



**BRIEFING - June 2024**

# **Strike a **balance** - Trade agreements for resilient **and** responsible supply chains**

5 recommendations for trade policy makers

# Summary

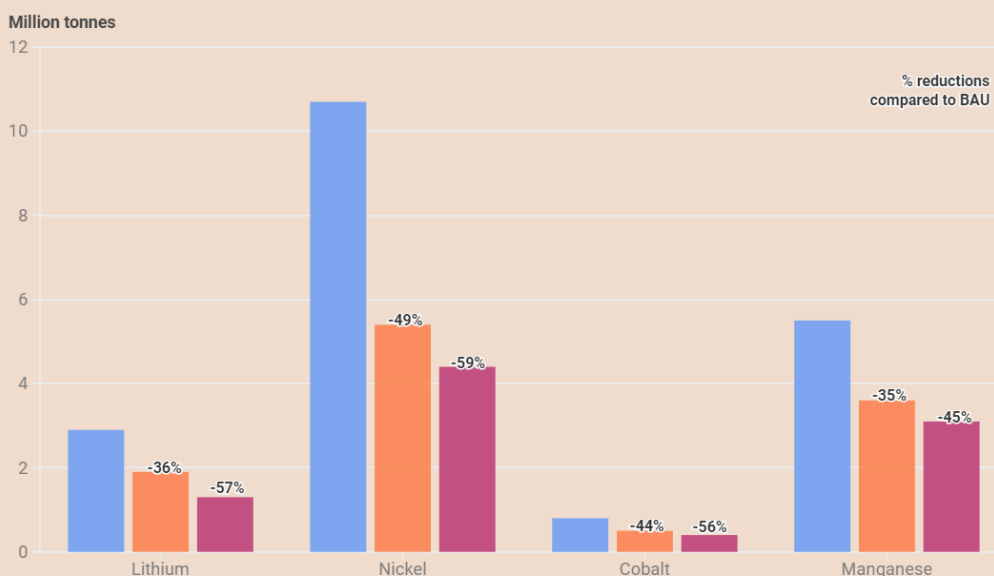
To secure the demand for battery minerals, the EU needs to set the right trade framework to boost resilience, sustainability and mutual benefit. Free Trade Agreements are one way to strike this balance.

As Europe races to secure the critical mineral needs for clean energy technologies, such as electric vehicles (EVs), agreeing trade partnerships will be critical as annual battery metal volumes in 2050 are estimated to be 4 to 10 times higher than today. Even in the scenario of accelerated innovation and smaller batteries, the electrification of EU passenger transport will still require around 5.4 Mt of nickel and 1.9 Mt of lithium.

While the long-term vision is circularity, Europe will be dependent on imports for decades to come. By 2030, the EU will rely on foreign imports of battery metals in the order of 30% to 65%, depending on the metal.

**Cumulative battery raw materials demand until 2050 from electrifying cars, buses and coaches in Europe**

■ Business as usual ■ Accelerated innovation & fewer car km ■ Aggressive innovation & fewer car km



Source: T&E analysis



The need for more critical minerals requires a strategic reassessment of the EU's global approach to producer countries in order to secure required materials, scale sustainable and responsible sourcing and processing practices, and avoid over-concentration. Free trade agreements (FTAs) are a crucial piece in the larger puzzle of building diversified supply chains, alongside Strategic Partnerships or the recently adopted EU Corporate Sustainability Due Diligence Directive (CSDDD).



By providing a structured framework, FTAs can help the EU to act as a reliable and cooperative partner and provide a legally binding framework with clear obligations on both sides. Well-designed FTAs can secure unrestricted trade flows, encourage EU companies to invest in local processing facilities, help producing-countries to scale their green industrialisation and increase sustainability through consistently applying Environmental Impact Assessment and supply chain due diligence.

T&E has commissioned Tulip Consulting to conduct a legal study to explore how FTAs can promote mutually beneficial trade in critical raw materials for all parties involved. This means securing the minerals the EU needs for the energy transition while promoting responsible practices and adding value in resource-rich countries. This briefing summarises how this can be done, serving as a memo for trade policy-makers.

To make FTAs work for both parties, T&E suggests that policy-makers should:

### **1. Allow favourable raw material prices for producer countries' own green goals**

Allowing resource-rich countries to tender their raw materials cheaper locally, as is done in Chile, can make value addition more attractive. To this end, FTAs should include specific carve-outs in dual pricing provisions to allow producing countries to sell raw materials more cheaply to local downstream sectors. The EU should ensure that appropriate conditions are attached to these carve-outs, such as implementing a workable or eliminating a price floor, to reduce overly stringent requirements to trigger these carve-outs. At the same time, export restrictions should be prohibited, including to other parties apart from the EU.

### **2. Enhance best practices in the extractive sector**

While extractive operations can damage the environment and local communities, best practices to reduce impact exist and should be consistently implemented. FTAs should incorporate due diligence requirements specific to mining activities, including management plans for water, waste, biodiversity and mine decommissioning.

In addition, FTAs should require mandatory compliance with international due diligence standards, i.e. those set by the OECD on human rights and environment.

### **3. Strengthen Environmental Impact Assessments**

Environmental Impact Assessments (EIAs) are vital for identifying project flaws, improving future activities and enhancing responsible supply chains by gathering key data for mitigation and improvement. While many FTAs already refer to EIAs, the use and extent of those assessments varies from agreement to agreement.

Trade policy-makers should make EIAs mandatory for all relevant activities with a significant impact on the environment, without jeopardising national permitting deadlines or faster processes for strategic projects. The scope of EIAs should be expanded to include impact on public health, biodiversity, land, soil water, air, climate and cultural heritage and acting upon EIA findings made mandatory.

#### **4. Beef up technical and financial assistance**

Many of the requirements to strengthen sustainability will fall on resource-rich countries, who often lack the financial and technical resources to address these effectively. While binding technical and financial assistance provisions have been uncommon in FTAs to date, the new EFTA-India FTA does set binding investment targets for the EFTA bloc and can serve as a blueprint.

FTAs should include financial support and technical assistance as a standard, including dedicated financial support for sustainability initiatives in resource-rich countries. Implementation and monitoring of these commitments should be incorporated into the review progress.

#### **5. Green premium for sustainable raw materials**

Sustainably and responsibly sourced critical minerals often require higher initial investment into best available technology, such as fossil free processing technologies, clean water and safe waste disposal. The problem is that this is currently not rewarded on commodity markets and cleaner projects struggle to compete with cheaper, high-emitting supply as currently seen with nickel from Indonesia.

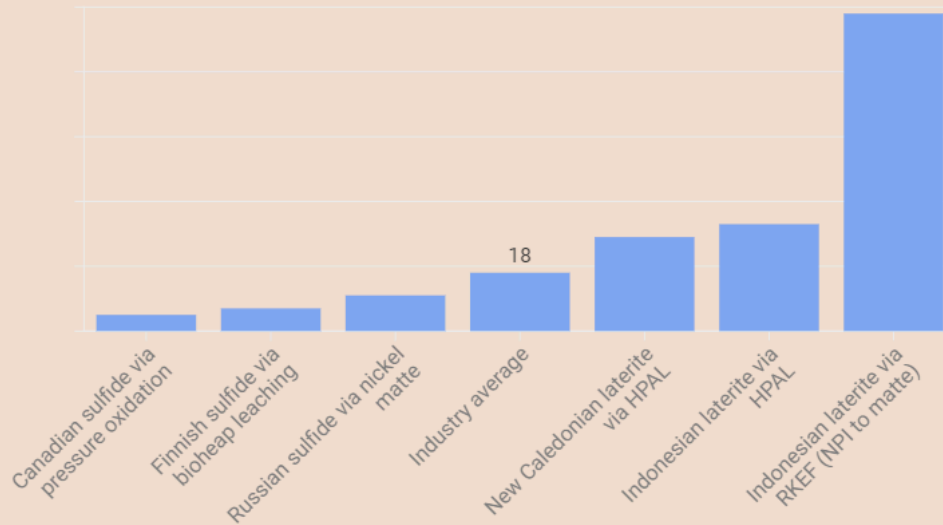
Rewarding cleaner supply on western markets through joint efforts can create the necessary investment incentives. Initiatives such as the currently negotiated EU-US Critical Minerals Agreement or the Minerals Security Partnership could facilitate the uptake of responsibly sourced, low-carbon minerals.

In the short term, T&E recommends like-minded governments to agree on a clear CO<sub>2</sub> threshold as an access condition to the markets of - e.g. - the EU, the US, Japan, South Korea and others. Supply coming from sources that do not meet the criteria should pay a penalty or not be admitted. In addition, purchasers of those materials should be required to implement the OECD human rights and environmental due diligence and require the suppliers to undergo at least one self-assessment under the Initiative of Responsible Mining Assurance (IRMA) by 2026.

In the case of nickel, T&E has identified that setting a CO<sub>2</sub> threshold of 30-40 kg CO<sub>2</sub>e per kg of nickel sulphate (or nickel metal) would support the market for cleaner nickel facilities.

## GHG emissions from nickel sulphate production

kg CO2e per kg nickel in nickel sulphate



Source: Minviro, Nickel Institute • Note: Industry average as calculated by the Nickel Institute ("Nickel Sulphate Life Cycle Data", 2021)



Ultimately, achieving the energy transition and building resilient, responsible battery supply chains depends on global collaboration. FTAs can help by allowing producing countries to benefit from their resources while attracting the necessary investment from European companies, particularly in the midstream battery value chain needed to meet the demand for European battery production. Addressing this challenge in a sustainable way with best practices in community engagement, sourcing and waste management is the challenge of the 21st century, underlining the importance of decision-makers adopting innovative approaches and forward-looking strategies.



# Introduction

The demand for critical raw materials (CRMs), essential for the advancement of clean energy technologies such as electric vehicles (EVs), has triggered a global race to secure these vital minerals. T&E analysis has pointed out that under a *Business as usual scenario*, 27 TWh of batteries will be needed in Europe cumulatively until 2050 which is equivalent to 2.9 million tonnes (Mt) of lithium, 10.7 Mt of nickel, 0.8 Mt of cobalt and 5.5 Mt of manganese.<sup>1</sup> Even in the scenario of *Accelerated battery chemistry innovation and smaller batteries*, Europe will still require a total of 19 TWh of batteries equivalent to 1.9 Mt of lithium, 5.4 Mt of nickel, 0.5 Mt of cobalt and 3.6 Mt of manganese in 2050.

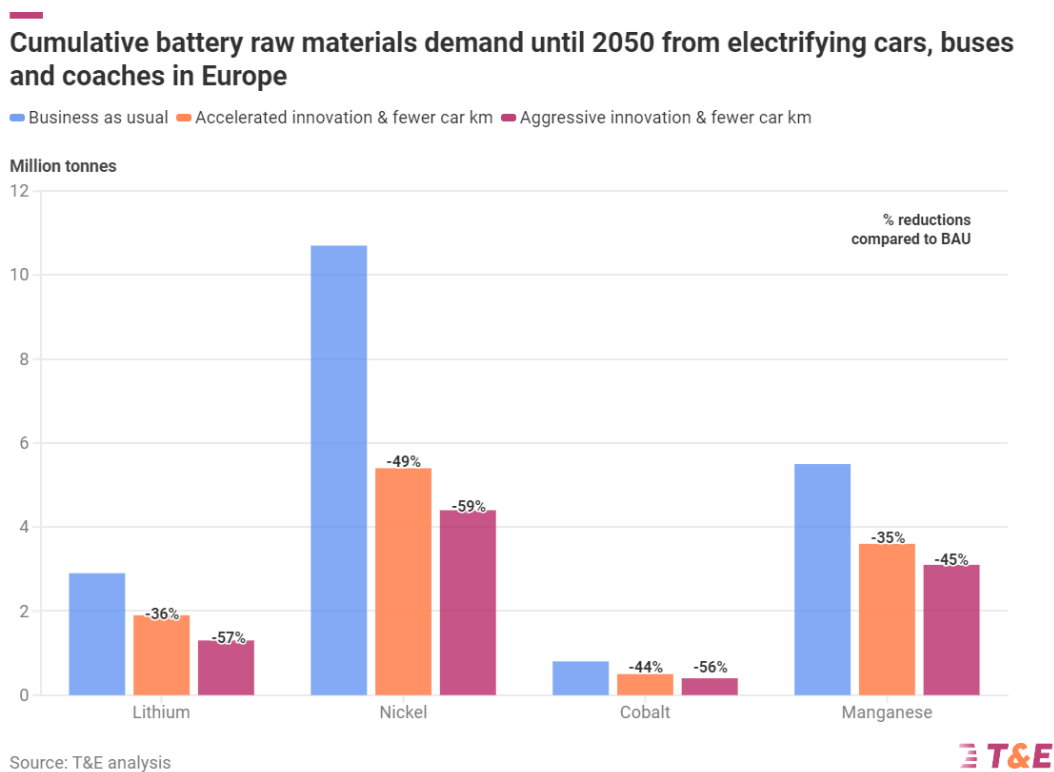


Figure 1: Cumulative battery raw materials demand until 2050 from passenger transport in Europe

In all scenarios, annual volumes of battery metals in 2050 are estimated to be 4 to 10 times higher than today, and cumulatively up to 200 times higher than the 2022 EV battery industry consumption<sup>2</sup>. Hence, even with ambitious circularity and demand reduction policies, Europe will remain dependent on global imports of these materials for many years. This dependency necessitates a strategic reevaluation of the EU's global approach towards resource-rich countries and its trade relationships.

The EU must strive to develop open and diverse markets to avoid over-concentration, secure trade routes, champion sustainable and responsible practices and become an attractive partner

<sup>1</sup> T&E (2023): Clean and lean: Battery metals from electrifying cars, buses and coaches

<sup>2</sup> While this translates into 20 Mt of lithium, nickel, cobalt and manganese, it is well below the current annual oil consumption of around 170 million tonnes of oil equivalent (expected to fall to around 20 million tonnes of oil equivalent by 2050).

compared to other countries like China and the US. Diversification and stronger relationships with sourcing countries are crucial, as over-reliance on a few suppliers can lead to significant vulnerabilities jeopardising the energy transition.

At the same time, resource-rich countries are increasingly focused on maximising the value derived from their resources, leading to more export restrictions and higher tariffs on raw materials, including unprocessed ores and processed concentrates. These countries aim to capture more value mid and downstream, which will need to be acknowledged in trade relationships. Additionally, each transition mineral has its unique risk exposure. For instance, graphite, cobalt, rare earth elements and nickel are particularly vulnerable to geopolitical risks. Furthermore, most minerals come with high environmental risks, as current refining operations often occur in regions with high carbon intensity, primarily relying on coal-based electricity. All these factors force the EU to rethink and actively adapt its trade relationships to respond adequately to this multifaceted challenge.

To address these challenges in securing the future supply for the EU's cleantech industry, the EU has several tools at its disposal. While new tools such as Strategic Partnerships have been increasingly applied to foster market diversification, these initiatives mainly serve as diplomatic and non-binding tools. More traditional approaches like Free Trade Agreements (FTAs) remain essential to establish a more reliable and structured relationship. FTAs provide a legally binding framework with clear obligations on both sides, enhancing the resilience and sustainability of these supply chains if dedicated provisions are agreed upon. These agreements can significantly bolster the minerals supply chains necessary to meet the clean transportation targets set out in the Green Deal.

Well-designed and balanced FTAs can be considered a crucial piece in the bigger puzzle of building diversified supply chains with responsibly sourced minerals, alongside Strategic Partnerships, the EU Batteries Regulation, and the EU Corporate Sustainability Due Diligence Directive (CSDDD). Offering a structured framework, FTAs can help the EU act as a reliable and cooperative partner. They can facilitate a conducive business environment that secures supply and attracts investments in high-quality projects.

Moreover, FTAs can integrate provisions that foster sustainability and green industrialization, promoting responsible practices and adding value in resource-rich countries. FTAs offer legally binding commitments in some areas that provide greater certainty and mechanisms to support collaboration. Two chapters stand out as particularly relevant here: the Energy and Raw Materials chapters, which facilitate trade and investment in raw materials while addressing environmental sustainability through measures like Environmental Impact Assessments and cooperation on sustainability standards. Additionally, the Trade and Sustainable Development chapter includes provisions for monitoring through dedicated bodies, enhancing the sustainability focus (see Infobox further below).

FTA	Energy & Raw Materials Chapter	Trade & Sustainable Development Chapter	Status of Negotiation
EU-Vietnam			Signed in 2019, ratified in 2020
EU-Mexico			Agreement in principle in 2018
EU-Mercosur			Political agreement reached in 2019
EU-New Zealand			Signed in 2023, ratified in 2024
EU-Chile Advanced Framework Agreement			Signed 2023
EU-India			Under negotiation
EU-Australia			Under negotiation
EU-Indonesia			Under negotiation
EU-Thailand			Under negotiation
EU-Tunisia			Under negotiation

Table 1: List of Free Trade Agreements analysed in Tulip Consulting’s report

The necessity for a secured supply of raw materials is increasingly critical for European industries, and FTAs could play a pivotal role in achieving this goal. As Transport & Environment (T&E) works at the intersection of the European EV roll-out and the sustainability of critical minerals, this briefing, based on a study conducted by Tulip Consulting, aims to explore how trade in raw materials can be mutually beneficial for all parties involved. The goal is to secure the critical minerals the EU needs for the energy transition while promoting responsible practices and adding value in resource-rich countries. After elaborating on the needs of both parties, this briefing offers five policy recommendations for decision-makers to include in currently negotiated FTAs to achieve these objectives, ensuring that trade agreements are designed to be more effective and equitable.

## What the EU EV and battery industry needs

Europe will continue to rely on imports. As the Critical Raw Materials Act (CRMA) sets out, the EU aims to onshore close to 40% of its processing (or refining and midstream) needs, leaving a significant 60% to be sourced from the global market. This is crucial as Europe strives to build a domestic battery industry, ensuring the availability of raw materials remains a core challenge. Limited domestic resources, coupled with growing global demand and intensified competition,



exacerbate this issue. According to T&E's recent analysis, the EU will continue to rely on foreign imports of battery metals to the extent of around 30% to 65% by 2030, depending on the metal<sup>3</sup>.

So a more diversified minerals processing base is in Europe's interest. Currently, the processing of these critical materials is largely concentrated in a single country, China, posing a significant risk. Diversifying the supply chain by helping resource-rich countries move up the value chain to process more of mined ores locally is therefore in Europe's interest. As Europe develops its own component industry, notably cathode active material, more battery grade materials for those, including some precursors, will continue to be imported.

FTAs can help with this through specific provisions in their Energy and Raw Materials chapters. For instance, FTAs can ensure unrestricted trade flows into the EU by prohibiting export restrictions, preventing countries from limiting the export of raw materials. This creates a stable supply chain for European industries. Moreover, FTAs create a legally binding framework that encourages EU companies to invest in local processing facilities in resource-rich countries, further promoting the development of a diversified and resilient supply chain.

At the same time, high social and environmental standards are in the EU industry's interest as they can damage brand trust and therefore impact business viability. In the consumer facing EV sector in particular, premium and mass market carmakers are exposed to more and more ESG demands from investors and customers alike. High standards that comply with EU legislation are also essential for ensuring sustainable and responsible sourcing practices. This is where sustainability provisions in EU FTAs come in, which can include specific due diligence requirements to sourcing activities as well as thorough Environmental Impact Assessments for upcoming projects.

These complement other instruments that support sustainable trade. For example, since the launch of the EU Green Deal, several key regulations have been adopted to promote sustainable practices. The Carbon Border Adjustment Mechanism (CBAM) taxes embedded greenhouse gas emissions in select commodities, ensuring that imports meet the EU's stringent environmental standards. The EU Deforestation Regulation (EUDR) mandates that market access is contingent on demonstrating compliance with deforestation-free production methods. The Corporate Sustainability Due Diligence Directive (CSDDD) fosters sustainable and responsible business conduct, while the Ecodesign for Sustainable Products Regulation (ESPR) establishes minimum eco-design and performance requirements for products.

## **What producing-countries need**

The first thing resource-rich countries want is for the natural resources to lead to more local development. For resource-rich countries, promises like green industrialisation or high-skilled jobs made by trade agreements and international partnerships must materialise into tangible benefits. These countries seek to profit significantly from their natural resources, ensuring that the wealth generated from these materials contributes to their national development.

---

<sup>3</sup> [T&E \(2024\)](#): An industrial blueprint for batteries in Europe

According to the International Energy Agency (IEA), Latin America is poised to capture the largest market value for mined output, estimated to reach around USD 120 billion by 2030<sup>4</sup>. This is largely due to the region's rich deposits of lithium and other critical minerals. Indonesia is expected to see the fastest growth, with its market value doubling by 2030, driven by its burgeoning nickel production. Africa is also projected to witness a significant 65% increase in market value by 2030<sup>5</sup>, highlighting the continent's growing importance in the global supply chain for critical raw materials.

The second thing those countries need are actual investments, which are critical to bring these projects to fruition, particularly those that extend beyond raw material extraction to include mid- and downstream activities, such as refining, manufacturing, and infrastructure development. These investments not only help in value addition within the country but also foster technological advancement and skills development among the local workforce.

Finally, being exposed to the direct impacts of extraction activities, stricter environmental and social standards are similarly important. It is crucial that all activities related to mining and production are conducted in ways that preserve biodiversity, respect local communities, and uphold high environmental standards, such as effective water management. The global Initiative for Responsible Mining Assurance (IRMA) outlines best standards, which are essential to implement. Practices like dry tailings in waste management should be enhanced, alongside the latest available technologies. This approach ensures that the exploitation of natural resources does not come at the expense of the environment or the well-being of local populations.

Last but not least, support for producer countries' own green transition is also key. Specific language in FTAs should address value addition tailored to the needs of each partner country and its communities. This includes support for domestic energy transitions and green industrialization, alongside the sharing of knowledge, technology, patents, and capital.

### **Relevant FTA chapters to promote resilient and responsible minerals supply chains**

*Energy & Raw Materials (ERM) Chapter:* Since 2013, the EU has been signing comprehensive FTAs that include provisions on energy trade. The now-stalled TTIP negotiations were the first to feature an ERM chapter, followed by the EU-Indonesia FTA. Currently, all EU FTAs under negotiation include a proposed ERM chapter. The EU is shifting its focus from gaining market access for its exports to enhancing certainties and providing equal opportunities for companies sourcing raw materials overseas. These rules, applying only to FTA partners, give EU companies a competitive advantage over other foreign companies.

---

<sup>4</sup> [IEA](#) (2024)

<sup>5</sup> *ibid.*

The primary objective of ERM chapters in EU FTAs is to facilitate trade and investment in raw materials and energy, including by eliminating import and export monopolies and restricting dual pricing prohibitions. However, many ERM chapters also emphasise environmental sustainability. These chapters can oblige parties to carry out Environmental Impact Assessments (EIAs), though the requirements vary among agreements. ERM chapters also include provisions for sustainability cooperation, in line with international standards such as the OECD Guidelines for Multinational Enterprises. Additionally, ERM chapters focus on access to energy infrastructure, especially for producers of renewable energy.

*Trade & Sustainable Development (TSD) Chapters:* Since the EU-Korea FTA in 2009, all EU FTAs have included dedicated Trade and Sustainable Development (TSD) chapters. These chapters generally cover sustainability, transparency, cooperation, and dispute settlement. TSD chapters typically outline objectives recognising that sustainable development encompasses economic, social, and environmental dimensions. They aim to promote international trade and investment contributing to sustainable development, with a focus on addressing climate change.

TSD chapters concluded before the 2022 TSD review follow a specific dispute settlement process starting with government consultations and potentially moving to a panel of experts. This process is often criticised for its non-binding decisions and lack of enforceable sanctions. Following the 2022 TSD policy review, TSD chapters in agreements like the EU-New Zealand and the proposed EU-Thailand FTAs now include regular state-to-state dispute settlement procedures for stronger enforcement.

Institutional provisions in TSD chapters, such as monitoring, establishing TSD bodies, and Domestic Advisory Groups (DAGs), could enhance ERM chapters by incorporating sustainability monitoring. TSD provisions are generally more comprehensive and detailed than the sustainability references in ERM chapters, potentially enhancing the latter. However, the imprecise wording and hortatory nature of TSD provisions, along with a lack of explicit references to mining, suggest they may not fully address the sustainability gaps in ERM chapters.

## **Five things decision-makers can do to make FTAs work for both sides**

The following section presents detailed recommendations for policy-makers to enhance resilient and sustainable mineral supply chains through FTAs. Recommendations focus largely on ERM chapters, as sustainability should be mainstreamed across the whole FTA and not be restricted to TSD chapters. Further, ERM chapters are enforceable as they are subject to dispute

settlement so mechanisms and procedures established to resolve conflicts or disputes that arise between the parties involved in the agreement.

In the context of geopolitical competition for accessing raw materials, it is crucial to strike a balance that allows and incentivises resource-rich countries to supply raw materials to the EU, while ensuring that sustainability objectives and development prerogatives are upheld. Redesigning Energy and Raw Materials chapters thus requires establishing conditions necessary to secure access to raw materials, while promoting sustainable practices.

These are 5 key recommendations:

## **1. Allow favourable raw material prices for producer countries' own green goals**

FTAs should include provisions to allow producing countries to secure their own green transition. One way to do this is by allowing producing countries to sell minerals at cheaper prices domestically compared to the market benchmarks, referred to as carve-outs on dual pricing. This would give a competitive advantage to domestic processing industries, making it easier to attract investors to local green industry development.

Carve-outs are exceptions that can be integrated into FTAs to circumvent the prohibition of dual pricing. This means that the prohibition of selling goods at different prices in different markets, such as higher prices internationally and lower domestically, is lifted.

A good example is the EU-Chile Advanced Framework Agreement, which includes a carve-out to the dual pricing obligation, allowing Chile to introduce or maintain value-added measures. At the same time, this carve-out is subject to certain conditions, e.g. that the measure does not result in an export restriction for the other party and that the domestic price is not lower than the lowest export price of the same product over the previous 12 months.

While this provision has been included primarily to ensure consistency with Chilean domestic policy<sup>6</sup> - which permits a certain percentage of lithium to be sold at preferential prices to domestically established companies engaged in value addition activities - it remains important to allow for the possibility of selling minerals domestically at lower prices to promote green industrialisation in other FTAs as well. For these exceptions to be successful, the EU should ensure that the conditions are pragmatic and workable, with the language of the carve-out and conditions tailored to each countries' circumstances such as relevant local conditions and practices.

---

<sup>6</sup> The policy in place requires the two companies involved in lithium extraction in Chile (SQM and Albemarle) to provide up to 25% of their production at preferential prices to locally established producers engaged in value addition activities, in exchange for permitting expanded extraction. While the bid remains open, Chinese companies Yongqing Technology (part of Tsingshan) and EV manufacturer BYD already have contracts to benefit from these cheaper prices. See Box 3 in Tulip's analysis.

## Generally, FTAs should

1. **Include and strengthen dedicated carve-outs** in dual pricing provisions to allow producing countries to sell raw materials cheaper for local downstream sectors.

To improve **conditions** in carve-outs, the EU should take into account one - or more - of the following options to

- **Ensure Appropriate Conditions:** Ensure that the conditions attached to carve-outs are appropriate, for example, by removing a price floor under which minerals cannot be sold cheaper domestically.
- **Allow Temporary Dual Pricing:** Alternatively, allow dual pricing for a limited period of time (e.g., x years after ratification) and then phase it out.
- **Incorporate Performance Requirements:** Alternatively, allow certain performance requirements in the producer country in exchange for the dual pricing prohibition, thereby compensating for the limited policy space created by the dual pricing prohibition.

These conditions should be tied to **conditionality** which on the other hand can improve the access to minerals for the EU, thus striking a balance.

2. **Prohibit export restrictions to the EU**, requiring that dual pricing does not result in an export restriction for the other party.

Prohibiting export restrictions to the EU is key as this provides the fair framework for EU companies to invest. Export restrictions, such as quotas, licences, bans, or taxes on exports, control the amount or type of goods that can be exported to other countries. Removing these barriers ensures reliable access to minerals.

## 2. Enhance best practices in the extractive sector

While extractive operations can cause damage to the environment and local communities, best practices to reduce impact exist and should be consistently implemented. FTAs can provide a framework to mandate specific due diligence for sourcing activities. The analysis by Tulip has found that Trade & Sustainable Development chapters are often too narrow in scope to address environmental challenges specific to mining, such as soil erosion, water use, water contamination, and waste management. However, Energy & Raw Materials chapters can include specific provisions to address these issues.

FTAs should incorporate the following requirements specific to mining<sup>7</sup>:

- **Water Management Plans:**
  - Require businesses to draft water management plans for their activities. These should include both water quality and clean-up activities, as well as targets to reduce water use.

---

<sup>7</sup> See [Powershift e.V.](#) (2020)

- Integrate water management plans into business operations at the time of conducting EIAs.
- **Waste Management Plans:**
  - Mandate firms to adopt comprehensive waste management plans, this should be based on best tailing management practices and best available technologies, such as filtered tailings.<sup>8</sup>
  - Require businesses to lodge a financial guarantee to cover the costs of rehabilitating land affected by waste.
- **Mining Decommissioning Plans:** Ensure businesses prepare detailed mining decommissioning plans to address the closure and post-closure phases of mining operations.

Further, to strengthen and complement due diligence - mainstreaming sustainability throughout the agreement - FTAs should

- **Require mandatory compliance** with international due diligence standards such as those outlined by the OECD on human rights and environmental due diligence, for companies of a **certain size** engaged in raw materials trade between the EU and producing countries.

Incorporating these specific requirements into ERM chapters will ensure that extractive activities are conducted with greater responsibility and accountability, ultimately leading to more responsible and environmentally sound mining practices.

### 3. Strengthen Environmental Impact Assessments

Environmental Impact Assessments are vital for identifying project flaws, improving future activities, and enhancing responsible supply chains by gathering crucial data for mitigation and improvement. The analysis by Tulip highlights that many of the most recent FTAs include the obligation to carry out an EIAs before authorisation for exploration and production of energy goods and raw materials is granted, or in some cases where a project may have effects on the environment, population and human health, biodiversity, land, soil, water, air and climate, and cultural heritage and landscape. At present, EIA findings must be taken into account in most cases, but do not form the basis of the authorisation decision.

The level of public consultation with relevant actors varies among FTAs. For example, the EU-New Zealand FTA calls for an “early and effective opportunity” for all interested persons to participate in the impact assessment. In contrast, other FTAs, such as those proposed with India and Australia, merely require an opportunity for participation.

---

<sup>8</sup> See [T&E study on Nickel in batteries and how to secure it sustainably](#) (2023): Dry stacking of filtered tailings is one of the safest forms of tailings storage and disposal and a best practice, e.g. reducing the risks of groundwater contamination

In many FTAs, an EIA may be omitted if no authorisation is required, potentially leading to cases where assessments are overlooked despite their relevance. There are also inconsistencies in the scope of assessment criteria, for example, impacts on affected communities are not always included.

Regarding **scope, application and impact of EIAs**, decision makers should

- **Make EIAs mandatory for all relevant activities with a significant impact on the environment:** Following the example of the EU-New Zealand FTA, EIAs should be mandatory for all activities that may have a significant impact on the environment. This should be done without jeopardising national permitting deadlines or faster processes for strategic projects. Improvement should be achieved via faster processes while keeping the quality of assessment, rather than come at the expense of robustness.
- **Expand the scope of the EIA:** Ensure that the scope of EIAs includes impact on public health, biodiversity, land, soil water, air, climate and cultural heritage; and
- **Require follow up actions:** Include language requiring that project promoters are required to act upon EIA findings and undertake more sustainability-oriented activities if the EIA indicates higher risks findings.

The role of local communities, labour representatives and civil society in integrating sustainability with raw material value chains is vital for providing a “social licence” to mining activities and sustaining political outcomes. It also enhances democratic participation and aids in holding states accountable for their environmental and social pledges. Therefore, provisions should

- **Require civil society to be involved** in determining the necessity of an EIA and reviewing and providing inputs to the EIA conducted early on and effectively.

## 4. Beef up technical and financial assistance

Many of the policy options to strengthen sustainability will fall on resource-rich countries which often lack the financial and technical resources to address these issues effectively, as noted by Tulip. This necessitates stronger commitments from the EU regarding technical and financial assistance in responsible minerals activities through FTAs. This means that the burden of implementing these policies will primarily rest on these countries, requiring significant support from the EU to e.g. build out relevant authorities and train staff in producing countries to ensure that projects are carried out according to best practices.

While binding technical and financial assistance provisions are uncommon in FTAs, this novel approach could be inspired by the EFTA-India FTA, which sets binding investment and job creation targets with a review framework by creating a binding target for Iceland, Liechtenstein, Norway and Switzerland to invest a total of 100 billion and create one million jobs over the next 15 years and establishes an appropriate review framework.

To support producing countries' capacities to oversee and review whether the requirements have been met, FTAs should:

- **Specify Financial Support & Technical Assistance:** Identify a dedicated amount of financial support for sustainability initiatives in resource-rich countries.
- **Ensure Implementation and Monitoring:** Incorporate these commitments through an Annex to the ERM Chapter of the FTA and establish a sub-committee on ERMs to review progress on the EU's technical and financial assistance commitments. Allow resource-rich countries to request consultations if the EU fails to meet its commitments. If a satisfactory solution is not reached, resource-rich countries should be able to adopt temporary and proportionate remedial measures.

By adopting these recommendations, the EU can provide crucial support to resource-rich countries, enabling them to achieve sustainable mining and processing practices while fostering responsible supply chains.

## 5. Green premiums for sustainable raw materials

Sustainably and responsibly sourced critical minerals often require higher investments into best available technology for clean water and safe waste disposal as well as pollutant-free and biodiversity friendly practices. The initial costs and timelines can be further exacerbated by meaningful engagement with local communities and proper communication and remedy channels with workers. These are all costs worth paying and require governments to reward such efforts.

The problem is that this is currently not rewarded on commodity markets. While some, like the London Metals Exchange (LME), are adding some standards around sourcing around practices, clearly defined and traceable ESG criteria is missing. Similarly, it is not correct to place the burden of selecting "green premium" on the final consumer, given that all the business to business decisions on the choice of raw materials have long been made before the consumer purchases a solar panel or an electric car having no say in the matter.

Instead, like-minded governments should make access to their markets conditional upon high sustainability and social criteria, starting with CO2 emission benchmarks. The supply coming from sources that do not meet the criteria should pay a penalty or not be admitted.

T&E has previously looked at the case of nickel, where setting a CO2 threshold of 30-40 kg CO2e per kg of nickel sulphate would support the market for cleaner nickel facilities - which are currently closing down due to the competition from higher emitting nickel from Indonesia.<sup>9</sup> Rather than serving as protectionism, it would also create strong incentives for Indonesian companies and government to green their grids and make processes cleaner.

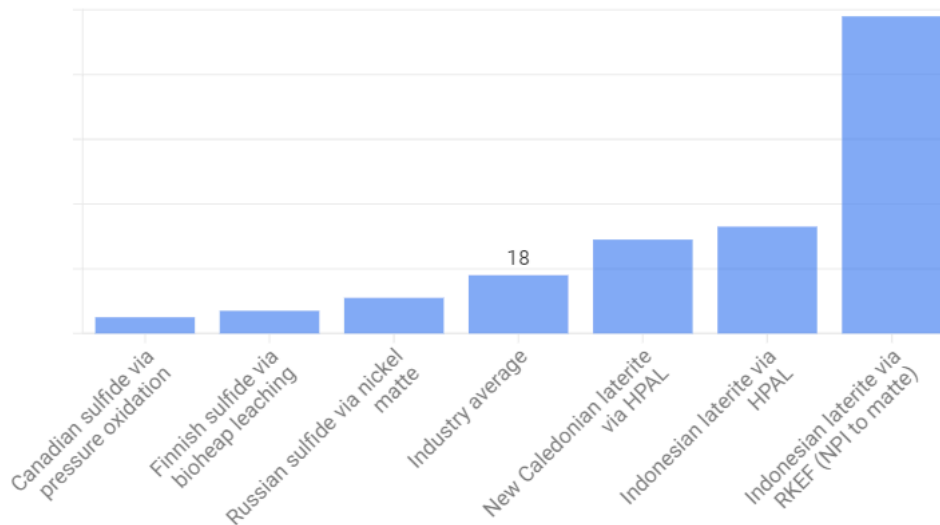
---

<sup>9</sup> Another threshold for low-carbon nickel proposed by [LME](#) is 20 kg CO2e / kg



## GHG emissions from nickel sulphate production

kg CO2e per kg nickel in nickel sulphate



Source: Minviro, Nickel Institute • Note: Industry average as calculated by the Nickel Institute ("Nickel Sulphate Life Cycle Data", 2021)



Figure 2: GHG emissions from nickel sulphate production for selected routes

While tariffs on EU CRMs are already minimal, with rates largely ranging from 2-7% on unprocessed ores and 3-9% on processed ores, there is limited scope to further incentivise the uptake of low-carbon minerals through tariff adjustments alone. However, pursuing parallel strategies remains crucial.

To foster low-carbon sourcing projects, collaboration with global partners such as the US, Japan, and South Korea is essential. Expanding the market for these materials through joint efforts can help create the necessary investment incentives. Initiatives like the ongoing Critical Minerals Agreement (CMA) negotiations with the US exemplify how mini-FTAs can enhance market integration and coherence, paving the way forward to facilitate the adoption of responsibly sourced, low-carbon minerals.

Integrating sustainability and ensuring investments in high-quality projects in FTAs, while simultaneously establishing favourable market conditions for low-carbon products, is vital. Therefore, T&E recommends:

- Agreeing clear **kg CO2e per kg of critical materials threshold** (including nickel sulphate, cobalt sulphate, lithium hydroxide and lithium carbonate) as an access condition to the markets of the EU, the US, Japan, South Korea and others
- As a minimum, requiring the purchasers of those materials to implement the OECD-defined **human rights and environmental due diligence** across the supply chains and requiring the suppliers of the material to undergo at least a self-assessment under the Initiative of Responsible Mining Assurance (IRMA) by 2026.



### 3. Conclusion

As Europe continues to rely on imports of minerals from third countries, trade relations with a wide range of partners need to be strengthened. These partnerships should allow producing countries to benefit from their resources while attracting the necessary investment from European companies, particularly in the midstream battery value chain needed to meet the demand for European battery production. All this needs to be done while respecting best practices in community engagement, sourcing and waste management.

FTAs play a crucial role in this effort, serving as a powerful tool to engage partner countries on equal terms. To achieve the necessary balance between supply chain resilience and long-term sustainability, Tulip Consulting conducted a legal analysis for T&E to identify gaps and opportunities for how FTAs can support this. Based on these findings, T&E offers five policy recommendations for policymakers to shape the ongoing FTA negotiations and future trade policy. As negotiations with key partners progress and new ones are launched, the EU must present itself as a reliable partner that takes into account the needs of its partners and ensures a sustainable supply of minerals for its battery and clean vehicle industries. Best practices exist and the key is to implement them on the ground.

Ultimately, achieving the energy transition and building resilient, responsible battery supply chains depends on global collaboration. Addressing this challenge in a sustainable way is the challenge of the 21st century, underlining the importance of decision-makers adopting innovative approaches and forward-looking strategies.

---

### Further information

Franziska Grüning

Raw Materials Policy Officer

Transport & Environment

[franziska.gruning@transportenvironment.org](mailto:franziska.gruning@transportenvironment.org)