The European Version of a Green Deal:

A Step to Shape the Climate Agenda

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Preface by Burcu Ünüvar: For Whom the Bell Tolls

Once deemed a distant risk and a problem only for the next generation, externalities associated with the climate crisis are knocking on almost everyone's door now. Inaction is no longer an option[1], strengthening the global call for a green perspective.

Following the Global Crisis of 2008, a report prepared by the United Nations Environment Programme introduced the Global Green New Deal[2] as a means of stimulating economic recovery, eradicating poverty and reducing carbon emissions and degradation to the ecosystem. Although global awareness has been rising since then, there is a longer road ahead. In order to accelerate the transition to a low carbon economy, we have recently seen the green deal perspective back in the headlines again, with the European Green Deal (EGD) being the one most talked about.

Seeing climate change as an *existential* threat to Europe and the world, the commitment to a sustainable European Union (EU) economy marks a significant milestone. Within the framework of leaving no one and no place behind, the EU aims to be climate neutral. Such an ambitious aim comes with an ambitious and multidimensional package. A wide range of policy areas[3] will be on the agenda with the need for transformation. One should note that this need for transformation is not limited to the EU. Trying to avoid leakages and spread the commitment, the EGD offers a tight jacket for stakeholders outside the EU as well.

Within this perspective, international trade is an important subject on the agenda both as a source of risk but also as a part of the solution. While production and logistics associated with international trade offers tremendous room for improvement in the transition to a low carbon economy, a well-planned trade strategy also has the potential to accelerate this transition by offering a wider basket of low carbon products. The consensus is that if the border tax adjustment plan under the EGD applies, many sectors in Turkey would have to adjust some areas of their operations. However, we urge the adoption of a broader perspective. The EGD is just a part of a possible global green approach. We expect similar recognitions in many different parts of the world, which will have inevitable repercussions for global trade and consumer preferences. Hence taking the EGD into consideration but knowing that the real theme is in fact changing global dynamics around the climate crisis, Turkey should start doing the right thing for the right reason. The clock is ticking when it comes for climate awareness in every aspect of the economy, requiring a planned transformation. Now is the time to plan and act!

Burcu ***ÜNÜVAR***

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[1] https://blogs.worldbank.org/europeandcentralasia/covid-19-shock-offers-historic-opportunity-green-and-just-transition
[2] ttps://wedocs.unep.org/bitstream/handle/20.500.11822/7903/A_Global_Green_New_Deal_Policy_Brief.pdf?sequence=3&amp%3BisAllowed=
[3] https://ec.europa.eu/info/strategy/priorities-2019-2024/european-green-deal_en#policy-areas

Europe's Green Efforts and Intentions as a Deal

Setting the Scene

The communication paper of the EGD was announced on 11 December 2019 (European Comission , 2019). The spot of the press release clearly sets out the intentions and the goals of EGD (probably) in order of importance:

- becoming the first climate neutral continent by 2050 (the political ambition),
- boosting the economy (economic benefit),
- improving people's health and quality of life (public benefit),
- caring for nature (in fourth place),
- leaving no one behind (last but should not be least).

The EGD (European Commission, 2019, p. 2) aims to **transform the economic model entirely** by providing roadmaps with actions, targeting to boost the efficient use of resources, moving to a clean, circular economy, stopping climate change, reversing biodiversity loss and cutting pollution. Thus, the EU will transform itself into a competitive economy where there are no net emissions of greenhouse gases by 2050[4], economic growth is decoupled from resource use and no person and no place is left behind. The Deal covers a wide range of structural transformation areas such as agriculture, forestry, biodiversity, the preservation and restoration of natural capital, the blue economy and ground and surface water. The transformation is estimated to require annual additional investment of € 260 billion.

Box 1: Carbon Leakage

Carbon leakage can be defined as the increase in foreign emissions caused by the introduction of a domestic regulation (Fowlie & Reguant, 2018). Carbon leakage could happen through a trade channel in which domestic climate policies may increase relative production costs, shifting production and its associated emissions to less-stringent regions. However various ex-post analysis finds that climate policies only have a small effect, if any, on carbon leakage and competitiveness. It should be considered that increased policy stringency divergence (for example through the EGD) in the future may amplify these issues, meaning the small effects identified may therefore partly reflect the low stringency of climate policies to date (OECD (a), 2020).

The European Commission (EC) emphasizes a potential carbon leakage risk originating from the **divergent ambitions of countries** in pricing carbon emissions. Thus, EGD mentions that "the environmental ambition

[4] The political commitment became also a legal commitment as the European Commission reached an agreement on European Climate Law in April 2021.

of the Green Deal will not be achieved by Europe acting alone" and references a carbon border adjustment mechanism (CBAM) to reduce the carbon leakage risk. The CBAM is a critical tool in ensuring that the effects of EGD can also be reflected to trade partners.

The EGD as an Industrialization Policy

The EGD levels up the climate ambition of the continent and calls on other countries to join and increase their own contribution to the efforts to tackle the climate crisis.

The intention to transform the economic model and associate this transformation with gaining competitiveness hints that future regulations will direct the competitiveness of firms and countries in accordance with the green agenda. The EGD reiterates that "The Commission will continue to work on new standards for sustainable growth and use its economic weight to shape international standards that are in line with EU environmental and climate ambitions" (European Commission, 2019, p. 22). Furthermore, CBAM can be considered as an important new tool in reshaping the competitiveness of countries in foreign trade.

The efforts towards **changing the landscape**, redefining the components of international competition and adding the compensation of natural capital through pricing emissions serve as an **industrialization policy mix**. Ultimately, the pursuit of a green deal (on both sides of the Atlantic) can be seen as an attempt to achieve employment gains through industrial policies, as well as rehabilitating more polluting industrial activities (Aiginger & Rodrik, 2020). An important component of industrial policy is that the policy maker gives clear signals about the direction of technological change (Aiginger & Rodrik, 2020). According to Chang & Andreoni (2020), industrial policy makers should reduce the uncertainty about the future evolution of technology. EGD in this sense, sends clear long-term signals to direct financial flows to green investment and thus promote green technological improvement by easing uncertainty over the vision of the policy maker. This policy also contributes to limiting and managing the risk of stranded assets.

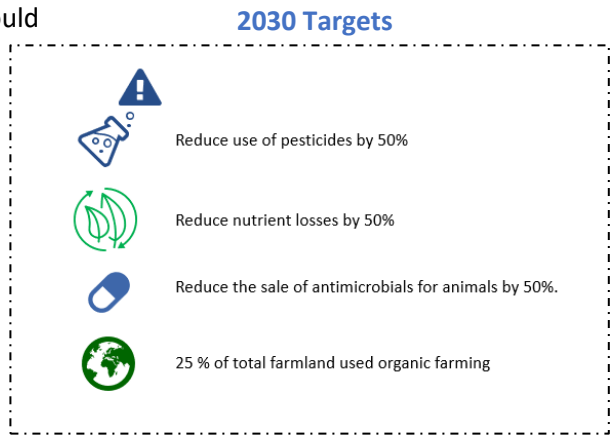
The EGD not only seeks to improve conditions under which firms invest, but also aims to stimulate demand and increase business expectations in regard to where future growth opportunities might lie. In this sense, the EGD could be considered as a "mission-oriented" innovation policy as in Mazzucato (2018) and industrial policy, in line with the definition set out by Mazzucato et.al. (2020) which states that "it is not about 'top-down' planning by an overbearing state; it is about providing a direction for growth and increasing business expectations with regard to future growth areas and catalyzing activity". Thus, this approach **goes beyond the 'market failure' narrative to a 'market co-creating' and 'market-shaping' role of the state** in the industrialization process (Mazzucato, Kattel, & Ryan-Collins, 2020, p. 422).

The Farm to Fork Strategy

As it moves towards its goal of being carbon neutral by 2050, the EU has devised a strategy set for agricultural and food systems under the name of the Farm to Fork Strategy. The targets laid out within the strategy represent a holistic approach towards emission mitigation in the food and agriculture industry, **starting from production technologies and extending to distribution channels and consumer preferences**.

Promoting Sustainable Food Production and Consumption

The EC aims to encourage farmers, fishing communities and aquaculture producers to depart from traditional production techniques and adopt environmentally friendly methods which will increase the climate resilience of crop production. These methods would require the optimal use **nature-based, technological, digital, and space-based solutions**. Investments into these methods are expected to bring higher returns by contributing to the value added and reducing the costs of production.



The policy document released by EU frames this "**new green business model**" on the basis of carbon mitigation led by farmers (European Commission (a), 2020). The main idea is transforming production by reducing the overall use of chemical pesticides by 50% until 2030. Reducing nutrient losses by at least 50%, while securing soil fertility is also set as a target. This is expected to reduce the use of fertilizers by at least 20% by 2030.

The Farm to Fork Strategy aims to trigger a shift towards more healthy and sustainable food choices. Putting emphasis on a more plant-based diet with less red meat and processed meat is one of the Commission's main priorities under this category. This will not only mitigate the environmental impact of food systems but also enhance the quality of life by eliminating several health problems pertaining to food consumption.

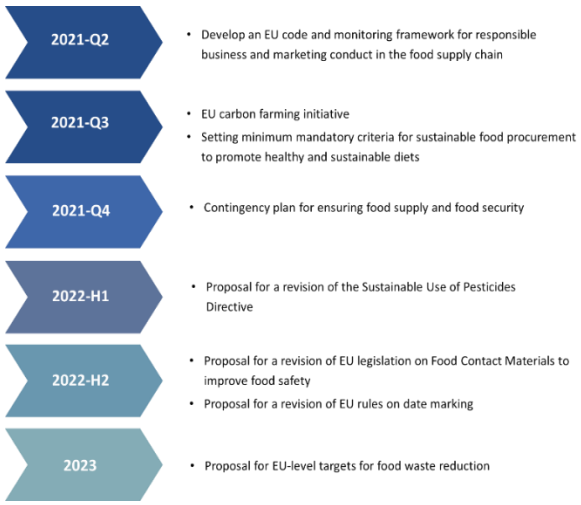
Tax mechanisms are also among the policy actions which would encourage consumers to consume sustainable food products. These mechanisms will be integral in differentiating products that are environmentally harmful and to integrate real cost of pollution, emissions and use of natural resources into the final price of food products.

According to latest estimations, around 88 million tonnes of food go to waste across the EU annually, at a cost of €143 billion. On the other hand, 33 million people in the EU cannot afford a decent meal every second day, according to EuroStat. In order to address this dilemma, the Commission has committed itself to reducing per capita food waste at retail and consumer levels by 50% by 2030.

Although the Farm to Fork Strategy is considered to be the most ambitious attempt at mitigating the environmental impact of agriculture and food systems, the strategy has its fair share of critics who point to the strategy's inability to show clear targets for limiting livestock farming, which significantly contributes to global emissions (European Environmental Bureau, 2020). In addition, some criticism implies that the targets laid out by the strategy are a long way from reality as they are focused more on the environmental consequences of farming practices, ignoring the possible economic and social impacts of the "new green business model" on farmers as profit-seeking food producers (Tertsch, 2020).

What to Expect Next

The next few years will involve coming up with proposals to build the regulatory framework for a just transition in production, distribution, and consumption. Although the Farm to Fork Strategy represents an ambitious target set to be fulfilled until 2030, the measures to take to reach these goals will not be indicated before 2023 from what is seen on the action plan. The earliest targets are expected to be set on the food waste across EU in 2023.



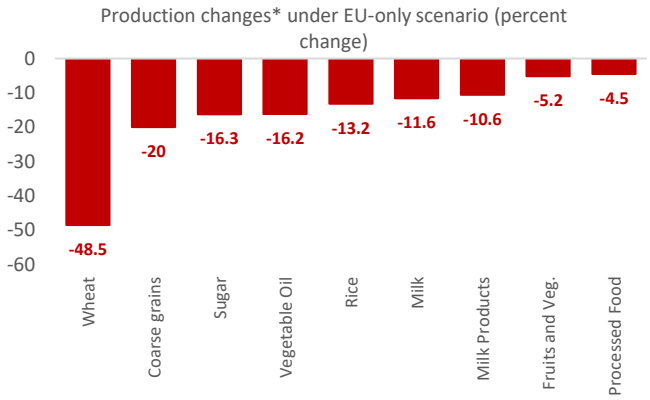
The green transition under the Farm to Fork Strategy will require an acceleration in research and development activities on food and agriculture practices. Under the Horizon Europe funding scheme, which was developed for the 2021-2027 period, the Commission proposes to spend €8.9 billion on research and innovation on food, bioeconomy, natural resources, agriculture, fisheries, aquaculture and the environment as well as the use of digital technologies and nature-based solutions for agri-food.

The Global Economic Impact of Farm to Fork

While the area of literature on estimating the impact of the Farm to Fork Strategy on the EU economy and the global economy has only recently started to emerge, it points to possible reductions in both agricultural production in the EU and their competitiveness in export markets (Beckman et. al., 2020). The key concern

is that restrictions on the use of agricultural inputs such as pesticides, fertilizers, antimicrobials and others could outpace technological innovation in agriculture and precipitate a decline in agricultural production, which in turn may lead to inflation in food prices as well as a deterioration in the outlook on welfare.

Production estimates reveal that wheat production is expected to decline by 48.5%, rice by 13.2%, and fruit and vegetable by 5.2% within 8-10 years of the full implementation of the targets. A reduction in production levels is expected to affect exports as well: Under full implementation of Farm to Fork Strategy, fruit and vegetable exports from the EU to the rest of the world would decline by 5.3%, whereas rice and coarse grain exports would decrease by 82.2% and 34.2% respectively. According to the findings, the decline in agricultural production in the EU would be compensated by imports from outside the EU. Accordingly, Turkey's agriculture exports to the EU are expected to increase.

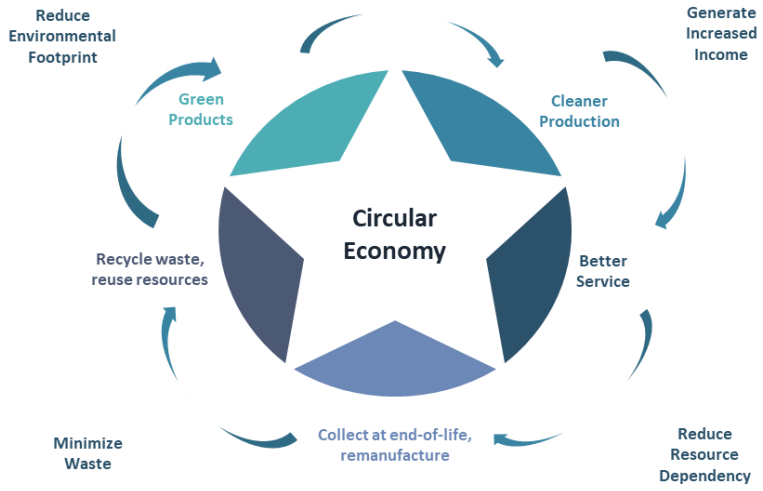


*within 8-10 years
Sources: Beckman et. al. (2020), TSKB Ekonomik Araştırmalar

From a Linear Economy to a Circular Economy

The European Parliament has warned that the production of plastics has been growing exponentially. The EU produces 5 billion tonnes of waste on average per year and only 38% of the waste in Europe is being recycled (European Commission, 2021). The conventional linear way of producing (take-make-dispose) and consuming materials not only destroys valuable natural resources, but also threatens the fragile ecosystem. The EU has awoken to the opportunities in recycling to prevent a remarkable amount of economic loss as well as environmental damage. Among wide range of specific strategies triggered by the EGD, the circular economy has been put very high on the agenda in the search for deeper integration. In other words, the circular economy stands as one of the core elements of the EGD. In that manner, in 2015 the EC adopted the first circular economy action with ambitious targets on recycling, packaging waste and landfill in order to promote the shift towards the circular economy (European Commission, 2015). In March 2020, the EC adopted a new action plan for a circular economy which aims to increase recycling rates to up to 70% of all packaging waste by 2030 and 65% of all municipal waste by 2035 (European Commission (b), 2020). The plan will also serve to achieve the EU's target of being climate neutral by 2050 while halting biodiversity loss. The EU recently launched the Global Alliance on the Circular Economy and Resource

Efficiency (GACERE), bringing together representatives from both the public and the private sector as well as NGOs and international organizations to develop solutions and recommendations for transition period to the circular economy, aimed at a toxic-free and fully circular economy by 2050, tighter recycling rules and binding targets for the use of materials and consumption by 2030 (European Commision, 2021). In short, the EGD emphasizes that a sustainable economy needs to be reshaped in line with a circular economy approach.



Source: United Nations Industrial Development Organization

Even though renewable energy and energy-efficiency measures are critical in combating climate change, they can only address 55% of emissions (Ellen Macarthur Foundation, 2019). Industry - mainly the food, textiles, manufacturing and plastics sectors – account for the remainder of the emissions. Therefore, achieving the ambitious targets for reductions to greenhouse gas emissions set by the EU set requires actions in recycling and the circular economy. A fundamental shift in the global approach to tackle climate change is needed and the transition from a linear to a circular economy is a necessary boundary condition in order to preserve the environment and mitigate the climate crisis. Moreover, the EU aims to boost the bloc's competitiveness and generate new jobs by encouraging circular economy processes. Projections show that the circular economy offers an alternative which could yield up to $4.5 trillion in economic benefit up until 2030 (World Economic Forum, 2021). Furthermore, the Circularity Gap Report 2021 underlines that the circular economy has the potential to reduce global greenhouse gas emissions by 39% and raw material use by 28% by 2032 (Circle-Economy.com, 2021). As European Academies Science Advisory Council (EASAC) confirms that the circular economy enables security of supply, control of rising cost, and generates income from a wider range of products and services by exploring new business ideas (European Academies Science Advisory Council, 2015).

The circular economy also offers developing counties opportunities to progress towards sustainable development, resource efficiency and a low-carbon economy. It is critical that developing countries identify their own opportunities while considering the potential positive and negative environmental impacts and require significant investments in the circular economy to address the demands of a growing and urbanizing population while achieving sustainable economic growth. Besides, the practices of a circular economy are becoming a priority for businesses as encouraged by the EGD; European firms will have a greater intention on M&A opportunities in waste management and recycling industries in developing countries. Considering that only 9% of the global economy is circular as of today (Circle-Economy.com, 2021), putting the necessary governance in place to create legal and financial incentives stimulating technical and social innovation as well as generating information will be the key drivers to unlock the potential of the circular economy to increase resilience (OECD (b), 2020).

Carbon Border Adjustment Mechanism

The EU achieved significant emission reductions with the help of the Emissions Trading System (ETS). However, as the Commission seeks to set more ambitious targets within the scope of the EGD, the risk of carbon leakage is expected to increase with the expectation of a rising carbon price. The Carbon Border Adjustment Mechanism (CBAM), a key element of the EGD, is proposed as a **levy on imported goods based on their carbon footprint**, thus limiting carbon leakage both in the form of investment and trade diversion. The mechanism would ensure that the price of imports more accurately reflects their carbon content.

Box 2: European Union Emission Trading System

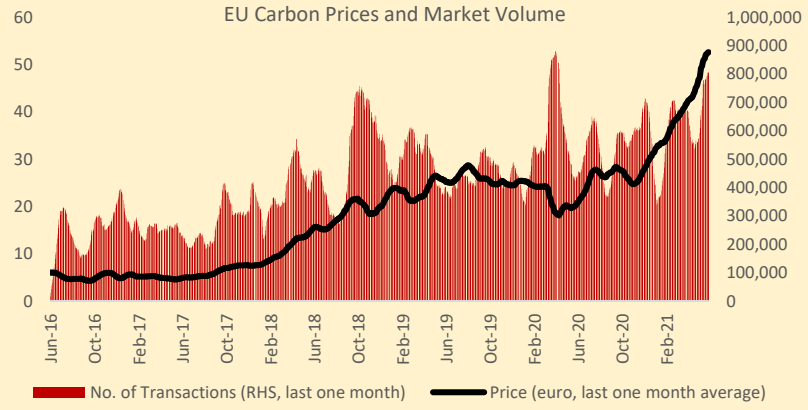
Establishing a market price for greenhouse gas is instrumental in directing investments and R&D activities into low carbon development as a tool for creating an environment in which low carbon technologies are more profitable than carbon intensive ones. There are two policies which set a price on carbon: the carbon border tax and the emission trading system (The Oxford Institute for Energy Studies, 2021).

There are active regional carbon markets in North America and countries such as South Korea, New Zealand and UK have nationwide markets. Recently Germany and China have also launched national carbon trading systems. Yet, having played a key role in international climate negotiations, EU sets an example in emission trading systems. The ETS covers around 40% of the union's emissions (1.6 billion tonnes) and works on the 'cap and trade' principle. In the ETS applied by the EU, a cap is set on the total amount of certain greenhouse gases that can be emitted by the installations covered by the system. This cap decreases each year by a linear reduction factor determined with regard to emission targets. If an installation reduces its emissions, it may keep the spare allowances to cover its future

needs or sell them to another installation which is short of allowances. Participants unable to fully cover their emissions face heavy fines, which amount to around €100 per tonne.

For the EU ETS, which has been active since 2005, July 2021 marks an important milestone. The European Commission's upcoming package of climate laws is expected to propose the extension of the emission trading scheme to the maritime, building and road transport sectors. In the previous phase of the system covering 2013-2020 period, 57% of the total allowances were auctioned, while the remaining allowances were available for free allocation. At the beginning of that period, manufacturing industry received 80% of its allowances for free, but this proportion has decreased gradually each year, and in 2020 stood at 30%. Industrial sectors receive free allowances according to emission efficiency benchmarks and the sectoral risk of carbon leakage. Sectors at risk are identified based on their carbon and trade intensity. Free allowances aim to mitigate the risk of carbon leakage while the carbon price is intended to provide a progressive incentive for decarbonization.

Over the last few quarters, carbon has been an attention-grabbing commodity. In March 2020, carbon prices slumped to below €15 per tonne as COVID-19 lockdowns crippled industrial activity in Europe. However, the disruption in the market proved temporary and in July 2020, prices surged to over €30 for the first time in over a decade, days before EU leaders agreed on the €750 billion recovery fund. In May 2021, cost of carbon in the EU had hit a record €50 as the EC is set to propose a package of regulations to enact the new 2030 target of cutting greenhouse gases by at least 55% from their 1990 levels, replacing a previous goal of a cut of at least 40%. Although price movements have been significant for just over a year, the long-term trend in transaction volumes seems to support the rise.



Source: Reuters, TSKB Economic Research Last data: June 4, 2021

The effect of the remarkable rise in carbon prices differs between sectors in terms of both the direction and the size of the impact. While the power generation sector, for example, has greatly benefited from the carbon trading system in their green transition, and accounted for a significant share of the reduction in emissions, there are also fears that prices have increased too quickly for some sectors to keep up in terms of their ability to adapt, and in view of the additional costs which could be passed on to consumers. In sectors such as steel, petrochemicals and cement, the concerns also focus on international trade. EU companies in these sectors have called for a carbon border tax, fearing they were being put at a competitive disadvantage against producers from countries outside the scheme. In a potential carbon border tax scenario, the availability of free allowance allocations for the sensitive sectors could prove a key discussion point. If this exemption, which was originally designed to counter the impacts on production and employment in the EU, is carried over to the new period, it might risk a significant loss of exports for countries outside the EU.

Draft Proposal

A draft proposal setting out the establishment of a CBAM was leaked on June 4th this year. The details in the leaked proposal offer some answers about the design of the system. **Iron, steel, aluminum, cement, fertilizer and electricity** shall be subject to the CBAM. Both **direct and indirect emissions** (scope 1 & 2) will be covered in the calculation of embedded emissions. When no individual assessment is claimed for indirect emissions, they will be based on the energy mix of the host country. Importers would be required to purchase digital certificates, the prices of which will be linked to the cost of carbon in the ETS. A transition period of up to three years is under consideration before the mechanism fully enters force in January 2026. In terms of exports to EU-27 in products covered by CBAM, Russia, Turkey, United Kingdom, Ukraine and China are the first five countries. According to 2019 data, Russia exports 8.4 billion dollars, Turkey 4.7 billion dollars and the United Kingdom 3.5 billion dollars to the EU in the products subject to the regulation[5]. By the way, the draft proposal underlines in the Article 2 that the regulation shall apply to goods originating outside the Custom Union. If the draft ends in this way, it will be discussed whether Turkey will be subject to regulation or not. So, a clarification of the issue and a close follow up will be needed.

The CBAM was presented as an alternative measure to the free allocation of emission allowances in the EGD document (European Commission, 2019, p. 5). Because both mechanisms aim to avoid carbon leakage, they are seen as substitutes. However, the draft foresees that the **free allocation of emission allowances in the EU ETS will be maintained** for an unspecified period. The lack of detail on the pace that the free allowances will be phased out could be interpreted by trade partners as a "double protection" in the sense of World Trade Organization (WTO) compatibility. Because **continuing free allowances during the implementation of the CBAM is a potential case for WTO compatibility**, the process and timetable of phasing out free allowances is expected to be determined during the reform of the ETS. Aside from WTO compatibility, the continuing supply of free allowances together with the CBAM increases concerns that the measure taken will serve the industrial policy and the competitiveness of EU firms rather than decrease emissions or prevent carbon leakage. The new report prepared by Carbon Market Watch points out the **additional profits for sectors from EU ETS free allowances** between 2008-2019 is estimated at between €30 to €50 billion (Carbon Market Watch, 2021). Thus, the combination of the CBAM being applied to imports along with free allowances for European countries, as suggested in the leaked proposal draft, would most likely be seen as a protectionist measure.

[5] Trademap, author's calculation.

On the other hand, a recent study (Delbeke, Dombrowicki, & Vis, 2021) suggests “the protection that a CBAM may offer against carbon leakage would be limited, while the lost value of free allocation for EU producers may be high”, implying that **the view that the CBAM and free allocation practices are substitutes, is ineffective**. Replacing free allocation with a CBAM would also weaken the competitiveness of EU exporters. Thus, policy makers have the unenviable task of navigating a complex trade-off between supporting competitiveness, a stronger carbon price signal and extra fiscal revenue (Evans, Mehling, Ritz, & Sammon , 2020). According to the draft proposal, revenue generated by the sale of CBAM certificates will be assigned to the EU budget, not a fund which invests in the climate friendly transformation in developing countries, which could also deteriorate the political acceptability (Hedegaard, 2020, p. 3).

The CBAM draft is also problematical on the principle of "Common but Differentiated Responsibility", as the **draft offers no exemption to least developed countries**. Mozambique is a remarkable example of the relative effects of CBAM. As of 2019, the country ranks 11th in the EU's imports under CBAM with a level of 1 billion dollars. Considering that Mozambique's per capita income is 500 dollars and its total exports to the world is $ 4.7 billion, the relative effects of CBAM will be better understood. Apart from being mentioned in roundtable discussions in the OECD regarding border carbon adjustments in October 2020, a pricing mechanism based on absolute costs could bring inequalities between countries of different income levels (Hedegaard, 2020).

The impacts of the CBAM between countries on the macro scale would vary on the basis of three factors: the level of fossil fuel intensity of industries in that country, the EU’s importance in that country’s export markets and the share of products subject to the CBAM in total exports (Bell & Benaim, 2020). Thus, the impact of the CBAM will not only depend on the relative emission intensity of an exporter country and its European counterparts, but also the comparative position of the exporter country with competitors outside the EU. As the relative position of exporter countries differ, the CBAM could reshape the country breakdown of EU imports, meaning some countries would be in a position to benefit from the competition among non-EU countries.

Different Perspectives on CBAM

The other side of the Atlantic has also responded with cautious messages. The United States Special Envoy on Climate, John Kerry, warned the EU that a carbon border tax adjustment should be a 'last resort'. He was 'concerned' about Brussels' plans and urged the EU to wait until after the COP26 climate change conference in Glasgow (Financial Times, 2021). Meanwhile, the so-called BASIC group (Brazil, South Africa, India, China) views CBAM with ‘grave concern’ and underlines that the proposal would contradict the spirit

of the Paris Agreement and the principle of 'Common but Differentiated Responsibilities and Respective Capabilities' (Joint Statement - 30th BASIC Ministerial Meeting on Climate Change, 2021). The Managing Director of the IMF was also circumspect on the subject of carbon border adjustments. In the Leaders' Summit on Climate in April 2021, Kristalina Georgieva stated that carbon adjustments would be less efficient and more contentious than international carbon pricing. She proposed an international carbon price floor among the main emitters covering up to 80 per cent of global emissions (Georgieva, 2021). All of these issues highlight that the **CBAM needs a sustained diplomatic effort and will require openness to other approaches** (Delbeke, Dombrowicki, & Vis, 2021).

Border carbon adjustment mechanisms raise a number of concerns in designing and implementation processes, measurement, reporting, verification, WTO compatibility and concerns surrounding negative impacts on global trade and economic growth. Keeping in mind that a **border adjustment mechanism is one of the multiple possible measures** and because of the concerns mentioned above, the design requires careful assessment with international dialogue and a co-operative approach (Hedegaard, 2020). A poorly designed one could trigger a policy of retaliation which would harm global trade. For instance, developing economies could pool together and create their own carbon border adjustment policy based on per capita emissions, in which developed countries would clearly be disadvantaged (Bell & Benaim, 2020).

The Ministry of Trade of Turkey welcomes the ambition to tackle climate change but emphasizes its concerns that unilateral actions like the CBAM risk creating trade barriers and could be used as a protectionist tool. Turkey's view notes that the carbon border adjustment should comply with the provisions of the Custom Union Decision, as Turkey has an exceptional status in this respect. Another important point to mention in Turkey's view is the funding gap between Turkey and the EU to respond the climate change. The Ministry of Trade underlines "… any measure that may be introduced between Turkey and the EU without the introduction of adequate and equal financing opportunities would significantly harm the level playing field…" (Ministry of Trade, 2020, p. 12).

A Multidimensional Living Process

The EGD changes the name of the production factor from 'nature', which in conservative models was considered as free, to 'natural capital', which should be 'preserved and restored', with a price attached to it is classified as a production cost. By seeking to break the link between growth and resource use, the EC is sending a signal to market participants regarding the direction of technological change, where resource saving technologies will be indirectly rewarded. The EGD, as a mission-oriented innovation and growth

strategy, is a holistic approach which covers production, consumption, investment, trade, competitiveness and finance.

The first sentence of the EGD communication document is important: “This Communication sets out a European Green Deal for the European Union and its citizens”. However, as the Deal mentions that the “environmental ambition of the Green Deal will not be achieved by Europe acting alone” and decides to raise the climate ambition of trade partners using CBAM to avoid carbon leakage, the EGD becomes not just “for the EU and its citizens”, but impacts trade partners, developing countries and the labour markets in those economies. Thus, a cooperative approach which avoids unilateral decision making would minimize the risks of retaliation.

What needs to be done under the European Green Deal requires sustained diplomatic effort. In this process, different political and economic processes within and outside the Union will be effective in the course. For this reason, it is not yet clear in which term and in which form CBAM can be applied, and which countries it will harm, and whether there will be countries that will gain advantage outside the union during this period. But we would like to note some remarkable points.

Concerns About Just Transition:

- Draft proposal (leaked) gives no exemption to Least Developed Countries,
- Carbon pricing based on absolute costs leads to divergent tax burden disregarding the income levels of countries

Concerns About WTO Compatibility:

- Continuing free allocation of emission allowances

  Providing free allowances to European firms allow production without incurring environmental costs, while CBAM implementation causes manufacturers abroad to bear these costs. Thus, phasing out the free allowances is expected to be announced.

Concluding Remarks

The EGD brings some apparent risks, such as saddling exporters with additional costs, eroding competitiveness or loss of market share. In addition to the risks, it should not be ignored that the EGD process may also bring some opportunities. Some of the potential opportunities of EGD under the assumption of “no free allocation of emission allowances” is as follows:

- A comparative advantage based on emission intensity
  It will serve as an advantage for companies which perform well.
- A comparative advantage over the competitors outside the EU
  Depends on the share of fossil fuels in the total energy consumption.
- Competition in Europe's export markets.
  Phasing out free allowances would also increase costs of European firms and erode the comparative advantage in export markets.
- A shift towards processed goods trade
  Because CBAM does not cover the final products (for now), the composition of trade may shift higher up the value chain.
- Possible funding opportunity through the Just Transition Mechanism.
- European firms will have greater motivation in M&A opportunities in waste management and recycling industries in developing countries.

What is clear is that climate is now permanently on the policy agenda. Policy makers in Europe have sent a clear signal about the direction of technological change through the EGD. In Turkey, we also should take heed of this signal and adapt it to our unique conditions, develop a suitable policy framework and execute effective communication towards market participants. Thus, the domestic policy design would be aligned with the global green policy incentives and design mechanisms.

The suggestions to form a Climate Club based on shared CBAM regulation (Tagliapietra & Wolff, 2021) and objections based on the spirit of the Paris agreement (Lee & Baron, 2021) will be followed closely. While it is the European version of the Green Deal which is on the agenda today, an American or Asian version could emerge in the near future, with a version for developing countries emerging thereafter. The only way to be prepared for each version is to head towards the Green transformation.

It is important to consider that stricter climate policies may lead to Green innovations, thus increasing competitiveness in the long run (Porter hypothesis). Studies indicate that significant improvements can be achieved in both national income and greenhouse gas emissions under the Green Economic Transformation scenario for Turkey (Yeldan, Acar, & Atıl Aşıcı, 2020).

Turkey's climate-friendly transformation will be stronger with the support of funds provided by international development finance institutions. Whether the Deal is European or not, after all, the right things should be done for the right reasons.

References

Aiginger, K., & Rodrik, D. (2020). Rebirth of Industrial Policy and an Agenda for the Twenty-First Century. *Journal of Industry, Competition and Trade*.

Beckman, J. M. (2020). *Economic and Food Security Impacts of Agricultural Input Reduction Under the European Union Green Deal's Farm to Fork and Biodiversity.* U.S. Department of Agriculture, Economic Research Service.

Bell, R., & Benaim, E. (2020). *Carbon border adjustment: a powerful tool if paired with a just energy transition.* OECD Development Matters Blog.

Carbon Market Watch. (2021). *Additional Profits of Sectors and Firms from the EU ETS.* Retrieved from https://carbonmarketwatch.org/wp-content/uploads/2021/06/CE_Delft_Additional_Profits_ETS.pdf

Chang, H.-J., & Andreoni, A. (2020, March). Industrial Policy in the 21st Century. *Development and Change, 51*(2), 324-351.

Circle-Economy.com. (2021). *The Circularity Gap Report.* The Platform for Accelerating the Circular Economy (PACE).

Delbeke, J., Dombrowicki, P., & Vis, P. (2021). *Key Issues for the Coming Trade and Climate Debate.* EUI School of Transnational Governance STG Policy Papers, Polic Brief.

Ellen Macarthur Foundation. (2019). *Completing the Picture: How the circular economy tackles climate change.*

European Academies Science Advisory Council. (2015). *Circular economy: a commentary from the perspectives of the natural and social sciences.*

European Comission . (2019, 12 11). The European Green Deal Press Release .

European Commision. (2021). *Global Alliance on Circular Economy and Resource Efficiency (GACERE)*. Retrieved from https://ec.europa.eu/environment/international_issues/gacere.html

European Commission (a). (2020). *A Farm to Fork Strategy for a Fair, Healthy and Environmentally-Friendly Food System.* Brussels.

European Commission (b). (2020). *A new Circular Economy Action Plan.*

European Commission. (2015). *The first circular economy action plan.*

European Commission. (2019). *The European Green Deal (Communication).* Brussels.

European Commission. (2021). *https://ec.europa.eu/environment/topics/waste-and-recycling_en.* Retrieved from Waste and recycling.

European Environmental Bureau. (2020). *EEB assessment of the EU Farm to Fork Strategy.* Retrieved from https://eeb.org/publications/53/farming/101582/eeb-assessment-of-the-farm-to-fork-strategy.pdf

Evans, S., Mehling, M., Ritz, R., & Sammon , P. (2020, May). Border Carbon Adjustments and Industrial Competitiveness in a European Green Deal. *Cambridge Working Papers in Economics*.

Financial Times. (2021, March 12). John Kerry warns EU against carbon border tax. *Financial Times*. Retrieved from https://www.ft.com/content/3d00d3c8-202d-4765-b0ae-e2b212bbca98

Fowlie, M., & Reguant, M. (2018). Challenges in the Measurement of Leakage Risk. *AEA Papers and Proceedings*, 124-129.

Georgieva, K. (2021, April 22). IMF Managing Director's intervention at the Leaders Summit on Climate, Session 2: Investing in Climate Solutions. Retrieved from https://www.imf.org/en/News/Articles/2021/04/22/sp042221-md-remarks-at-the-leaders-summit-on-climate

Hedegaard, C. (2020). *Border Carbon Adjustments: What shape in the post-COVID geopolitical and economic landscape?* Round Table on Sustainable Development.

Joint Statement - 30th BASIC Ministerial Meeting on Climate Change. (2021, April 8). *BASIC Miniterial Meeting on Climate Change*. Retrieved from https://www.environment.gov.za/mediarelease/basic_ministerialmeeting_climatechange_india

Lee, B., & Baron, R. (2021). *Why the EU's proposed carbon border must not be used to launch a carbon club.* World Economic Forum. Retrieved from https://www.weforum.org/agenda/2021/06/eu-carbon-border-clubs-climate

Mazzucato, M. (2018). *Mission-Oriented Research & Innovation in the European Union: A problem-solving approach to fuel innovation-led growth.* Brussels: European Comission.

Mazzucato, M., Kattel, R., & Ryan-Collins, J. (2020). Challenge-Driven Innovation Policy: Towards a New Policy Toolkit. *Journal of Indstry, Competition and Trade, 20*, 421-437.

Ministry of Trade. (2020). *Views of the Government of Turkey on the Carbon Border Adjustment Mechanism Within the Framewok of the Inception Impact Assessment.* Ministry of Trade. Retrieved from https://ticaret.gov.tr/data/5f901d8813b8760d9ce54aeb/AB%20S%C4%B1n%C4%B1rda%20Karbon%20D%C3%BCzenleme%20Mekanizmas%C4%B1%20Etki%20Analizi-%C3%9Clke%20G%C3%B6r%C3%BC%C5%9F%C3%BC_Ek_Turkey%20Views%20on%20CBA.pdf.pdf

OECD (a). (2020). *Climate Policy Leadership in an Interconnected World: What Role for Border Carbon Adjustments?* OECD.

OECD (b). (2020). *The Circular Economy in Cities and Regions : Synthesis Report.*

Tagliapietra, S., & Wolff, G. (2021). *Relaunching transatlantic cooperation with a carbon border adjustment mechanism.* Bruegel. Retrieved from https://www.bruegel.org/2021/06/relaunching-transatlantic-cooperation-with-a-carbon-border-adjustment-mechanism/

Tertsch, H. (2020, July 27). *Farm to Fork Strategy: A Partial Response to Our Farmers' Needs*. Retrieved from euractiv.com: https://www.euractiv.com/section/politics/opinion/farm-to-fork-strategy-a-partial-response-to-our-farmers-needs/

The Oxford Institute for Energy Studies. (2021). *The Challenges and Prospects for Carbon Pricing in Europe.*

World Economic Forum. (2021). *The circular economy can help save the planet – if we start innovating now.* Retrieved from https://www.weforum.org/agenda/2021/02/the-circulars-accelerator-circular-economy-zero-waste/

Yeldan, E., Acar, S., & Atıl Aşıcı, A. (2020). *Ekonomik Göstergeler Merceğinden Yeni İklim Rejimi.* TÜSİAD.

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