AGRIFOOD

ASSESSING LOW CARBON TRANSITION

MEAT PRODUCTION ACT EXPERIMENTATION IN BRAZIL

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ACT

Assessing Low-Carbon Transition is a joint voluntary initiative of the UNFCCC secretariat Global Climate Agenda co-founded by ADEME, the French Agency for Ecological Transition, and CDP, the global environmental disclosure system. ACT provides guidance and assessment methodologies as an accountability framework to support and assess companies' strategies and actions which contribute to the Paris mitigation goals.

ACTDDP

The ACT-DDP research project is an international pilot project, which aims at accelerating the implementation of national and sectoral deep decarbonisation through a better dialogue between private companies and governments and for a mutual enrichment of their low-carbon strategies. Through the synergy between two pioneer initiatives, the Assessing low Carbon Transition (ACT) initiative and the Deep Decarbonization Pathways initiative (DDP), the project partners built and tested methodologies and tools for developing national and sectoral deep decarbonisation pathways compatible with the Paris Agreement and assessing company strategies with them.

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The ACT Initiative, through the implementation of the ACT-DDP project in Mexico and Brazil, assessed the low carbon strategies of three Brazilian companies from the meat production sector, using the ACT methodology for the Agriculture and Agrifood sectors. The lack of data implied that some of the indicators were not assessed (resulting in 0 or low score for those indicators [1]. An ACT assessment generates three scores: a performance score, a narrative score, and a trend score.

ACT average score



The average performance score is (7)

The assessed companies obtained a wide variety of scores (between 6 and 10), with an average performance score of 7/20, indicating that the panel is rather homogeneous in the level of its maturity. This score is below the middle of the ACT methodology evaluation grid, which shows that companies in this sector are not yet transitioning to a low-carbon economy despite having taken some actions in that direction.

Concerning emissions, companies are either not accounting or partially accounting for the emissions sources included in the ACT Agri-food methodology (supply chain, production activities at the farm level including land use) which impacts the level of ambition of actual GHG reduction targets set mostly around direct emissions (scope 1). More globally speaking, the limited scope of relevant GHG emissions taken into consideration by companies highlights a lack of understanding of GHG reduction challenges and a lack of transparency and communication among companies of a same value chain which is problematic to tackle decarbonization of the sector.

The average narrative score is (C)

The narrative score is rather homogeneous, from D to B, with one company classified in each score (B, C and D).

Past, present, and future actions of assessed companies are coherent and already in line with their actual targets and decarbonization strategies. Companies are also implementing adaptation measures to diminish climate change and low carbon transition risks, but at some point, all have been accused by organizations of the civil society of buying cattle from deforestation areas, so there are important controversies regarding this issue. This is addressed by the reputation module of the narrative score. However, the companies have been implementing and monitoring actions to avoid this type of situation.

The average trend score is "-" as two companies out of three do not present the necessary elements to validate a credible commitment to a decarbonization pathway that considers the emissions of cattle farming.

AVERAGE SCORE PER PERFORMANCE MODULE

The meat production sector started to engage on the path towards decarbonization since most companies have integrated climate issues within their management, are publicly engaged, and have been acting against deforestation, committing not to buy cattle from deforestation areas, especially in the Amazon. However, due to a lack of reliable data on upstream activities emissions including land use.it was not possible for any of the companies to determine with certainty whether upstream past emissions intensity has decreased in recent years.

Additionally, some companies have identified actions and low carbon business activities as waste reuse and production of 100% vegetable hamburgers. However, those activities are often small projects and not embedded in the core business strategies of the companies.

Companies from the sector must improve their decarbonization strategies, especially in relation to their GHG reduction targets, wastage reduction, actions to combat deforestation, and engagement with clients and suppliers. Also, companies must put a particular effort into accounting for all relevant emissions sources, from production at the farm level, including land use and the supply chain, and setting GHG emissions reduction targets, including indirect upstream emissions (Scope 3). (see Figure 1).

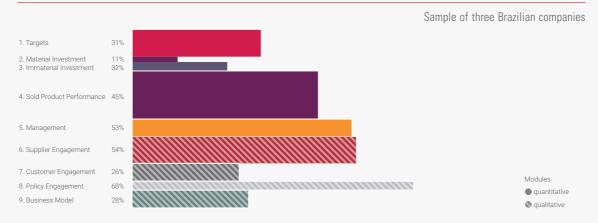


Figure 1. Performance modules scores (%)

Note: bar heights represent modules the weighting of modules' scores

ACT AGRICULTURE & AGRIFOOD METHODOLOGY

The ACT sectorial methodologies have been developed and adapted to take into account the specific characteristics and decarbonization levers of the sectors studied. Thus, the performance score weighting of each module varies for each sector.

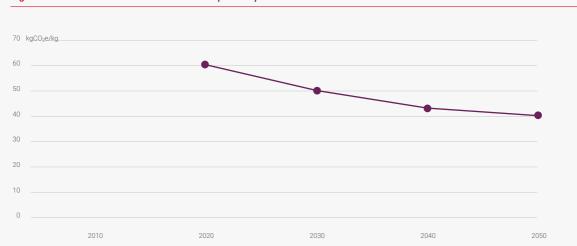
The following weightings have been used to evaluate the performance score of companies from the meat production sector (see **Table 1**). The ACT methodology for the Agriculture and Agrifood sectors is available at https://actinitiative.org/act-methodologies/.

MODULES	AGRIFOOD
1. Targets	15%
2. Material Investment	8%
3. Immaterial Investment (R&D)	5%
4. Sold Product Performance	30%
5. Management	10%
6. Supplier Engagement	10%
7. Client Engagement	7%
8. Policy Engagement	5%
9. Business Model	10%

GHG INTENSITY TRAJECTORY

For the ACT-DDP experimentation in Brazil and Mexico, the DDP Initiative developed sectoral decarbonization scenarios and trajectories which were used to define the theoretical carbon budget and related emissions reduction trajectories of assessed companies as the main benchmark to assess quantitative indicators such as target alignment and the trend in past emissions intensity. However, for the meat production sector, disparities in methodological approaches between DDP AFOLOU (based on IPCC and national GHG accounting) and ACT agriculture and agri-food method (based on Poore & Nemecek study to address products' GHG footprint with a life cycle way of thinking) did not enable to use of the DDP pathway under the scope of this project (see Figure 2).

The ACT initiative created decarbonization curves especially in the scope of the ACT development. These scenarios provide mitigation ambition per category of product between 2020 and 2050 to be used as benchmarks for companies. These decarbonization pathways are modeled on the emissions intensity of a given product in 2020 compared to a proposed reduction for that product by 2050. The median emissions intensity reported corresponds here to all the emissions considered in the relevant boundaries (i.e. farm gate and post-farm gate levels). See ACT Agriculture & Afgrifood methodology.





This mitigation curve represents a global benchmark for beef production., the proposed global GHG mitigation curve progresses from 60.2 kg CO_2e/kg in 2020 (the median) to 40.3 kg CO_2e/kg in 2050 (the 10th percentile), representing a reduction potential of 33.1%. Producers emitting more than 60.2 kg of $CO_2e/$ kg would face steeper GHG emission reductions (i.e., >33%), whereas lower emitting producers would face a less steep curve (i.e., <33%), reflecting the higher and lower reduction required, respectively, to meet the 40.3 kg CO_2e in 2050 benchmark

ACT LOW-CARBON ALIGNED STATE FOR AGRIFOOD COMPANIES

To support the transition of companies from the Agriculture & Agrifood sector, ACT presents the response of a low-carbon aligned company of the sector to the 5 questions of the ACT framework: What is the company planning to do? [Commitment], How

is the company planning to get there? [Transition Plan], What is the company doing at present? [Present], What has the company done in the recent past? [Legacy], and How do all of these plans and actions fit together? [Consistency]



 International standards and regulations (IFRS ISSB, EU CSRD, EFRAG ESRS E1, UK TPT...) and recommendations (TCFD, UNFCCC's Race to Zero) about corporates' climate transition plans should increase the availability of climate data from companies in the coming years.









