



Case Study 4: Beef and soy, Paraguay

- *Gran Chaco deforestation* • *indigenous territorial rights* • *SENACSA traceability*
- *certification gaps* • *EU-Mercosur trade agreement* • *World Bank governance indicators*

Disclaimer: This summary was prepared by the co-facilitators of the EUDR Community of Practice (CoP). It is intended to share the key points discussed in the core group with the wider community of practice to foster mutual understanding, readiness, and alignment among the different actors involved. They should not be interpreted as definitive positions of different stakeholder groups or as representing what may be deemed compliant by the participating Competent Authorities. Rather, many of the recommendations and observations captured in this report point to what could be considered examples of good practices for the early implementation of the EUDR.

1. Case Setting

A European food company sources beef from a Paraguayan frigorífico (major meat processor), which aggregates cattle from ranches across the Gran Chaco and eastern region. Paraguay is the world's sixth-largest beef exporter; the Chaco lost an estimated 3.5 million hectares of forest between 2001 and 2020, predominantly driven by cattle ranching. The European company has no direct contractual relationship with any ranch.

The operator considers the supply chain 'low risk' because approximately 60% of volumes carry private sustainability certification. It has not, however, systematically assessed which Paraguayan legal requirements are covered by that certification and which are not. A competent authority is inspecting the due diligence files.

Comparative soy notes are embedded in the case: both commodities raise similar Chaco deforestation and indigenous rights issues; the key differences are supply chain structure, agrochemical exposure (more acute for soy), and traceability infrastructure.

2. Key legality issues in play

The case study revolves around four main regulatory and governance domains that define legal compliance in Paraguay's beef and soy sectors:

Gran Chaco deforestation and environmental laws: Law 3663/2008 mandates zero deforestation for the Eastern Region of Paraguay, prohibiting any forest conversion. In the Gran Chaco (Western Region), the Forest Law (Ley Forestal 422/73) permits land clearance but strictly requires prior authorisation from the National Forestry Institute (INFONA) and environmental permits from the Ministry of the Environment and Sustainable Development (MADES) for clearances exceeding statutory thresholds. In practice, large-scale clearing has occurred both with official permits and illegally without authorisation. Crucially, deforestation that is legally authorised under domestic Paraguayan law after 31 December 2020 still violates the EUDR's independent zero-deforestation criterion.

Indigenous land rights and FPIC: Paraguay's National Constitution and Ley 904/1981 recognise indigenous territorial rights that predate or exist independently of formal cadastral land titling. International legal frameworks, including ILO Convention 169 (ratified by Paraguay), require Free, Prior and Informed Consent (FPIC) and formal consultation prior to land development. The Inter-American Court of Human Rights (IACtHR) has issued multiple binding judgements against the Republic of Paraguay for failing to protect traditional indigenous territories in the Chaco. Official administrative demarcation remains extremely slow and incomplete, creating a risk that ranches hold formal state titles over land subject to unextinguished indigenous claims.

SENACSA traceability integrity: SENACSA (Servicio Nacional de Calidad y Salud Animal) operates cattle tracking registries primarily designed for animal health and sanitary control. While SENACSA documentation serves as the primary chain-of-custody reference, documented operational weaknesses exist, including cattle commingling at pre-slaughter assembly points (rodeos), identifier/tag re-use, and incomplete coverage of birth ranches. Operators cannot rely merely on the physical presence of SENACSA paperwork; they must critically evaluate the systemic credibility and integrity of the tracking system.

Labour standards and human rights: Rural and ranch labour in the Chaco region is highly informal. Instances of forced labour, debt bondage, and severe labour exploitation affecting indigenous workers have been documented on remote Chaco ranches by the ILO, United Nations bodies, and civil society monitors. These practices constitute severe criminal breaches of Paraguayan labour and criminal codes, rendering affected commodities illegal.

3. Key challenges and good practices by theme

3.1 International trade frameworks, country benchmarking, and contextual governance indicators

Challenges:

- **Practical use of international trade frameworks:** participants struggled to understand how broad international trade agreements—such as the EU-Mercosur Trade Agreement (and specifically Annex 18A, Articles 54 and 55)—may be used to assert supply chain legality.
- **Mercosur provisions versus mandatory EUDR obligations:** While Article 55 of Annex 18A under the EU-Mercosur agreement refers to mutual recognition and dialogue between signatory states regarding certification and traceability systems, Competent Authorities clarified that international trade agreements represent general bilateral cooperation frameworks. They do not grant a 'green lane' or alter the direct legal obligations established by the EUDR.
- **Limitations of benchmark classifications:** EUDR country benchmarking evaluates forest cover loss and agricultural expansion rates; it does not evaluate underlying legal governance, corruption, or enforcement capacity. Relying solely on official low-risk or standard-risk classifications creates a significant gap in legality risk assessment.

Good practices identified:

- **Integrate contextual governance indicators:** Utilise World Bank Governance Indicators (WBI)—such as Rule of Law, Control of Corruption, and Government Effectiveness—alongside Transparency International's Corruption Perceptions Index (CPI) as contextual risk inputs to evaluate the baseline reliability of official documentation and government oversight in the sourcing country.
- In the case of Paraguay, the operator could not ignore that indicators relating to Rule of Law and Control of Corruption fall below the world's average, suggesting that EUDR risk assessment cannot simply rely on government-issued certificates at face value.

3.2 Certification scope mapping, private schemes, and legal alignment

Challenges:

- **Reliance on private certification:** The European operator assumed that sourcing 60% certified beef provided a 'low risk' baseline, without conducting a systematic legal gap analysis.
- **Cut-off date and scope mismatches:** Voluntary private schemes frequently apply different deforestation cut-off dates and forest definitions. Furthermore, private schemes may audit only the finishing ranch, leaving earlier breeding and rearing farms unexamined.
- **No automatic green lane:** Competent Authorities reiterated that private certification does not constitute proof of compliance or create a simplified due diligence pathway; it serves merely as supplementary supporting evidence.

Good practices identified:

- **Perform comprehensive scope mapping:** Conduct a rigorous Certification Scope Mapping exercise prior to relying on any voluntary or private scheme. Map every requirement of the certification standard against the specific national legal framework of Paraguay (including land tenure, environmental permits, labour, and tax legislation) to pinpoint unverified legal gaps.
- **Implement targeted gap-filling measures:** Where certification schemes fail to verify specific legal domains (such as indigenous FPIC or historical INFONA clearing permits), implement targeted, supplementary operator-level checks to bridge those specific gaps.
- **Audit the credibility of certification governance:** Evaluate the governance, audit frequency, chain-of-custody model (segregation vs mass balance), and physical mixing risks of the certification scheme itself before incorporating its findings into the risk assessment.

The 'presumption of innocence' principle and EUDR

The use of the principle of presumption of innocence came up in the discussions in this case study, regarding beef and soy suppliers that are waiting for court decisions in Brazil and that still hold valid certificates (from voluntary certification schemes) during the process. Under the EU Deforestation Regulation (EUDR), a tension can arise between national legal systems, voluntary certification systems and EU compliance requirements regarding the "presumption of innocence". Domestic law generally operates under the principle of presumption of innocence; a company or supplier remains legally compliant and free to operate until a final, unappealable judicial decision establishes guilt. This creates a dilemma when certification schemes issue observations or allow suppliers to retain valid certificates while active government litigations or legal proceedings are pending, since guilt has not yet been formally proven beyond reasonable doubt. Private sector operators often query whether they can rely on this local legal standard or whether pending allegations require immediate disqualification of a supplier.

Within the EUDR logic however, the presumption of innocence is inadequate and non-applicable. The regulation operates on a fundamentally different standard: establishing a "negligible risk" through proactive risk assessment and mitigation before placing products on the market. Participants emphasized that an absence of a final legal conviction does not equate to an absence of risk or proof of compliance. If government agencies or credible sources identify ongoing legal actions against a supplier, it will be hard to defend this as a case of negligible risk. In such cases, operators cannot hide behind valid certificates or the presumption of innocence; they are required to gather strict, independent evidence—such as field audits or physical documentation—to prove that the product carries negligible risk. In the case of certification, a first practical step is to gather and analyse audit reports and how instances of non conformities may have been addressed (corrective actions).

3.3 Traceability system integrity, aggregation points, and national registers

Challenges:

- **Structural indirectness and commingling:** Cattle supply chains in Paraguay involve multiple indirect tiers: calves are bred on remote Chaco ranches, moved to backgrounding ranches, aggregated at pre-slaughter assembly points (rodeos), and sold to frigoríficos. High levels of commingling occur at rodeos, obscuring the birth ranch identity.
- **Document presence versus system integrity:** Although SENACSA provides official movement permits (Guías de Traslado y Cotización), system vulnerabilities—such as identifier tag re-use, paperwork falsification, and unregistered herd movements—are documented. Possessing official paper documents does not guarantee the lawfulness of the underlying animal origin.
- **Soy aggregation and cross-border processing:** In the soy sector, grain from hundreds of farms is aggregated at local silos and regional crushing facilities (e.g. Paraguayan soy transported to Argentinian crushing plants), creating complex cross-border chain-of-custody tracking hurdles.

Good practices identified:

- **Enforce frigorífico contractual requirements:** Require intermediate meat processors (frigoríficos) to enforce direct supply chain mapping rules, establishing contractual obligations that require suppliers to disclose full movement histories from birth ranches to slaughter.
- **Apply layered traceability checks:** Combine national tracking register data (SENACSA) with independent verification layers, including spatial analysis of cattle movements, brand registry cross-checks, and periodic third-party spot-checks at assembly points.
- **Utilise regional monitoring platforms:** For soy, leverage sector-wide or state-endorsed monitoring platforms (analogous to Argentina's VISEC or Brazil's SilvoVerde platforms discussed in plenary) that integrate satellite deforestation screening with movement notes, while ensuring the operator understands the underlying methodology.

3.4 Geolocation data and false positive management

Challenges:

- **Data volume and error propagation:** Managing plot-level polygon data across thousands of extensive Chaco ranches or indirect soy farms generates massive datasets, increasing the risk of error.
- **Prevalence of false positive satellite alerts:** Automated geospatial satellite screening across broad perimeters frequently generates 'false positives'—flagging natural vegetation clearing, fire events, or legal farm infrastructure updates as deforestation.

Good practices identified:

- **Documented false positive resolution protocols:** Establish clear criteria and written protocols for analyzing and filtering geospatial false positives. Operators must document the specific evidence (high-resolution imagery, official INFONA permit records, ground verification) used to clear a flagged alert.
- **Require provider methodology disclosure:** Ensure service providers disclose their full analysis logic, false-positive treatment methodology, and map source data so the operator can defend its conclusions to Competent Authorities.
- **Enforce immediate plot-level exclusion:** Where a flagged polygon or cattle supply plot cannot be definitively cleared of deforestation or legal overlap, exclude that specific plot or ranch from the EUDR supply chain while maintaining dialogue for remediation.

3.5 Indigenous land rights, customary tenure, and labour legality verification

Challenges:

- **Cadastral title versus customary land rights:** In Paraguay, official state land registries (catastro) frequently conflict with customary indigenous land claims. A rancher may hold a valid administrative title while operating on land subject to unextinguished customary territorial rights recognised under Ley 904/1981 and the Constitution.
- **Invisibility of social land disputes:** Standard commercial due diligence relies on collecting formal titles and government permits, completely missing ongoing land conflicts, lack of FPIC, or pending Inter-American Court judgements. Robust evidence for FPIC is challenging, as one participant noted that documents generally only confirm the 'C' for 'Consent' and not the 'FPI' for 'Free Prior and Informed'.
- **Verification barriers in remote regions:** Proving the absence of land rights violations across remote Chaco areas is challenging without direct local community engagement.

Good practices identified:

- **Apply substantive legal standards:** Recognise that under domestic and international law, indigenous territorial rights exist independently of formal administrative demarcation. The legal benchmark is whether pre-existing customary rights and FPIC requirements were respected. Checking specialized databases (e.g., Mapbiomas), NGO reports (including reaching out to report's author when necessary) and court case reports is recommended.
- **Overlay customary territorial maps:** Cross-reference ranch geolocation data against maps of ancestral indigenous territories, IACtHR ruling zones, and NGO/indigenous observatory databases rather than relying solely on state land titles.
- **Implement community grievance channels:** Establish operational grievance mechanisms at frigorífico level, enabling local communities and civil society organisations to lodge land rights and FPIC complaints directly into the supply chain review process.

3.6 Risk-based sampling, verification thresholds, and indirect supply chain oversight

Challenges:

- **Impossibility of universal document collection:** Downstream buyers and mid-tier operators cannot practically collect and inspect 100% of physical movement permits, health certificates, and ranch permits across vast indirect supply chains without paralyzing trade flows.
- **Uncertainty over sampling thresholds:** Uncertainty exists regarding what constitutes a legally defensible sampling threshold for document verification and ground auditing.

Good practices identified:

- **Apply proportionate sample auditing:** Deploy a risk-based sampling methodology (such as double-checking a minimum sample of underlying supplier consignments) calibrated to risk levels.
- **Target high-risk supply nodes:** Focus intensive verification—including full document audits, satellite historical checks, and field visits—on high-risk supply nodes (e.g. Chaco ranches bordering protected zones or areas with known forced labour alerts).

4. Cross-Cutting Learning Points

- Operators cannot rely on private sustainability certification without systematically mapping which national legal requirements are covered, how they are verified, and where unaddressed gaps remain.
- Recognised indigenous rights under domestic constitutional and international law exist independently of formal land demarcation. The legal test under EUDR is whether customary land rights were respected, not whether a formal cadastral reserve has been surveyed.
- EUDR deforestation criteria are independent of national legality: authorised land clearing under domestic law (such as INFONA-permitted clearing in the Chaco) after 31 December 2020 still violates the EUDR's zero-deforestation requirement.
- Traceability system integrity must be actively evaluated: official national registries (like SENACSA cattle permits or timber tracking systems) are vulnerable to commingling, tag re-use, and fraud. Document presence shouldn't be confused with document credibility. Overall document credibility may be informed by governance indicators (e.g. World Bank governance indicators, Transparency International index).
- Supply chain distance requires structured indirect oversight: where an operator lacks direct contractual relationships with primary producers (ranches or smallholders), due diligence can be designed through mid-tier processors (frigoríficos/silos) using contractual pass-through clauses, risk-based sampling, and landscape monitoring.

5. Summary

This case study demonstrates that legality due diligence for Paraguayan beef and soy cannot rely on private certification, official sanitary permits, or international trade agreements in isolation. Effective compliance demands an integrated, evidence-based approach that combines contextual risk screening (using for instance World Bank Governance Indicators), rigorous certification scope mapping, and robust indirect supply chain controls through intermediate frigoríficos and grain aggregators.

Participants converged on the core principle that certification schemes and national registries such as SENACSA provide valuable supporting inputs, but can never substitute for operator-led due diligence. Operators sourcing from complex regions like the Gran Chaco must actively evaluate substantive legal risks—most notably indigenous land rights, FPIC, and historical land clearing permits—and independently verify zero-deforestation compliance against the 31 December 2020 cut-off date regardless of national clearing authorisations.

Furthermore, discussions highlighted that Competent Authority enforcement is grounded in assessing the quality, proportionality, and documented logic of an operator's due diligence system. By implementing credible risk-based sample auditing, establishing clear false-positive resolution protocols, and leveraging mitigation measures, operators can build defensible, robust due diligence frameworks that withstand regulatory scrutiny while supporting sustainable trade flows.