

European Green Deal

CBAM: A clear signal to decarbonise. The rest is noise

- High-stakes EU Carbon Border Adjustment Mechanism (CBAM) set to go ahead, ruffling many feathers
- Cutting through the noise, the material issue for CBAM covered sectors is the loss of free emissions allowances
- Our view is this will drive clean investment and accelerate structural change on the path to net zero 2050

Europe looks set to formally adopt a Carbon Border Adjustment Mechanism (CBAM). The CBAM will ensure that certain goods (including iron & steel, aluminium, cement, fertiliser, electricity and hydrogen) face the same carbon price whether they are imported or produced in the European Union (EU).

CBAM in, free allocation out. The CBAM aims to reduce the risk of emissions leakage, replacing the previous leakage policy of free European Union Allowance (EUA) allocation. Free allowances will be phased out from 2026 as CBAM is phased in, with the phase out process complete by 2034 (Figure 1).

Free allocation phase-out is the key material issue. CBAM covered sectors currently receive an emissions subsidy of around EUR20 billion a year that will be removed completely by 2034. This will strengthen the carbon price signal, accelerating investment in decarbonisation and driving significant clean structural change in CBAM covered sectors.

Other key issues to watch. These include: measures to prevent export leakage; responses from trading partners including formation of climate clubs; WTO complaints from developing countries; and reshuffling of global trade flows.

How to prepare? Investors should monitor company CBAM reporting preparation and encourage strong decarbonisation plans. We provide questions for investor engagement on these issues.

Figure 1: Timeline for the implementation of the EU CBAM.



Source: The European Council and Parliament, HSBC

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What is the EU CBAM?

The EU carbon border adjustment mechanism (CBAM) is a policy designed to protect against carbon leakage, while ensuring WTO compatibility. It achieves this by ensuring that certain goods (iron & steel, cement, aluminium, fertilisers, electricity & hydrogen) produced in the EU or imported into the EU face the same equivalent carbon price; it "levels the playing field." This will ensure that the EU's climate objectives are not undermined.

After many years of controversial discussions around the most effective way to protect against emissions leakage and level the playing field, the European Commission adopted a proposal for a CBAM in July 2021. After 18 months of negotiations, the European Council and the Parliament reached a provisional agreement on its design in December 2022.¹ (Figure 1).

The **transition phase** of the CBAM will start from 1 October 2023. From this date, EU importers will be obligated to <u>report quarterly</u> on (1) the quantity of goods covered by the CBAM, (2) embedded emissions from production of their goods (**direct and indirect** emissions), and (3) the carbon price due for the embedded emissions in the imported goods, net of any offset. The aim of this period is to collect data. No financial payments or adjustments will need to be made during the transition phase.

In the transition phase, as noted above, reporting obligations include direct and indirect emissions (scope 1 and 2), but from 2026 only scope 1 emissions are included in the full CBAM. The European Parliament² and Council³ have committed to include indirect emissions (scope 2) in a "well-circumscribed manner" and the *European Commission* will evaluate the approach and calculation methodology by the end of transition period. It will also consider whether to include goods further down the value chain.

From 2026 the full CBAM will be phased in as free allowances are phased out; it will only apply to the proportion of emissions that do not benefit from free allowances (Figure 2). As a result, **the CBAM will only fully apply from 2034** when free allowances are fully phased out. When fully operational it is expected to cover 50% of <u>EU-ETS</u> covered emissions.





Source: European Parliament⁴, HSBC

Formal adoption will come in 2023 once issues related to CBAM are resolved in other legislative processes. One key issue unresolved at the time of the provisional agreement was the phase out of free allowances. This is now agreed.
 European Parliament (2022), Press conference on Carbon Border Adjustment Mechanism on 13 December 2022
 European Council (2022), EU climate action: provisional agreement reached on Carbon Border Adjustment Mechanism (CBAM)

⁴ European Parliament (2022), Climate change: Deal on a more ambitious Emissions Trading System (ETS)





The basic CBAM process is set out in Figure 3. The <u>European Commission</u> recognises that the bureaucratic burden of the CBAM would mostly be borne by EU importers. Third-country producers could choose to import through an EU customs broker, or set up a local EU business unit to act as a declarant for CBAM purposes.

How will the EU's CBAM work?



Check if the goods are listed in the CBAM scope (Annex I)
Iron and steel, cement, aluminium, fertilisers, electricity and hydrogen

Calculate and verify the embedded emissions

By 31 May of each year, the authorised declarant (importer) shall **submit a CBAM declaration** to the CBAM authority, including the following:

- Total quantity of each type of goods
- Total embedded emissions
- The carbon price due in a third market
- A copy of the verification report issued by an accredited verifier

Purchase the CBAM certificate from the CBAM authority

By 31 May of each year, the authorised declarant shall **surrender a number of CBAM certificates** that corresponds to the embedded emissions declared

Source: European Commission and Parliament, HSBC

Box 1: How much will an authorised declarant pay?

The price of a CBAM certificate will be calculated as the average of the closing EU-ETS prices for each calendar week. The European Commission will publish this price on the first working day of the following week and it will apply from the next working day until the first working day of the following calendar week.

If an authorised declarant fails to surrender the required amount of CBAM certificates for imported goods or submits false information, the declarant will be charged three times the average price of CBAM certificates in the previous year for each required certificate.

Why has the EU introduced a CBAM?

The EU Green Deal aims to significantly increase EU climate policy ambition, which will increase the risk of "carbon leakage" (see definition in Box 2). European Commission modelling finds that the CBAM is superior to the leakage policy it will replace, free allowance allocation. It could reduce emissions by nearly 14% compared to a 2030 baseline, have little impact on output, and could reduce leakage by nearly 30% in CBAM sectors. In contrast, the current policy of free allocation could see leakage increase in CBAM covered sectors by nearly 10% by 2030.⁵

5 UNCTAD (2021). A European Union Carbon Border Adjustment Mechanism: Implications for developing countries



Box 2: What is carbon leakage?

The European Commission <u>defines</u> carbon leakage as the transfer of EU production to non-EU countries with lower emission reduction ambitions, or when EU products are replaced by more carbon-intensive imports.

There is considerable debate around the extent of carbon leakage. Research over a decade or more has consistently concluded that climate policy is only one of many determinants of plant and production location decisions.^{6,7} This suggests that leakage caused directly by climate policy should be small in practice, with available evidence supporting this; where it is detected it is mostly confined to carbon-intensive, trade-exposed sectors.⁸

Carbon leakage concerns are rising but are still likely to be small and concentrated Weak evidence of emissions leakage is often explained by low carbon price differentials between countries over the past decade or so. This is starting to change with the EU-ETS price increasing from around EUR30/tCO2 in 2020 to around EUR80 today, well above most other countries.

Other factors that could impact plant and production location decisions and contribute to emissions leakage are also in play. High energy prices, high inflation, raw materials shortages, and increased trade competition, e.g. the US Inflation Reduction Act subsidies, being the most prominent.⁹ Together these factors increase risks to international competitiveness and emissions leakage, in particular for trade-exposed, emissions-intensive industries. But the direct impact from climate policy is still expected to be small.

CBAM will replace the flawed leakage policy of free allocation Despite the weak evidence of emissions leakage caused by climate policy, the EU decided to mitigate the risk for trade-exposed, emissions-intensive industry by granting free EU-ETS emissions allowances (EUAs). Free EUAs are allocated using a <u>benchmarking process</u>, with sectors deemed to be exposed to a high risk of carbon leakage receiving 100% of their EUA's for free.

However, there is evidence that free allocation weakens the incentive to invest in decarbonisation, e.g. invest to drive substitution from high to low-carbon production and greater material efficiency and recycling. There is also evidence that free allocation simply generates windfall profits for certain sectors, e.g. the cement industry (see case study below).

This is at odds with the EU's desire to ramp up its rate of decarbonisation and transition to a low-carbon economy by 2050.

Free EUA allocation also significantly reduces EU Member State's EUA auction revenues, most of which are used to fund climate and energy-related investments. In 2021, EUA auctions generated total revenue of over EUR 31bn, of which 76% was spent on climate and energy-related projects.¹⁰

In response, the EU has decided that a CBAM will replace free EUA allocation as the main leakage policy. This will restore the incentive to decarbonise and accelerate the low-carbon transition, while protecting emissions intensive, trade-exposed industry.

⁶ Stern (2006), The Economics of Climate Change: The Stern Review

⁷ Dechezlepretre, A., and M. Sato. (2017), The impacts of environmental regulations on competitiveness. Review of Environmental Economics and Policy 11: 183–206.

⁸ Zachmann, G. and B. McWilliams (2020), A European carbon border tax: much pain, little gain, Policy Contribution 05/2020, Bruegel

⁹ The European Commission has announced that it will put forward a Net-Zero Industry Act in response. 10 European Commission (2022), Report on the functioning of the European carbon market



What investors need to watch during the transition period

	The CBAM is a very complex policy that has little historic precedent. There are unknowns around its implementation and possible unforeseen impacts. We pick up on some of the major issues that investors need to watch over the transition period.
Measures to prevent export leakage are unresolved	Policy to protect export competitiveness The EU is planning further work on measures to prevent "export leakage". What is export leakage? It is the situation where EU exporters face higher costs from climate policy (e.g. higher input prices if they use CBAM covered goods in production), while at the same time exporting to highly competitive markets not subject to equivalent climate policy. This may result in companies scaling back production for export or shifting production and exports offshore. ¹¹
	Research finds that rebates are important for addressing CBAM export leakage. ¹² For example, without export refunds, at a carbon price of EUR30 per tonne of CO2, around 30% of EU exports would face cost increases exceeding the criteria used by the EU to define sectors eligible for free allowances to address carbon leakage risks in the EU ETS. ¹³ However, the EU has said that export rebates are problematic as they would likely breach WTO rules prohibiting export subsidies.
	One solution is to combine the CBAM with free allocation for exports. ¹⁴ The European Commission will consider this issue by 2025 and propose a WTO-compliant solution. It also says it will use the finance generated from 47.5 million allowances to address export-related leakage risk. ¹⁵ However, the timeline and mechanism to help exporters is not yet clear. We expect to see significant lobbying from companies around this issue over the coming years, especially as the CBAM review approaches in 2025.
Only explicit carbon pricing is valid for deductions	Climate policy instruments recognised for calculating import tariffs The CBAM is designed to incentivise the EU's trading partners to adopt stronger <u>explicit</u> <u>carbon pricing</u> – an emissions trading system or a carbon tax – and as such it only allows for a reduction in CBAM certificates based on <i>explicit</i> carbon pricing already paid in third countries.
	However, diversity of regulatory approaches is increasing around the world. The EU's trading partners are unlikely to uniformly adopt explicit carbon pricing. Indeed, the Paris Agreement was designed around the concept of Nationally Determined Contributions (NDCs), where countries are able to adopt nationally appropriate mitigation actions consistent with the principle of common but differentiated responsibilities. ¹⁶ For example, the US Inflation Reduction Act (IRA) relies on direct subsidies, not explicit carbon prices. This is likely to be a major issue that the European Commission will need to address in EU CBAM design.
Compatibility with WTO rules is a priority for the European Commission	Issues around WTO compatibility While the EU says the policy is designed to be WTO rule compliant, it remains uncertain if other countries will formally raise objections to the policy, in particular if export rebates are considered. The WTO has indicated that the calculation of embedded emissions and the type of climate policy that is eligible for rebates/discount could be complicated and contentious, but its rules do not prevent adoption of the CBAM if it does not constitute unjustifiable discrimination. ¹⁷
	 11 The European Commission has recommended that these producers source low-carbon substitute to contain costs. 12 Branger F, Quirion P (2014) Would border carbon adjustments prevent carbon leakage and heavy industry competitiveness losses? Insights from a meta-analysis of recent economic studies 13 Stern N and Lankes HP et al. (2022) Collaborating and Delivering on Climate Action through a Climate Club: An

13 Stern N and Lankes HP et al. (2022) Collaborating and Delivering on Climate Action through a Climate Club: An independent report to the G7. London: London School of Economics and Political Science.
14 Evans S, Mehling MA, Ritz RA, Sammon P (2021) Border carbon adjustments and industrial competitiveness in a European Green Deal, Climate Policy, 21:3, 307-317.
15 European Parliament (2022), Climate change: Deal on a more ambitious Emissions Trading System (ETS)
16 UNCTAD (2021). A European Union Carbon Border Adjustment Mechanism: Implications for developing countries. United Nations Conference on Trade and Development United Nations Conference on Trade and Development. 17 WTO (2021), DDG Paugam: WTO rules no barrier to ambitious environmental policies



Exports of developing

countries could be

disadvantaged

Even if a country decides an issue warrants WTO involvement, the body remains significantly weakened by the previous US Trump administration, e.g. the appellate body is still not functioning.¹⁸ This implies that any legitimate issues raised by third countries will likely need to be solved through bilateral political negotiations with the EU.

The impact on developing countries

Developing countries, in particular where their CBAM covered exports to the EU represent a significant share of total exports in a particular sector, could be disadvantaged. These countries are less able to implement ambitious explicit carbon pricing, e.g. many have relatively undeveloped developed tax systems that would not support implementation of an explicit carbon tax. They may instead decide that adjusting fuel taxes to reflect their carbon content is a more appropriate policy.

There are a number of studies examining potential impacts of CBAM on developing countries with African and Arab states particularly hard hit given the high emissions embedded in their products, e.g. Cameroon, Egypt, Nigeria, Congo, and Ghana.¹⁹ The negative impacts could be tackled most effectively through stronger dialogue, avoidance of double compensation for EU industries, potential exemptions and a supply of wider aid measures, including through CBAM revenues.²⁰ Some have suggested that CBAM revenues can be used to fund a Marshall Plan to rebuild the Ukraine economy post-war (*EURACTIV*, 29 July 2022).

The CBAM regulations do require the EU to provide financial support to least developed countries and the amount should correspond at least to the level of revenue from selling CBAM certificates. However, the regulation does not guarantee additionality of the funding to any existing climate finance. In addition, without a strong WTO, these countries are unlikely to have much bargaining power in any bilateral political negotiations with the EU.

Global trade flows might re-shuffle

The CBAM already appears to

be influencing climate policy outside the EU

Impacts on global trade flows

The CBAM may impact global trade flows, with countries re-shuffling their exports to send cleaner product to the EU and dirtier product to other markets, rather than adopt a carbon price. This implies the CBAM may do little to encourage decarbonisation beyond the EU's borders. It may also see developing countries flooded with cheap and dirty imports redirected away from the EU.²¹ Research on the only CBAM policy in existence today supports this assertion. California's cap-and-trade system applies a CBAM type policy in its electricity sector, which is heavily interconnected with other US states. Assessments conclude that participants have set up contractual arrangements to ensure electricity imported into California is low-carbon, while high-carbon electricity is diverted to other US states where carbon prices are absent.²²

Impact on climate policy in the EU's major trading partners CBAM is designed to push the EU's trading partners to adopt and strengthen carbon pricing. The reaction to CBAM from countries is mixed, with a negative reaction possibly indicating a heightened risk of resource shuffling.

Mainland China²³ and India,²⁴ amongst others, have shown strong objections against the CBAM proposal while some jurisdictions such as Singapore and Uruguay²⁵ have indicated the CBAM proposal would be a driver to adopt or enhance their carbon pricing mechanisms (Figure 4).

¹⁸ At the time of writing, the WTO website states "the appellate body is unable to review appeals given its ongoing vacancies."

¹⁹ UNCTAD (2021). A European Union Carbon Border Adjustment Mechanism: Implications for developing countries. 20 IEEP (2021), What can climate vulnerable countries expect from the CBAM

²¹ Editorial opinion, The EU's pioneering carbon border tax, Financial Times, 11 January 2023.

²² OECD (2020), The Climate Challenge and Trade: Would border carbon adjustments accelerate or hinder climate action? 23 Reuters (2021), China says EU's planned carbon border tax violates trade principles

²⁴ Bloomberg (2021), India Will Oppose 'Unfair' Carbon Border Tax Plans at COP26

²⁵ World Bank (2022), State and Trends of Carbon Pricing 2022



Jurisdiction	Carbon pricing mechanism updates
Singapore	In February 2022, Singapore announced a five-fold increase in carbon prices by 2030 from S\$10-15 to S\$50-80.
Taiwan	In January 2023, Taiwan updated its <u>Climate Change Bill</u> which proposed a carbon tax and cap-and-trade system.
Vietnam	In January 2022, Vietnam issued <u>Regulations on Reduction of Greenhouse Gas Emissions</u> which specifies a timeline for implementation of a emissions quota trading scheme – launching a pilot ETS in 2026 and a full ETS in 2028
South Korea	In November 2022, the Ministry of Environment of South Korea outlined an <u>emission trading improvement plan</u> to reform its existing ETS
Colombia	In December 2021, the Climate Action Law of Colombia came into force in December 2021. The law sets a goal of fully implementing an emissions trading scheme by 2030

Figure 4: Key updates of global carbon pricing mechanisms since the CBAM proposal

Source: Monetary Authority of Singapore, Taiwan Environmental Protection Administration, the Ministry of Environment of South Korea, The World Bank Carbon Pricing Dashboard, HSBC

...and other carbon border taxes and climate clubs

In addition to incentivising the adoption of explicit carbon pricing, **the CBAM is triggering discussions around the adoption of carbon border taxes in other developed countries**, e.g. the <u>US</u>, <u>UK</u> and <u>Canada</u> are now seriously considering CBAMs and a number of other countries have started to consider the idea. It will also push forward the concept of "Climate Clubs"²⁶.

A **G7 climate club** will be launched by COP28 (which will be held from 30 November to 12 December, 2023) after the G7 leaders' endorsement of the <u>Terms of Reference</u> for the Climate Club (released in December 2022). The terms of reference state industry and leakage will be a focus of the club.

The purpose of a Climate Club should not be to create one common CBAM across club members. Instead it could **ensure that CBAMs adopted by its members operate within mutually agreed "guard rails"**. These might include common protocols and methodologies for crediting foreign carbon pricing and related regulations or incentive structures, or forms of best practice to ensure that the various regimes work to prevent leakage without being unfair, untransparent, bureaucratic, complex, overly broad or protectionist.²⁷ Climate clubs could be an important mechanism to prevent a range of poorly coordinated CBAMs developing across major trading nations and also prevent resource-shuffling.

Evidence of CBAM impacts on EU trading partners

Impacts of the CBAM on the EU's trading partners are likely to be concentrated A report from E3G shows only around 3% of goods imported to Europe are covered by the CBAM.²⁸ This suggests any **negative impacts from CBAM are likely to be small.**

The impact is also expected to be concentrated. Pre-COVID trade data suggests impacts will be concentrated among a relatively small number of the EU's major trading partners (Figure 5), and that the CBAM share of trade in the covered sectors of these countries is quite small, especially compared to their overall exports to the EU and the rest of the world.²⁹ (The figures for the Russian Federation are pre Ukraine conflict and will now likely be significantly lower on a permanent basis).

²⁶ Stern N and Lankes HP et al. (2022) Collaborating and Delivering on Climate Action through a Climate Club: An independent report to the G7. London: London School of Economics and Political Science. 27 Stern N and Lankes HP et al. (2022) Collaborating and Delivering on Climate Action through a Climate Club: An independent report to the G7. London: London School of Economics and Political Science 28 E3G (2021). A Storm in a tea cup.

²⁹ Chatham House (2021), Which countries are most exposed to the EU's proposed carbon tariffs?





Figure 5: EU-27 imports of goods covered by the CBAM proposal, top 20 exporters, annual average 2015-2019 (pre-COVID data).

Source: resourcetrade.earth, Chatham House (2021), HSBC

One country where impacts could be more sizeable is the United Kingdom (UK). Research suggest affected UK sectors could face a CBAM tax liability of around EUR1 billion per year.³⁰ The recent <u>UK Net-Zero review</u> recommends the UK government speed up its decision making on carbon leakage policy, including considering a UK CBAM. Some less developed countries may also face challenges as described above.

Companies outside the EU will also need to ensure that they prepare for CBAM. If a company wishes to sell CBAM covered goods into the EU it will have to implement carbon accounting to track the embedded emissions associated with these products (and have these embedded emissions independently verified), as this product-specific information must be provided to the authorised declarant upon importation.^{31,32}

EUR1 billion

Annual est. CBAM tax liability for the UK

31 KPMG(2022), Impact of the EU's Carbon Border Adjustment Mechanism

³⁰ LSE (2021), What does an EU Carbon Border Adjustment Mechanism mean for the UK?

³² New companies will also face additional CBAM administrative costs. The CBAM regulation states that companies less than two years old seeking import authorisation from the CBAM authority will have to provide a guarantee that they are able to cover the predicted cost of purchasing CBAM certificates for the current and forthcoming year.



Most CBAM covered sectors oppose the new policy	There is a lot of noise from EU CBAM sectors and companies. Most CBAM covered sectors in the EU oppose the new policy. Sector bodies and companies claim that the loss of free allowances will reduce revenues available to pay for their decarbonisation. However, as described in the cement case study (Box 3), there is no evidence they have been using these revenues for decarbonisation.
	They also claim they will face higher input costs in production (although this could imply they are using cheaper dirty imported inputs). This not only has the potential to reduce their export competitiveness, as discussed above, but could also reduce domestic manufacturing competitiveness, e.g. a washing machine manufactured in the EU that uses imported dirty steel will face higher input costs, but an equivalent imported machine manufactured in a non-EU country made from non-EU steel will avoid the CBAM. Companies claim they may reduce or exit EU domestic production, substitute EU manufacturing with imported finished goods, or relocate production to countries with less ambitious climate policy, transferring emissions abroad.
They claim employment and output might be affected	Many go as far as predicting dire outcomes for employment and output. The European Steelmakers Association EUROFER has warned that free allowance phase-out risks EU steel exports worth EUR45 billion. ³³ The EU Fertiliser industry has warned that the CBAM will push up the cost of fertiliser production in Europe, reducing the competitiveness and resilience of the EU fertiliser industry (<i>EURACTIV</i> , 15 December 2022). As non-EU fertiliser production has significantly higher emissions intensity, this could push up emissions from the sector globally. The German steel industry continues to claim, contrary to the evidence, that free allowances are the best way to achieve innovation and decarbonisation, and that replacing free allowances with the CBAM could cost 40,000 jobs and shift production offshore.
The real issue appears to be a loss of a significant emissions subsidy	The perceived impacts on output, emissions, and employment contradict the European Commission modelling (see above), which finds the CBAM will reduce emissions and have a negligible impact on output.
	Cutting through all the noise from industry, our view is that resistance from sectors and companies largely stems from the loss of free allowances, which represents a sizeable emissions subsidy that shields them from more rapid decarbonisation and delivers windfall profits in some cases.
	A rough calculation reveals the extent of the subsidy. Around 500 million free allowances were allocated to EU countries in 2022 to distribute to covered installations / companies. ³⁴ At the current EU carbon market price of around EUR80 per tonne of CO2 this is equivalent to around EUR40 billion per year. As the EU CBAM will cover roughly 50% of free allowances handed out to industry, <i>CBAM sectors stand</i> to <i>lose a EUR20 billion per year emissions subsidy by</i>

majority of the total subsidy that will be lost (Figure 6).

Cutting through the noise from EU sectors and companies

2034 when free allowance phase out is complete.³⁵ Iron & steel and cement account for the

³³ EUROFER (2022), ETS revision sets stronger incentives for clean technologies uptake, but EUR45 bn EU steel exports are still at risk

³⁴ European Commission (2022), Status table on the allocation of free allowances for 2022. And the <u>Union Registry</u>. 35 With carbon prices likely to rise to 2030 and beyond this is likely to be an underestimate (assuming weak decarbonisation in these sectors caused by the subsidy).





Figure 6: CBAM covered sectors: free allowance loss and estimated value

Source: Union Registry, HSBC estimates

Note: Electricity producers have not been entitled to free allowances since 2013

EU companies need to embrace, not resist, the clean transformation and invest to capture opportunities in a changing world The EU is committed to its 2050 emissions goals and achieving these implies emissions intensive industry can no longer be shielded from low-carbon structural change by free allowances. Companies affected by CBAM are a central part of a policy induced, dynamic, non-marginal transition to a low-carbon European economy.

The CBAM and free allowance phase out is designed, quite deliberately, to force companies to change and adapt by investing more in clean research, development and deployment (RD&D). This will enable switching to new, cheaper, clean technologies and inputs, including throughout their supply chains, reducing emissions.

The learning-by-doing and innovation RD&D investment drives will make change far less painful than industry is predicting in their static assessments of CBAM impacts. For example, the European Commission has stressed in its fertiliser strategy that there are significant opportunities to expand production of green ammonia produced with renewable energy.

Some companies in CBAM covered sectors are already leading. For example, the Norwegian company Blastr Green Steel (Blastr) is planning to establish a green steel plant with an integrated hydrogen production facility in Inkoo, Finland (EURACTIV, 4 January 2023).

A more detailed example of the cement sector is provided in Box 3. This shows the impact of free allowances on the industry, the structural transformation that the CBAM will trigger, and the companies that are comparatively well-placed to succeed in decarbonisation.

To assist with funding RD&D, the European Commission is also increasing innovation funding, with Pascal Canfin estimating support is available of around EUR50 billion.

The European Commission could make even more innovation funding available by redirecting the emissions subsidy into the Innovation Fund, which is well structured to support early stage R&D projects of the type the CBAM covered sectors need to ensure long-tern decarbonisation and competitiveness. A productive response to CBAM from companies could be to lobby for this option.



Box 3: Case study - cement and CBAM

The major EU cement producers are clear that free allowance allocation should be maintained as the CBAM is introduced, not phased out as planned. However, there appears little justification for this and the European Commission has stated that this would be problematic for WTO compliance.

In practice, HSBC cement analysts suggest that the threat of carbon leakage in cement, i.e. replacing EU cement with dirty imports, is already very low for the industry. Despite a rise in imports into Europe in 2020-21, the share of imports in total consumption remains low at below 10% and limited mostly to bordering countries, i.e. Italy, Spain and Greece. This also includes imports made by the incumbents from the low cost producing countries, mainly Turkey and also Algeria, Morocco. However, imports remain a low risk as most port capacity is controlled by the established European producers. (Only small quantities can come via road). Therefore, as the threat from carbon intensive imports is already low, a CBAM on cement imports is unlikely to have a material impact for EU countries. Introduction of CBAM and phasing out of free allocation would lead to a further consolidation of the cement industry with the exit of smaller players due to a rise in the cost of production and also the need to invest to reduce carbon intensity.

Consistent with this, the industry previously supported a CBAM, but has now changed its position. Why? The most likely reason for this is loss of the free allocation subsidy, which has delivered substantial **windfall profits** to cement companies and **maximised gross margins**. There is also evidence that instead of using this benefit to decarbonise, free allocation has enabled the industry to maintain inefficient installations and increase export of clinker to Africa.³⁶

The loss of free allowances will restore the incentive to decarbonise and require innovation and change. This should be possible. HSBC research finds that 2030 carbon reduction goals for the sector are achievable with "...capital investments, including switching to alternative fuels and reducing clinker content of cement, having attractive payback periods (five years or less)."

Longer term decarbonisation prospects remain challenging, as key solutions are not yet commercialised, e.g. CCUS, hence the need for additional R&D today. The CBAM and withdrawal of the substantial emissions subsidy will drive the long term investment needed by the industry to remain competitive and profitable during the transition to a low-carbon economy.

³⁶ Vanderborght, B. 2017. Why is the cement industry resisting a CO2 border measure? Carbon Pulse.



Finally, the importance of the CBAM and free allowance phase-out goes far beyond achieving EU emissions targets. It is essential to the survival of these emissions-intensive, trade-exposed industries in a rapidly changing world, with companies having to navigate the transformation of the energy and global production map. Box 4 sets out how clean technology is starting to reshape the geography of trade and production in energy-intensive, trade-exposed industries. Decarbonisation is a must if EU energy-intensive, trade exposed industry is to survive global structural economic change over the coming decade.

Box 4: New forces shaping the geography of trade and industry³⁷

While industrial location in the past was shaped by endowments of coal, oil, iron ore, and other raw materials relative to demand markets, future choices - factoring in the possibilities of direct and indirect electrification of industrial processes - will give greater weight to the availability of reliable, low-cost, low-volatility renewable power.

There are also possibilities for tapping differences in geographic endowments (wind in the north of Europe and sun in the south) and for integrating renewable energy within and across countries, e.g. the proposed "one world, one sun, one grid" initiative.

The result will be a different energy and industrial production map, especially in emissionsintensive trade-exposed industries such as steel, aluminium and base chemicals.

The phase out of free allowances will hit companies hardest that fail to decarbonise and resist structural transformation. Investors will need to assess any measures the EU adopts on export competitiveness and new support for innovation investment, but also whether decarbonisation targets and plans of companies reflect the coming global clean structural transformation. New guidance from the Transition Plan Taskforce and the UN integrity Matters report can provide helpful guidance for analysts.³⁸

³⁷ Stern, N. and Romani, M., 2023. The global growth story of the 21st century: driven by investment and innovation in green technologies and artificial intelligence 38 Transition Plan Taskforce (transitiontaskforce.net) and UN high-level_expert_group_n7b.pdf (un.org)



Investor engagement questions and corporate action checklist

Investors need to engage with companies in CBAM covered sectors to ensure they are embracing a clean structural transformation of their business. We suggest five questions investors should ask companies in CBAM covered sectors (Figure 7). Investors also need to ensure importing companies are ready for the start of the CBAM reporting period in October 2023. Various sources and checklists are available to assess CBAM reporting preparation, for example, from KPMG.³⁹

Figure 7: Five investor engagement questions for companies in CBAM covered sectors



Source: HSBC

Conclusion

The CBAM will replace a significant emissions subsidy, which is holding back faster decarbonisation in sectors key to meeting the EU's 2030 and 2050 emissions targets. Now is the time to expose these industries to the full carbon price signal, while taking appropriate measures to protect against emissions leakage, which we argue will be low.

A strong carbon price signal will incentivise investment in R&D and deployment of new technologies that will allow for deep decarbonisation. The EU is deliberately replacing a subsidy with clean innovation and structural change. Investors need to watch for companies that resist change and or are unable to adapt as they will face rising transition risk over the coming decade.



Disclosure appendix

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