives, which will form a basis for their negotiations with the EU (Table 1.4). China's national ETS differs significantly from the EU's in terms of implementation and sector applicability. Russia is developing a pilot ETS on the island of Sakhalin; however, it remains unclear if Russia will extend this pilot program nationally. Turkey is considering implementing an ETS; however, its proposal from December 2020 has yet to turn into legislation (ICAP, 2021). Although all three countries are at initial stages, China and Russia are among the largest global emitters of GHGs, in addition to the US, the EU and India (Friedrich et al., 2020). Thus, emissions-reducing efforts from these countries are particularly relevant for meeting Paris Agreement targets. The lack of consistency between national emissions-reduction policies also emphasizes the challenge for the EU to introduce a CBAM which would exempt third countries based on measures of "equivalent efficiency" (European Parliament, 2021, p. 8).

Status of Emissions-Reduction Policies			
Jurisdiction	**China (NATIONAL ETS)***	**Russian Federation – Sakhalin**	**Turkey**
Status	In force (since mid-2021)	Under development	Under consideration
Total GHG emissions	12,301 $MtCO_2e$ (2014)	2220.1 $MtCO_2e$ (2018)	520.9 $MtCO_2e$ (2018)
GHG Reduction Target	CO_2 peak before 2030; neutrality by 2060.	Emissions will not exceed 70% of 1990s levels by 2030.	Up to 21% reduction from 2021 levels by 2030.
GHG covered	CO_2	No information available.	No information available.
Sectors	Power sector. In the long-term, expected to cover nine industries: power, cement, aluminum, iron and steel, nonferrous metals, petroleum refining, chemicals, pulp and paper, and aviation. There is no specific timeline for this expansion.	No information available.	No information available.
Point of Regulation	Expected to cover both direct and indirect emissions from power generation.	No information available.	No information available.
Number of entities	The regional ETS pilot covered power sector entities, which may also fall under the national ETS. These entities are transitioning into the ETS national market.* Estimate: 2,225 facilities (2021).	No information available.	No information available.

Cap	No absolute cap on emissions. The cap is adjusted ex-post based on actual production levels. Monitors intensity, meaning a regulated plant receives more permits if it produces more output. The national ETS is estimated to have a cap of over 4,000 $MtCO_2$/year for 2021.	No information available.	No information available.
Permit Allocation	Free allocation based on four distinct fuel-based benchmarks: conventional coal plants below 300MW; conventional coal plants above 300MW; unconventional coal plants; and natural gas. Entities will receive allowances at 70% of their 2018 output multiplied by the corresponding benchmark factor. Allocation will be adjusted later to reflect actual generation in 2019 and 2020. The National Measures clarify that auctioning may be introduced at a later point in time which has not been determined.	No information available.	No information available.

* China has the following regional ETS pilots: Beijing; Chongqing; Fujian, Guangdong, Hubei, Shanghai, Shenzhen, Tianjin.

Table 1.4. Status of Emissions Trading Systems in China, Russian Federation, and Turkey.

Source: Adapted from "Comparing ETS – China-Russia-Turkey". *International Carbon Action Partnership (ICAP*), 2021. Available from: https://icapcarbonaction.com/en/ets-map

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China

China faces significant potential exposure to the CBAM, since the EU is China's biggest trading partner. In 2019, 13% of China's total trade (imports and exports, in value) was with the EU (Table 1.5). The EU is China's largest source of imports and second largest export market following the US, particularly for iron and steel. In 2019, the EU was the destination of 13.8% of China's total exports and the industries covered by the current CBAM proposal represent about 1.9% of China's exports to Europe, in value. China's greatest exposure is in the aluminum and iron and steel sectors.

	Exports		Imports		Total	
Global	2,231,223		1,847,573		4,078,795	
EU	308,843		225,590		534,433	
EU Share	13.8%		12.2%		13.1%	
	Value of Exports	**Sector Share of Total Exports**	**Value of EU Exports**	**EU Share of Sector Exports**	**Sector's EU Exports as Share of EU Exports**	**Sector's EU Exports as Share of Total Exports**
Aluminum	13,627	0.61%	1,483	10.88%	0.48%	0.0665%
Cement	284	0.01%	4	1.51%	0.00%	0.0002%
Electricity	1,417	0.06%	0	0.00%	0.00%	0.00%
Fertilizer	5,809	0.26%	50	0.87%	0.02%	0.0023%
Iron and Steel	62,351	2.79%	4,375	7.02%	1.42%	0.1961%
Total	83,489	3.74%	5,913	7.08%	1.91%	0.2650%

Table 1.5. China's Total Trade (in million €) and Share of Total Industry Exports by value, 2019.

Source: UN Comtrade Database "Trade Data" Available from: https://comtrade.un.org/. Product codes from Annex I of https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=celex:52021PC0564.
Note: We use 2019 data given the supply chain disruption from the COVID-19 pandemic may have affected more current trade statistics.

China's ETS may alleviate the CBAM's effect on Chinese exporters. The national ETS, which came into force in 2021, regulates more than 2,200 power facilities and covers around 40% of China's CO_2 emissions (Kardish et al., 2021). China's 14th Five-Year Plan (2021-2025) is scheduled to expand the ETS to include iron, steel and aluminum production before 2025; however, a definitive implementation date is not set (Liu, 2021). This could mean that Chinese exporters may be exempt or face a lower EU border adjustment. Yet, a problem regarding the pricing persists. Average allowance prices in China ranged from USD 3.28 to USD 12.62 in 2020 while the EU ETS prices averaged USD 28.28. With this difference, the EU may not exempt China from a potential CBAM, unless the EU gives China special treatment based on its developing country status (González, 2019). According to WTO rules, countries can declare themselves as a "developing" or "developed" country; however, other WTO members can challenge this self-

declaration (World Trade Organization, 2021). With the current amended CBAM proposal that was presented by the European Parliament (2021, p. 21) in November 2021, it remains to be seen whether the EU considers the Chinese ETS as a system with "equivalent efficiency".

During the Leaders' Summit on Climate Change on April 22, 2021, Chinese President Xi Jinping delivered a speech outlining Chinese expectations on global actions against climate change. He reinforced that any action taken by individual countries must be based on multilateralism and comply with international law. Furthermore, he stated that "developed countries need to increase climate ambition and action, and at the same time help developing countries and support them in financing, technology, and capacity building" (Ministry of Foreign Affairs of the People's Republic of China, 2021). Accordingly, after the EU published its CBAM proposal, Liu Youbin, a spokesperson for the Chinese Ministry of Ecology and Environment, commented that the EU's CBAM is a unilateral measure and undermines WTO rules in addition to eroding trust in the global community (Reuters, 2021). This means that the EU can expect significant resistance from China to its proposal. China may reject the EU's CBAM proposal based on its potential non-compliance with WTO rules. This indicates resistance against the EU and may undermine its normative power to induce emissions-reduction measures in China.

However, Hubner (2021) surveying various public and private stakeholders, including academics and NGOs from China, finds the prevailing opinion among Chinese stakeholders is the CBAM will not significantly affect trade. The rationale is China's national ETS (see Table 1.4.) would qualify as an equivalent emissions-reduction measure, allowing China to make a strong case at the WTO if CBAM disputes were to escalate. Hubner (2021) emphasizes that to avoid an escalation or retaliation against the EU, open communication and early bilateral engagement between the EU and China will be crucial for China to accept the CBAM.

When considering the geopolitical implications of the EU's CBAM proposal for China, it is important to note that China's key ambition is to maintain its trade relationship with the EU. However, Fouréa et al. (2016) predicted that a CBAM will generate export losses in the range of 0.4 to 1.4 billion USD for China, the US and India. In response to these losses, China could introduce retaliatory trade measures similar to those that affected the agricultural sector after the EU had announced to include aviation into the EU ETS in 2012 which resulted in a WTO dispute (Fouréa et al., 2016).

The EU has also been criticized for neglecting the impact of its CBAM on LDCs and developing countries as its proposal does not indicate use of the CBAM revenues. Brandi (2021, p. 3) argues that "a failure by the EU to invest in other countries would create the impression that it is generating an unfair competitive advantage for itself at the expense of other countries". Brandi recommends the EU exempt LDCs from the CBAM and China is likely to seek such an exemption, either based on its status as a developing country or based on its existing national ETS. As negotiations about the CBAM are still ongoing between the EC and the EP, the main challenge for the EU is to prevent the accusation that its proposed CBAM is a unilateral and protectionist trade measure which contradicts WTO rules. Under a CBAM the EU will have to consider its future trade relationship with third countries and it likely will have to deliver concessions to its domestic industry and prevent retaliatory trade measures from its main partners, including China.

Russia

The EU is Russia's biggest trading partner. In 2019, the EU accounted for about 39% of Russia's total trade (Table 1.6). Like China, Russian exporters face substantial exposure to the CBAM since the EU is also Russia's largest export market. In 2019, 41% of Russian exports went to the EU. The EU sources most of its iron and steel and fertilizers from Russia and also represents the largest export market for Russia in these industries. Different from China and Turkey, Russia also has significant exposure to the CBAM through its electricity exports to the EU (Makarov, 2021). However, the industries covered by the CBAM comprise a relatively small share (7.6% in 2019) of Russia's exports to the EU by value (Kardish et al., 2021) which is predominantly oil and natural gas. In 2019, Russia was the origin of 27% of the EU's crude oil imports and 41% of natural gas imports.

	Exports		Imports		Total	
Global	381,061		220,715		601,776	
EU	157,489		75,441		232,930	
EU Share	41.3%		34.2%		38.7%	
	Value of Exports	**Sector Share of Total Exports**	**Value of EU Exports**	**EU Share of Sector Exports**	**Sector's EU Exports as Share of EU Exports**	**Sector's EU Exports as Share of Total Exports**
Aluminum	5,024	1.32%	1,802	35.88%	1.14%	0.4730%
Cement	60	0.02%	2	3.92%	0.00%	0.0006%
Electricity	814	0.21%	565	69.44%	0.36%	0.1483%
Fertilizer	6,415	1.68%	2,007	31.28%	1.27%	0.5267%
Iron and Steel	16,777	4.40%	4,184	24.94%	2.66%	1.0979%
Total	29,090	7.63%	8,560	29.43%	5.44%	2.2465%

Table 1.6. Russia's Total Trade (in million €) and Share of Total Industry Exports by value, 2019.

Source: UN Comtrade Database "Trade Data" Available from: https://comtrade.un.org/. Product codes from Annex I of https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=celex:52021PC0564.
Note: We use 2019 data given the supply chain disruption from the COVID-19 pandemic may have affected more current trade statistics.

The CBAM proposal has provoked a discussion in the Russian government about carbon reduction measurements. According to Bank of Russia economists Morozov et al. (2020), Russia is one of the countries greatly affected by the full CBAM implementation. Unlike China, Russia's national emissions-reduction strategy is underdeveloped, providing it no leverage in negotiations with the EU over an exemption from the CBAM. However, although the details remain obscure, there are plans to expand the efforts to monitor emissions (Climate Action Tracker, 2021).

Prior to COP26, Russian government officials signed a document that allowed President Vladimir Putin to announce that Russia aims to reach net-zero carbon emissions by 2060 but with no details on a specific timeline (The Moscow Times, 2021). In response to the EU's CBAM proposal, Maxim Reshetnikov, Russia's Minister of Economic Development, criticized the lack of

clarity in August 2021. He also stated "at present, there are a number of contradictions with the rules of the WTO and international climate change agreements" (Karpukhin, 2021). Reshetnikov also claimed that the CBAM would "perpetuate the gap between industrialized and developing nations. That is, those that have already achieved peak energy consumption and possess energy-effective technologies, and the others, which have not achieved this level yet" (Karpukhin, 2021).

The 13th BRICS[14] summit on September 9, 2021, led to the New Delhi Declaration whereby state leaders, including Vladimir Putin, declared that "it is critical that all WTO members avoid unilateral and protectionist measures that run counter to the spirit and rules of the WTO" (BRICS, 2021). Opposing the CBAM, Russia condemned the proposal as a unilateral measure that should be considered protectionist. Reshetnikov stated "if we take a close look at the WTO agreements, we will see that, according to our estimates, the EU's CBAM contradicts them, in particular, such basic principles as 'national treatment' and 'most-favored nation status,' the introduction of import restrictions and many other things. In other words, we have solid grounds to put forward grievances. It is hoped that these disagreements will be settled and major disputes will be avoided" (Karpukhin, 2021).

As of January 2022, diplomatic relationship between most western democracies and Russia had significantly deteriorated and tensions escalated when Russia invaded Ukraine on February 24, 2022. The invasion follows a long territorial dispute, exacerbated since the Russian annexation of the Crimean Peninsula in 2014. A UN General Assembly resolution condemned the Russian attack as it violates Ukrainian "sovereignty, independence, and territorial integrity" (United Nations, 2022). In response to the war countries such as the US and Canada, as well as the member states of the EU, imposed new economic sanctions against Russian banks, oligarchs, and other key economic entities (previous sanctions were in place following the Crimea annexation.) The results are internationally strained or entirely disrupted economic and political relationships with Russia. Notably, the EU's and particularly Germany's dependency on Russian oil and gas (Brauers et al., 2021; Paillard, 2010) is a key concern for western states. Notably, Germany placed the regulatory approve for Nord Stream 2 on hold in late February 2022 (Marsh & Chambers, 2022). This decision is considered the beginning of a new era for German foreign policy with significant

[14] BRICS is a consortium of five emerging economies — Brazil, Russia, India, China and South Africa — cooperating on matters of the economy, society, education and other policy domains.

"implications for energy security and Berlin's broader position towards Moscow" (Dirsus cited in Marsh & Chambers, 2022).

The change in the pipeline's regulatory approval is widely considered a critical move in reaction to the war in Ukraine as reduced fossil fuel imports from Russia will likely exacerbate the EU's current energy crisis. Several member states, including Germany, face severe gas shortages, inflation, and high energy prices since mid-2021 (Blair, 2022). The EU's dependency on Russian oil and gas is a key factor in the broader geopolitical crisis between East and West. Even though fossil fuels are not included in the CBAM proposal, energy resources and related infrastructure, such as Nord Stream 2, are currently politicized and considered to be political leverage against Russia (Gustafson, 2022). However, the Russian escalation of the Ukraine crisis into a war shows that President Vladimir Putin is not deterred from taking extreme measures if he perceives that Russia's sphere of influence is threatened through a potential territorial expansion of the EU and the military alliance of NATO to the East (Sauer, 2017).

Despite the deterioration between the EU and Russia, it is unlikely that the EU's CBAM proposal will be an escalating factor in the current trade relationship. Russia's reaction to the CBAM mirrors China's as it aims to prevent export losses through a carbon tax (Karpukhin, 2021). Similar to the protest against the EU's plans to include aviation in its ETS, Russia may form a coalition with China and other states to dispute the CBAM at the WTO (see (Fouréa et al., 2016). Unlike China, however, Russia is a developed country and thus has fewer avenues to pursue an exemption. In addition, the international outrage against the invasion of Ukraine may leave Russia with fewer political allies. Russia will likely insist on the WTO principles that render protectionist trade measures illegal. In terms of the EU's normative and regulatory power to influence domestic policy reforms in third countries, Russia is unlikely to align its climate policy measures — unless it sees clear benefits to do so, such as in the form of CBAM exemptions.

However, before a rapprochement can happen between the EU and Russia, "peaceful relations and trust are a must, and these are presently sorely lacking" (Gustafson, 2022). Thus, Russia's reaction to the CBAM is unpredictable in the near future, especially as the war in Ukraine continues at the time of writing. From a normative perspective, it is unlikely that Russia will be pressured into adopting emissions reduction measures that align with the EU's current ETS. Previous work has indicated that economic trade sanctions, imposed by both the EU and US, have not changed Russia's foreign policy approach (Michalski & Nilsson, 2019). In the same manner,

it remains to be seen how negotiations between Russia and the EU will evolve over the CBAM and if the EU has the ability to leverage environmental policy reforms within Russia.

Turkey

In addition to the current policy discussion, historical political dynamics affect the CBAM's geopolitical implications for Turkey-EU relations. In 1987, Turkey formally applied to join the European Economic Community (now EU) and became eligible to join the EU in 1999 (Emerson, 2004). Accession negotiations, based on 35 negotiation chapters, began in 2005 (Directorate for EU Affairs, 2019). The unresolved Cyprus question — the ongoing dispute between Turkey and Cyprus after the Turkish military invasion and occupation of the northern third of Cyprus in 1974 — has stalled negotiations since 2016. Furthermore, the EU often considers Turkey a "buffer" at its external border, and financially supports Turkey to prevent asylum-seekers from North Africa and the Middle East from entering the EU (Saatçioğlu, 2020).

The EU's CBAM proposal, which would affect Turkey most in the cement, iron and steel sectors (see Table 1.2.), could further aggravate political tensions between both jurisdictions. Currently, Turkey does not have a domestic ETS in place[15]. However, since 2012, the country has been evaluating opportunities to achieve emissions mitigation targets (ICAP, 2021). The Turkish government is working closely with the EU on meeting EU accession requirements in the energy policy domain. Policy sectors under negotiations are also called "negotiation chapters". The negotiation chapter on EU energy policies includes three principles: competitiveness, security of supply, and sustainability (Directorate for EU Affairs, 2019). The negotiation chapter on energy has not yet been opened; however, Turkey perceives it as a policy domain where it can achieve a "high level of compliance" with EU regulations and directives ((Directorate for EU Affairs, 2019).

With Turkey, the EU's normative power manifests itself through potential EU membership. However, negotiations have already taken more than a decade and accession requirements may change, especially in the face of accelerated climate change and corresponding EU environmental policy. Another factor to consider is the geopolitical situation in Europe since the Russian invasion in Ukraine which may influence EU accession negotiations for various candidate countries, including Turkey. At the same time, the EU's normative power to induce policy reforms in Turkey

[15] Turkey has signed a bilateral customs union agreement with the EU. However, Turkey is still considered a "third country" and the CBAM would apply to its exports.

is greatly influenced by its dependency on Turkey preventing asylum-seekers from entering the EU in an irregular manner (Gürkan & Coman, 2021).

	Exports		Imports		Total	
Global		161,484		187,838		349,322
EU		69,681		60,702		130,383
EU Share		43.2%		32.3%		37.3%
	Value of Exports	**Sector Share of Total Exports**	**Value of EU Exports**	**EU Share of Sector Exports**	**Sector's EU Exports as Share of EU Exports**	**Sector's EU Exports as Share of Total Exports**
Aluminum	1,924	1.19%	1,120	58.22%	1.61%	0.69%
Cement	823	0.51%	95	11.61%	0.14%	0.06%
Electricity	93	0.06%	92	98.90%	0.13%	0.06%
Fertilizer	307	0.19%	84	27.31%	0.12%	0.05%
Iron and Steel	11,719	7.26%	3,907	33.34%	5.61%	2.42%
Total	14,866	9.21%	5,299	35.65%	7.60%	3.28%

Table 1.7. Turkey's Total Trade (in million €) and Share of Total Industry Exports by value, 2019.

Source: UN Comtrade Database "Trade Data" Available from: https://comtrade.un.org/. Product codes from Annex I of https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=celex:52021PC0564.
Note: We use 2019 data given the supply chain disruption from the COVID-19 pandemic may have affected more current trade statistics.

The CBAM could have a significant impact on EU-Turkey trade. Similar to China and Russia, the EU is by far Turkey's largest trading partner. In 2019, 32% of Turkey's imports came from the EU and 37% of the country's exports went to the EU (Table 1.7). Turkey supplies more than one third of the EU's cement imports, and is the third largest source of iron and steel for the EU after China and Russia (Table 1.2). The EU is a major market for Turkey's exports in all five CBAM industries, with electricity particularly exposed. Turkish public and private sectors work closely with the European Bank for Reconstruction and Development (EBRD) to enable an environment for a "scaled-up domestic carbon market" (European Bank for Reconstruction and Development, 2021). For this, the EBRD has three instruments at its disposal: policy dialogue;

support for Turkish banks to develop carbon market services; and carbon asset development processes. For example, through its Mid-size Sustainable Energy Financing Facility (MidSEFF) Carbon Market Development Support Programme, the EBRD supported the Sena run-of-river hydroelectric plant, expected to generate 68 GWh per year of renewable energy.

Similar to Russia, without an ETS in place, the CBAM could significantly affect Turkish producers exporting to the EU. During COP26, Turkey's chief negotiator evaluated the CBAM as a "very big threat" because of the high share of Turkish exports that go to the EU (Weise, 2021). In contrast, the general secretary of the Turkish Steel Producers Association noted, "as Turkish mills are already investing in green steel, I don't think that the CBAM will have a significant effect on our exports to the EU" (Can, 2020).

Timmerman (2021) argues that the potential launch of the CBAM encouraged Turkey to ratify the Paris Agreement on October 5, 2021, through a memorandum of understanding with the World Bank. Although it could be argued that the Turkish ratification is a result of the EU's normative power, other dynamics must also be considered. Because of this ratification, Turkey will receive $3.2 billion in loans from Germany and France for its domestic clean energy transition (Weise, 2021). Furthermore, Turkey unilaterally announced that it would implement the Paris Agreement as a developing country, despite its developed country status in the UN (Lo & Farand, 2021). Therefore, as Timmermans (2021) suggests, even though the CBAM is at a proposal stage, it has already delivered policy responses and reforms in third countries.

Nearly half of Turkey's total amount of exports are destined for the EU which underlines the significance of the trade relationship. In comparison with China and Russia, Turkey has an additional long-term interest in complying with EU environmental regulations that derives from its prospects as a potential EU member state. In general, Turkey is more likely to identify itself with western values as also indicated by its NATO membership. Turkey currently does not have an ETS despite its monitoring, reporting and verification system introduced in 2015 (ICAP, 2021). However, it launched its National Energy and Mining Policy in 2017 which "focuses on improving energy security of supply; increasing the use of domestic energy resources; and improving transparency in energy markets" (International Energy Agency, 2021).

Turkey may insist on a developing country status but at the same time, it may also extend its carbon reduction policies in order to avoid trade disadvantages. However, the EU relies on Turkey to maintain safety and security at its external border. This provides Turkey with a certain

degree of political leverage; however, mainly in the policy domains of security and migration which are less relevant from an environmental and energy perspective (Jäntti & Klasche, 2021). At this stage, the CBAM is still in a negotiation phase and thus, Turkey's reaction remains cautious as it maintains a muted response, also due to the lack of clarity provided by the EU on its CBAM proposal.

Conclusion

The EU's CBAM proposal is a mechanism to help meet its climate goals in the "Fit-for-55" package. The EU's CBAM is likely an intentional strategy to initiate discussions about aligning emissions prices across the globe. The EU's CBAM could represent a first move toward a global "climate club" with exclusionary effects for third countries (Bierbrauer et al., 2021). One important — and outstanding — policy design question facing the EU is the grounds for exemptions from the CBAM. The EU has not released specific exemption criteria, and these criteria are likely to be part of ongoing negotiations.

The CBAM represents a collective effort of nine EU member states, who formally requested the EC deliver a proposal (Blümel et al., 2021). However, as this chapter discusses, while some individual EU member states and their governments are supportive, domestic industry leaders and some of the EU's main trading partners have expressed concerns. Industry leaders within the EU raised concerns that the CBAM may diminish their competitiveness and result in lost export sales. Our analysis focused on the reactions of China, Russia and Turkey — the EU's main trading partners in the five sectors (aluminium, cement, electricity, fertilizers, and iron and steel) initially covered by the CBAM. We outline industry and government reactions and show a general apprehension towards the EU's CBAM proposal due to the above-mentioned criticisms. All three countries raised three main concerns, arguing that the CBAM proposal is a protectionist measure; it is a revenue generator to enhance the EU's budget; and that the EU's decision-making process is unilateral, which goes against the WTO principles of multilateralism and international cooperation.

China and Russia could use these three key arguments to protest the CBAM proposal at the WTO if the EU does not present significant amendments that mitigate the impact on its main trading partners. Our analysis reveals that China and Russia, although having distinct self-interests, are likely to adopt a similar approach as they have formed coalitions in the past, for example in

protesting the EU's inclusion of the aviation sector in its ETS (Fouréa et al., 2016). China and Russia may consider trade retaliation, such as restricting exports into the EU. However, Russia's geopolitical relations are already strained since its invasion of Ukraine and it is already limiting natural gas exports to the EU, possibly in response to the economic sanctions imposed by the West. As a result of the war, the trade relationship between the EU and Russia may diminish as economic sanctions persist. Furthermore, Ukrainian infrastructure has been targeted in the war, straining its export abilities for example in the agricultural sector. Consequently, trading relationships between the EU and other countries may shift as EU member states seek alternative suppliers. In terms of environmental policies, the EU may strengthen its relationship with western countries such as the US, contributing to the formation of a climate club which would further divide East and West.

Turkey has strong and intertwined political, economic and geographical relations with the EU. As a direct neighbour, Turkey has taken on the role as a 'gatekeeper' between the EU and Middle Eastern countries, such as Syria. However, unlike Russia, Turkey does have a concrete interest in joining the EU which may indicate that the country may, for example, develop a national ETS which aligns with the EU's environmental policies. EC spokesperson Frans Timmermans claims that the CBAM incentivizes policy reforms in third countries (Timmermans, 2021). He uses the example of Turkey, which ratified the Paris Agreement in October 2021 in an effort to become exempt from a potential CBAM.

The CBAM proposal reflects the EU's normative and regulatory power: its ability to influence political reforms in third countries. At the same time, however, internal and external resistance against the EC's CBAM proposal remains and will force the EU to deliver concessions throughout negotiations which may weaken the EU's position as a global climate leader. Nevertheless, the EC's proposal is considered ground-breaking in the sense that it reflects the first international carbon levy, and currently spearheads international discourse on BCAs. Thus, the EU maintains its position as a normative power in matters of climate change and takes on the role of a climate leader (Torney, 2019).

The CBAM is simultaneously a domestic policy tool and a political tool for the EU to exert pressure on third countries to increase their emissions reduction efforts. For the CBAM to be widely accepted by the international community, the EU needs to develop concrete action plans that reflect on the potential impact of a CBAM on LDCs and developing countries and offer corresponding mitigation strategies. For example, the EU has not yet clarified how it aims to avoid

an unbalanced trade situation that disadvantages certain countries. This would help remedy the accusation that the CBAM is a unilateral measure. Furthermore, the CBAM may trigger trade retaliation especially from the EU's biggest trading partners in the affected sectors — China and Russia. Trade retaliation could take the form of individual import/export restrictions, for example of agricultural goods. Retaliation could also involve mobilizing the international community to consider punitive measures via the WTO, especially if components of the CBAM are considered inconsistent with WTO laws. From a global perspective, the EU is a major trading bloc which involves 27 EU member states and affiliated countries, such as Norway. If the CBAM does not comply with current WTO principles, for example of non-discrimination and open trade, the measure could erode trust in the global trade community and third countries will seek an appropriate response from the WTO which could force the EU to revise its CBAM proposal.

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