CARREFOUR'S SMOKESCREEN

As a purchaser of products from beef and soy suppliers with destructive practices, Carrefour is complicit in the deforestation of the Amazon and the Cerrado. International NGO Mighty Earth points out the French group’s responsibility and urges it to change suppliers. Given the sheer power of Carrefour, this measure could have a considerable positive impact for the group as well as for the entire industry.
# TABLE OF CONTENTS

<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>CARREFOUR’S RIGHT OF REPLY</td>
<td>2</td>
</tr>
<tr>
<td>SUMMARY</td>
<td>3</td>
</tr>
<tr>
<td>CARREFOUR: A MAJOR RETAILER TO BECOME</td>
<td>4</td>
</tr>
<tr>
<td>THE LEADING SUPERMARKET CHAIN IN BRAZIL IN 2022</td>
<td></td>
</tr>
<tr>
<td>BRAZIL: A COUNTRY PLAGUED BY RECORD DEFORESTATION AND FIRES</td>
<td>6</td>
</tr>
<tr>
<td>2022: A record year for deforestation and fires</td>
<td>6</td>
</tr>
<tr>
<td>Meat, a major cause of deforestation in the Amazon and Cerrado</td>
<td>7</td>
</tr>
<tr>
<td>Cattle ranching is the main cause of deforestation in the Amazon</td>
<td>8</td>
</tr>
<tr>
<td>Soy for animal feed: Yet another major driver of deforestation and ecosystem destruction</td>
<td>8</td>
</tr>
<tr>
<td>Amazon’s tipping point is getting ever closer</td>
<td>10</td>
</tr>
<tr>
<td>Assessment of Carrefour’s potential impact on deforestation linked to beef in the Brazilian Amazon</td>
<td>11</td>
</tr>
<tr>
<td>MEAT PRODUCTS SOLD IN THE CARREFOUR GROUP’S SUPERMARKETS</td>
<td>13</td>
</tr>
<tr>
<td>IN BRAZIL ARE LINKED TO DEFORESTATION</td>
<td></td>
</tr>
<tr>
<td>JBS, the ‘Monsanto of Deforestation’</td>
<td>13</td>
</tr>
<tr>
<td>Carrefour and deforestation for meat in Brazil: A long story</td>
<td>16</td>
</tr>
<tr>
<td>Meat products from JBS slaughterhouses sold in Carrefour supermarkets at high-risk of illegal deforestation and invasion of Indigenous lands</td>
<td>17</td>
</tr>
<tr>
<td>Investigation methodology</td>
<td>17</td>
</tr>
<tr>
<td>Findings from the analysis of beef products sold by Carrefour</td>
<td>20</td>
</tr>
<tr>
<td>Carrefour is linked to JBS slaughterhouses in Rondônia that threaten the Uru-Eu-Wau-Wau</td>
<td>20</td>
</tr>
<tr>
<td>IN FRANCE, CARREFOUR STILL SELLS ANIMAL PRODUCTS FROM ANIMALS FED</td>
<td>22</td>
</tr>
<tr>
<td>WITH SOY LINKED TO THE CONVERSION OF NATURAL ECOSYSTEMS</td>
<td></td>
</tr>
<tr>
<td>Bunge: A major player in deforestation in Brazil, and France and Europe’s main soy supplier</td>
<td>22</td>
</tr>
<tr>
<td>In France, Carrefour is connected to recent soy-driven deforestation in the Cerrado</td>
<td>26</td>
</tr>
<tr>
<td>Meat poultry and chicken</td>
<td>26</td>
</tr>
<tr>
<td>Laying hens and eggs</td>
<td>27</td>
</tr>
<tr>
<td>Dairy cattle and milk products</td>
<td>28</td>
</tr>
<tr>
<td>MIGHTY EARTH CALLS ON CARREFOUR TO LIVE UP TO THE MEAT CHALLENGE</td>
<td>31</td>
</tr>
<tr>
<td>CARREFOUR CAN AND MUST BECOME THE LEADER IN FOOD TRANSITION THAT IT CLAIMS TO BE</td>
<td>33</td>
</tr>
<tr>
<td>Bibliography</td>
<td>36</td>
</tr>
</tbody>
</table>
In June 2022, the Carrefour Group, Europe’s second-largest retailer, announced it had completed the acquisition of Grupo BIG supermarkets. As a result, it has become the leading retailer in Brazil. At the same time, deforestation in the Amazon has skyrocketed, with a 75% increase in Brazil since 2019 compared with the previous decade. The tipping point that would convert the rainforest into savanna, and which researchers believe is nearing, is a climate bomb that would release as much as two years of global greenhouse gas (GHG) emissions into the atmosphere. Meat is the main driver of this deforestation. It is mainly intended for the national market and supermarkets. In the absence of a serious zero deforestation policy and as the largest meat retailer in Brazil, it is estimated that Carrefour is associated with 4.5% of the deforestation in the Amazon.

An investigation conducted in Brazil by Mighty Earth in Carrefour stores and former BIG stores revealed that two thirds of the 102 documented meat products sold by Carrefour in Brazil were sourced from JBS. This Brazilian corporation is the world’s largest meat processing company and is regularly exposed for illegal deforestation in its supply chain. The company itself says it cannot ensure that the beef-based products it markets are lawful and made it clear that deforestation will still be tolerated in its supply chain for another 13 years. Even worse, 12% of the products analyzed as part of the investigation came from two JBS slaughterhouses located in the state of Rondônia. Now, a recent study revealed that these slaughterhouses were linked to indirect cattle ranches that cleared an Indigenous Uru-Eu-Wau-Wau territory. Over the past three months, Carrefour has therefore been mainly selling products related to JBS, a major driver of deforestation in Brazil. Consequently, it is also responsible for significant methane-based GHG emissions.

The meat sold in France and in Europe is also linked to deforestation and massive climate pollution. Soy imported into France for livestock feed is mostly supplied by agricultural commodity trader Bunge. Mighty Earth, like many other organizations, has identified Bunge as the soy importer most linked to deforestation and land conversion in the Cerrado, especially in the main soy-growing municipality. In 2021, while Carrefour had already committed via a manifesto to stop using soy from the conversion of natural ecosystems after the January 2020 cut-off date, Bunge was identified as the importer with the highest deforestation risk, with 87,866 hectares at risk. In addition, a recent report published by Mighty Earth revealed that both Bunge and Cargill continue to source soy from Brazilian suppliers and mega-conglomerates that have cleared and deforested at least 27,000 hectares on 10 Cerrado farms since January 2020. Mighty Earth now provides evidence that LDC, Carrefour’s main supplier of poultry and eggs for its private label, sources its soy from Bunge in the ports of Brest and Saint-Nazaire. Mighty Earth has urged Carrefour to stop sourcing animal products from farms using soy linked to deforestation, which the group itself had committed to do. As of today, Carrefour has not yet met its own commitments on soy. In five years, deforestation for palm oil in Indonesia has dropped by 95%.

This was made possible by a commitment to zero deforestation across the entire supply chain by the industry’s players. Mighty Earth is calling on Carrefour, one of the world’s leading retailers, and therefore a key company in the food transition, to ban from its meat supply chains the companies that are driving deforestation, in particular JBS and Bunge. A robust policy on meat and dairy products will require both transparency in the supply chain (on the origin of soy and meat products and their environmental and social impacts), but also a significant offer of alternatives to animal proteins. Finally, such policies require significant human resources to meet these food and ecological challenges.
We take note of the report you sent us on Tuesday 30 August. It includes a lot of detailed information, particularly concerning more than a hundred products that Mighty has investigated. We are integrating these elements into our alert process in accordance with our vigilance plan and are launching an investigation into all the data transmitted.

“As with every alert we receive, the cases you raise require careful consideration in accordance with the Group’s alert process. We will take appropriate action based on the results and will get back to you with the decisions taken.

“In parallel to this investigation process, we are already taking preventive measures by suspending all marketing of beef from the two JBS slaughterhouses in Rondônia, Pimenta Bueno and Vilhena, highlighted in your report.
The Carrefour Group operates more than 12,000 stores worldwide. It is the second-largest retailer in Europe. Its annual revenues amounted to 72 billion euros in 2021. Established in Brazil since 1975, Carrefour has become the country’s leading retailer after acquiring in 2022 Grupo BIG, Brazil’s third-largest food retailer. Brazil represents one of the most important markets for the company. At the end of 2021, before the acquisition of Grupo BIG, Carrefour already operated 548 stores in the country, which accounted for 15% of its total revenue.
Since the acquisition of Grupo BIG, completed on June 7, 2022, the French company now represents, according to Carrefour Group, about 25% of the food retail market in Brazil, with over 1,000 stores.

For the year 2021, Carrefour’s sales in Brazil are estimated at 15.3 billion euros. Grupo BIG’s sales amounted to 3 billion euros in 2020.

Many retailers in Brazil are now part of the Carrefour group, such as Atacadão, Todo Dia, Big Bompreço, Sam’s Club, Carrefour, and Nacional.

According to Carrefour, this takeover is part of the group’s external growth strategy, which aims to consolidate its position as a leader in the Latin American region.

Brazil is now expected to account for 18% of its total revenues and, according to the company’s estimates, should contribute as much to its profitability as its French stores. Brazil is therefore a crucial country for Carrefour.

Now that Carrefour is the leading meat retailer in Brazil, it faces a key challenge: meat is the main driver of deforestation in the country.

In Europe, the meat and dairy products sold by the group are also connected to farms that use soy as livestock feed. Yet, soy farming contributes to the deforestation and destruction of Latin American ecosystems.

* Figures published by the group vary from one press release to another.
BRAZIL, A COUNTRY PLAGUED BY RECORD DEFORESTATION AND FIRES

Since Brazil is the country where the Carrefour Group has developed into a leader in the retail industry, it requires close attention. In South America, other countries such as Bolivia and Colombia are also experiencing high deforestation rates connected to the meat industry. But the figures for Brazil are particularly alarming.

2022: A record year for deforestation and fires

Since 2019, deforestation is destroying more than 1 million hectares per year in Brazil. This figure is rising steadily. According to the Brazilian National Institute for Space Research (INPE), deforestation in the Amazon in Brazil in 2021 reached an unprecedented level since 2008, with 1.21 million hectares cleared.

The first months of 2022 set new records. Indeed, the DETER satellite detected from January 1 to August 19, 2022 a deforestation rate 11% higher than last year over the same period and 11% higher than in 2019. The year 2019 had been marked by extensive media coverage on deforestation in the Amazon.

Regarding fires, the trend is dramatic. Brazil had not experienced so many wildfires in the Amazon for 15 years. On August 22, 2022, 3,358 simultaneous fires were detected in the world’s largest rainforest. On August 10, 2019, known as “Dia do Fogo” (Fire Day), which had unleashed a media storm at the time, even resulting in statements from the French president, the INPE detected 40% fewer fires.

The acceleration of this trend can be explained by the upcoming presidential race that will take place in Brazil in October 2022. Indeed, this 2022 could be the last year of the Jair Bolsonaro government. According to Mapbiomas (2022), which analyzes data from satellite mapping systems, Bolsonaro’s government has investigated less than 3% of the deforestation alerts issued by the relevant institutions. Anticipating the possibility that Bolsonaro will not be re-elected president—and that, as a result, the control of environmental crimes will be reinforced by the future leader—the deforestation players have intensified their illegal activities. This is not an isolated case: deforestation rates generally increase during local election years, as local governments turn a blind eye or even encourage deforestation to finance their campaigns or get votes in return.

According to a study by Mapbiomas, deforestation in the Amazon has skyrocketed in Brazil, recording a 75% increase since 2019 compared with the previous decade. It even increased by 20.1% across the country in 2021.

This same study, carried out by Mapbiomas on a period spanning from 1985 to 2020, maps the emergency of this dramatic situation. During this period, the land use dedicated to livestock in Brazil increased by 39%.

The study also shows that the area planted with soy has been growing steadily since 1985, especially in the Cerrado, Mata Atlântica (Atlantic Forest) and Amazon regions. The area devoted to agriculture in these three regions has almost tripled, increasing from 20 million hectares in 1985 to 56 million hectares in 2020.
According to the World Resources Institute (WRI), in 2021, Brazil was responsible for 40% of the world’s primary forest loss, with 1.5 million hectares cleared (according to their own land-use methodology). This is three times more than the Democratic Republic of Congo, which ranked world number 2 in terms of deforestation rate.6

This year’s record deforestation rate predicts a grim future for Brazil’s forests and other ecosystems.

**Meat, a major cause of deforestation in the Amazon and Cerrado**

The causes of deforestation are manifold and complex. First, controversial changes to Brazil’s forestry code in 201211 resulted in amnesty for farmers guilty of environmental crimes. More recently, the institutions responsible for monitoring and preventing deforestation have been undermined.

This institutional bias only supports the ambitions of socio-economic players who haven’t done anything to change their practices despite their commitments.

The main direct drivers of deforestation in the Amazon are cattle ranching and agriculture (particularly soy production), which together account for 97% of the overall deforestation.

Infrastructure investments, illegal land grabbing and logging in the Amazon are also putting great pressure on and negatively impacting conservation units and Indigenous territories.

While Bolsonaro’s coming to power in 2019 accelerated this destructive process for the forest and its inhabitants, many companies in key industries also bear a heavy responsibility, as they failed to implement the necessary actions to stop sourcing products linked to deforestation.
Cattle ranching is the main cause of deforestation in the Amazon

According to the Amazon Environmental Research Institute (Instituto de Pesquisa Ambiental da Amazônia, IPAM), 75% of deforestation in the Amazon is connected to cattle ranching.\(^\text{12}\)

Out of the 10.3 million tons of beef produced in Brazil in 2020, 74% (7.6 million tons) was aimed at the domestic market and 26% (2.7 million tons) was exported.\(^\text{13}\) The domestic market thus plays a major role in deforestation for meat.

In 2020, Brazil’s Legal Amazon had a population of 93 million head of cattle. The largest populations were found in the states of Mato Grosso (32.7 million) and Pará (22.3 million). The total area of pasture reached 71.5 million hectares in 2020, while the cultivated area covered 17 million hectares.

The issue is localized and can be addressed with political and economic will: 2% of the properties in the Amazon and Cerrado are responsible for 62% of potentially illegal deforestation.\(^\text{14}\)

Soy for livestock feed: Yet another major driver of deforestation and ecosystem destruction

- 10% of the deforestation in South America over the last 20 years was caused by soy. The most rapid expansion was recorded in the Brazilian Amazon where the soy cultivated area multiplied by 11 between 2000 and 2019.\(^\text{15}\)

- In Brazil, deforestation for soy, either directly or indirectly, accounts for 6% of the total area of the Amazon, 16.6% of the Cerrado, 7.8% of the Mata Atlântica, and 0.2% of the Pantanal and Caatinga (Song et al., 2021).

- Nearly 80% of the world’s soy production is intended for livestock feed (in the form of soybean meal) and 18% for oil production. The remaining 2–3% goes to human consumption (WWF Brazil).

- Brazil is the largest soy producer and exporter in the world. The industry involves more than 243,000 farmers in the country.\(^\text{16}\) It also includes, among others, cooperatives, traders, processing plants, and exporters. Certification reaches a very low level. Today, about 70% of the production of beans, oil, and meal is exported. Europe accounts for 9.5% of these exports (Fearnside, 2021).
• The Soy Moratorium in the Amazon is believed to have succeeded in decreasing deforestation in Brazil between 2006 and 2012; Aprosoja (the national association of soy producers) is still trying to invalidate this agreement and is opposed (alongside other market players) to the extension of this Moratorium to the Cerrado.\textsuperscript{17}

• About 41% of EU soy imports originate from Brazil, that is 13.6 million tons per year (Rajao et al., 2020). In the last 12 months of available data, France imported 1.853 million tons of soy from Brazil (according to the French customs,\textsuperscript{18} combining the meal and the beans).

• 20% of Brazilian soy exported in 2018 was connected to illegal deforestation in the Amazon and Cerrado (Rajao et al., 2020).

\begin{figure}[h]
\centering
\includegraphics[width=\textwidth]{silo_in_brazil_photo_shutterstock.png}
\caption{Silo in Brazil. Photo: Shutterstock}
\end{figure}

\textbf{FROM MAY 2021 TO MAY 2022, THE SHARE OF BRAZILIAN SOY IN THE TOTAL SOY IMPORTS AMOUNTED TO 55%.
}

\begin{figure}[h]
\centering
\begin{tabular}{l|l|l}
\hline
\textbf{Human consumption} & \textbf{Livestock feed} & \textbf{Industry (3.8\%)} \\
\hline
Tofu, soy milk, tempeh, oil & Poultry, pigs, aquafarming, and other animals & Biodiesel, lubricants, other \\
\hline
\end{tabular}
\caption{Soy use worldwide in 2022. \textit{Source: Our world in Data}}
\end{figure}

\textbf{77 \%}

\textbf{19,2 \%}

\textbf{Livestock feed}

\textbf{Industry (3.8\%)}

\textit{Poultry, pigs, aquafarming, and other animals}

\textit{Biodiesel, lubricants, other}
AMAZON’S TIPPING POINT IS GETTING EVER CLOSER

According to WRI, new data provided in August 2022 confirm that wildfires are increasing in size, consuming nearly twice as much tree cover worldwide today as they did 20 years ago.¹⁹

Unlike in boreal forests, wildfires are not part of the normal ecological cycle of rainforests. Yet, their number is also on the rise.

Deforestation and forest degradation associated with the expansion of agriculture are causing increased temperatures and the drying out of vegetation.

Deforestation has skyrocketed and the Amazon is struggling to regenerate.

Vast stretches of land could turn into savanna. Some scientists refer to this as a “tipping point” that could radically change not only the Amazon region, but the world we live in.²⁰

The theory of tipping points is based on the principle that there are certain thresholds beyond which even a small change can cause a system to tip into a totally different state. These abrupt changes have irreversible consequences on a global scale.

In the case of the Amazon, the tipping point is linked directly to the deforestation rate. A study recently published in Environment: Science and Policy for Sustainable Development,²¹ which looked back over the past 30 years, suggests that we are reaching the tipping point much faster than expected. According to this study, once 20–25% of the Amazon forest area is deforested, it will no longer be able to regenerate and will enter a process of irreparable transformation. This means that once the Amazon has lost 22% of its original surface area, it will no longer be able to recycle rainfall and will give way to a drier climate that will transform the rainforest into savanna. Satellite data collected as part of the study also showed that more than 75% of the rainforest has lost its stability since the early 2000s. It therefore recovers from droughts and fires much more slowly than it used to.

The Amazon rainforest has already been cut down by 20%, especially in its southern and eastern parts.²² Studies cannot predict exactly when this tipping point might be reached, but scientists are sounding the alarm that when it occurs, it will be too late. Crossing the tipping point will irreversibly accelerate global warming and we are dangerously approaching that threshold.

Other researchers have observed an increase in tree mortality and a reduction in photosynthesis in the most deforested areas of the Amazon as a result of climate change.²³

OVER THE PAST 20 YEARS, THE TREE COVER LOSS CAUSED BY WILDFIRES IN THE TROPICS HAS INCREASED AT A RATE OF AROUND 36,000 HECTARES (ABOUT 5%) PER YEAR.

THE BUILDING OF THE AMERICAN INLAND ECONOMY, FROM 1945 TO THE PRESENT

THE FORESTS OF THE AMAZON COULD RELEASE UP TO 90 BILLION TONS OF CO₂, WHICH IS TWICE THE ANNUAL GLOBAL EMISSIONS.
Assessment of Carrefour’s potential impact on deforestation linked to beef in the Brazilian Amazon

Although meat is the main cause of deforestation in South America, and Carrefour is one of the region’s major retailers, Mighty Earth was not provided with full information on the volumes of meat sold by the group. The origin of this meat is not published in a transparent way, in contrast to companies selling highly processed products (such as surfactants made from palm oil) who indicate the origin of their raw material. For instance, Nivea and Beiersdorf disclose the list of mills that supply palm and palm kernel oil. Carrefour has not provided any impact assessment of these meat products on deforestation either. Given this lack of transparency, Mighty Earth developed an ad hoc methodology based on macroeconomic data to assess Carrefour’s potential impact on the Amazon rainforest’s deforestation. This approach has already been proposed by Envol Vert in 2020 to assess the potential impact of Casino Group and has also been used by the Center for Climate Crime Analysis (CCCA) in Brazil. Deforestation is a complex issue and many factors come into play (land speculation, commodity costs, government support, etc.). Given its leadership in the Brazilian retail sector, and as the largest private meat retailer in the country, Carrefour faces a heavy responsibility. To map the risks, and as required by the French law on the duty of vigilance, the footprint assessment makes it possible to prioritize the level of effort required to implement actions in this industry.

Methodological note on the link between representativeness and the volume of meat sold: if the Carrefour Group represents 25% of the retail market in Brazil, this does not necessarily mean that it sells 25% of the meat in the country. Given the lack of data disclosed by Carrefour, other figures were used to build our estimate. According to the Brazilian Association of Supermarkets (ABRAS), Carrefour occupied in 2021 a store area equal to 2.141 million square meters, to which should be added the store area of Grupo BIG stores, which is estimated at 0.5 million square meters (according to the new stores and the average store area in Brazil–ABRAS 2019). Therefore, Carrefour is now likely to occupy a store area equivalent to 2.6 million square meters. Supermarkets in Brazil occupy a total area of 23 million square meters. As a result, Carrefour now accounts for 11.3% of the total store area. This figure should be favored over the 25% figure, as it reflects more accurately the sales capacity, which is more related to the supermarkets’ sales area than to their economic weight in Brazil’s retail sector. However, more accurate and transparent figures provided by the group, and including all fresh, frozen, and processed beef products, are needed to accurately estimate these volumes.
ASSESSMENT OF THE POTENTIAL DEFORESTATION FOOTPRINT OF CARREFOUR IN BRAZIL. THE CASE OF DEFORESTATION FOR BEEF IN THE AMAZON

Drawing on available macroeconomic data, and in the absence of transparent data provided by Carrefour on the volumes of meat sold in all its stores in Brazil, Mighty Earth compiled the following information to measure the group’s footprint:

• According to IPAM, 75% of the deforestation in the Amazon is caused by the beef industry.
• The economic allocation to test the impact of meat production compared with all beef by-products, according to a 2022 Springer paper on life cycle assessment methods, is 87% for beef.27
• According to the Brazilian Beef Exporters Association (ABIEC), the meat sold to the Brazilian domestic market accounts for 74% of the country’s production. The remainder is exported.
• According to ABRAS, in 2019, the retail sector accounted for 80% of food and beverage sales in Brazil.28
• Since the acquisition of Grupo BIG in 2022, Carrefour accounts for 11.3% of the total sales area of the Brazilian retail sector.

Based on these elements, and since the June 2022 takeover of Grupo BIG, the potential percentage of Brazilian Amazon deforestation linked to the beef sold by Carrefour in Brazil is:

Deforestation for beef rate × Economic allocation of meat × Percentage of Brazilian market × Percentage of food distribution × Carrefour’s percentage in the retail food market = 4.5%

Therefore, the potential responsibility of Carrefour in Brazil in the deforestation of the Amazon since June 2022 amounts to circa 4.4%.

* This share of responsibility does not cover the stores’ location, nor their level of sustainability, nor the amount of meat actually sold in Carrefour stores. It only takes into account macroeconomic data and is therefore only an estimate of the potential deforestation footprint. However, Mighty Earth’s investigations show that Carrefour relies heavily on JBS and its high-risk slaughterhouses. Its policy is weak because it does not include indirect farms, which account for the majority of deforestation in the sector. The result of the estimated potential deforestation footprint emphasizes above all the need for urgent action.
In light of the deforestation figures measured by INPE in 2021 (1.21 million hectares), the consolidated deforestation numbers for 2022 are expected to be identical or even higher than the previous year. The estimated annual deforestation in the Amazon linked to the meat products sold by Carrefour in Brazil, after the takeover of Grupo BIG, is likely to amount to more than 50,000 hectares for the year 2022 (see methodology above). This deforestation equals the average net forest cover loss of Cameroon (-56 Kha/year from 2010 to 2020) or Ecuador (-53 Kha/year) according to the Food and Agriculture Organization (FAO). It is also worth noting that this figure is a conservative value, as it does not consider the impact of other raw materials produced in Latin America and sold by the group (soy, wood, cotton, corn, gold, etc.) nor the impact of cattle farming on other biomes affected by land conversion (Cerrado, Pantanal, Atlantic Forest, etc.).

Given the huge potential deforestation footprint of Carrefour in Brazil, we conclude that the issue of the impact generated by its beef sales must be a top priority at the executive management level and which needs to be addressed with substantial financial means. Mighty Earth is calling on Carrefour to disclose in full transparency the volumes of beef sold in Brazil, as well as its origin (see chapter on requests). Mighty Earth is also willing to publicly redo the calculation with Carrefour Group using more accurate data to refine this estimate. While this calculation only estimates a potential impact, it points out the extent to which a meat policy that addresses the problem of deforestation must be Carrefour’s top priority.

**BEEF PRODUCTS LINKED TO DEFORESTATION FOUND IN CARREFOUR STORES IN BRAZIL**

**JBS, the ‘Monsanto of Deforestation’**

Several reports have raised awareness of JBS’s major role in deforestation in Brazil and have done so for years. Among these are *The Boys from Brazil* conducted by Mighty Earth in 2022, Greenpeace’s *Still slaughtering the Amazon* and Amnesty International’s reports. Indeed, JBS is the country’s largest beef producer and the world’s largest meatpacking company.

According to an interview with the Brazilian Agricultural Research Corporation (Embrapa) in August 2022, JBS slaughters 35,000 head of cattle per day. The Brazilian Institute of Geography and Statistics (IBGE) has estimated that 27.23 million head of cattle were slaughtered in Brazil in 2021. JBS would thereby have slaughtered 47% of Brazil’s cattle in 2021.

The company’s business model is constantly expanding. Between 2009 and 2020, the number of farms supplying livestock to JBS increased from 7,700 to 16,900. According to Chain Reaction Research, JBS’s total deforestation footprint linked to its operations in Brazil since 2008 may be as high as 200,000 hectares in its direct supply chain, and 1.5 million hectares in its indirect supply chain.

The impact of JBS on climate, environment, biodiversity, and Indigenous people is overwhelming. The group is also strongly linked to illegal activities. Prosecutors found in a 2020 audit that nearly one third of the cattle purchased by JBS SA in the state of Pará (300,000 head) in the Brazilian Amazon came from ranches with “irregularities” such as illegal deforestation.
JBS has committed to permanently eradicate deforestation from its global supply chain, but not before 2035. The company has therefore decided to associate its activities with the systematic destruction of the Amazon for another 13 years. Even worse: the group has pledged to stop sourcing beef from illegal deforestation, but only from 2025 onwards. Therefore, sourcing beef from JBS today means sourcing potentially illegal beef. In its latest reports, Greenpeace has also raised concerns about the fact that JBS’s supply chain includes cattle illegally raised in the Brazilian Amazon rainforest. This has consequences for the Indigenous people and inhabitants of the reserves who live in the region and whose lands have been seized and rights violated. Contemporary slavery and violence during the invasion of Indigenous lands have also been observed in JBS’s supply chain.

In June 2022, the CCCA revealed that JBS’s slaughterhouses are buying from farms located in an Indigenous Uru-Eu-Wau-Wau reserve in the Amazon, Rondônia state. This reserve has already lost 13,000 hectares of forest to make way for illegal cattle ranching. JBS is also responsible for significant GHG emissions due to methane. The industrial livestock industry is a key driver not only of CO₂ emissions but also of methane.

Methane has a global warming impact 86 times higher than CO₂ over a 20-year period; however, it breaks down much more quickly. In its “net-zero” pledge, JBS is particularly vague and it fails to address methane.
The Institute for Agriculture and Trade Policy (IATP) estimates that the annual JBS emissions have increased by 51% in five years, from 280 million tons in 2016 to 421.6 million tons in 2021. According to the IATP, JBS’s GHG emissions are as high as those of some countries. Water pollution from the meat industry is also significantly high, especially due to nitrate. JBS, Cargill, and Bunge in particular have been criticized for the negative impacts of their meat on watersheds in the United States.

JBS is also involved in major corruption cases as well as sanitary and social scandals.

Many investigations have shown that JBS has a systemic problem with deforestation, but not limited to it, and therefore qualifies as the “Monsanto of deforestation.” A collection of the main international press articles on this subject is provided at the end of the report. Companies sourcing from JBS are therefore complicit in the deforestation that is rampant in the Amazon and other biomes. The following figure summarizes JBS’s unfulfilled commitments.

Figure 6: JBS’s broken promises on deforestation.
Source: The Boys from Brazil, Mighty Earth
Lastly, AidEnvironment’s latest Realtime Deforestation report published in August 2022 points out, once again, that some JBS sourcing is very likely to have come from ranches involved in deforestation or illegal ecosystem conversions in 2022, in at least four cases, in the Amazon and in the Cerrado. JBS’s promised changes still aren’t visible on the ground.

**Carrefour and deforestation for meat in Brazil: A long story**

Table 1: Summary of the reports of the last two years mentioning Carrefour’s reselling of meat products from illegal deforestation.

<table>
<thead>
<tr>
<th>NAME/REPORT DATE</th>
<th>AUTHOR:</th>
<th>LINK BETWEEN CARREFOUR AND THE SLAUGHTERHOUSE INVOLVED</th>
</tr>
</thead>
<tbody>
<tr>
<td>Carrefour may face Financial Risks from deforestation-linked beef sourcing in Brazil</td>
<td>Chain Reaction Research</td>
<td>Carrefour has committed to permanently eradicate deforestation from its global supply chain by 2020. An investigation of beef products sold by Carrefour indicates that they are linked to sourcing at risk of deforestation in the Amazon (particularly the Atacadão supermarkets).</td>
</tr>
<tr>
<td>February 2019</td>
<td>Link to report</td>
<td></td>
</tr>
<tr>
<td>Le groupe Carrefour complice de la déforestation de l’Amazonie</td>
<td>Disclose</td>
<td>Carrefour sources its products from the agribusiness giant Minerva. This global company is accused of participating in deforestation by buying from farms that have participated in illegal deforestation. In the case described, 2,000 hectares were identified.</td>
</tr>
<tr>
<td>July 202043</td>
<td>Link to report</td>
<td></td>
</tr>
<tr>
<td>Monitor–Steak in the supermarket, forest on the ground</td>
<td>Reporter Brazil</td>
<td>Carrefour in Brazil and Grupo BIG, since taken over by Carrefour, are mentioned five times as retailers of meat products linked to farms that illegally cleared 1,093 hectares of forest. Cases of cattle laundering have been identified. Several slaughterhouses, including JBS’s, are mentioned.</td>
</tr>
<tr>
<td>February 202144</td>
<td>Link to report</td>
<td></td>
</tr>
<tr>
<td>Making Mincemeat of the Pantanal</td>
<td>Greenpeace</td>
<td>JBS, Marfrig, and Minerva slaughtered cattle purchased from farmers linked to the 2020 Pantanal fires. These major meatpackers supply several companies, including Carrefour. In this case, 30% of the Pantanal burned.</td>
</tr>
<tr>
<td>March 2021</td>
<td>Link to report</td>
<td></td>
</tr>
<tr>
<td>How Beef Jerky Sold by Carrefour in Brussels is Linked to Amazon Deforestation</td>
<td>Mighty Earth &amp; Reporter Brazil</td>
<td>Carrefour sells Jack Link’s Beef Jerky products in its stores in Brussels, Belgium. These exported meat products present risks of deforestation of the Amazon. JBS is involved.</td>
</tr>
<tr>
<td>December 2021</td>
<td>Link to report</td>
<td></td>
</tr>
</tbody>
</table>

The Carrefour Group has therefore been connected to cases of deforestation for beef for a long time, and the risks in its supply chain have been identified. Yet, while the company is a leading member of the Forest Positive Coalition of Action led by its CEO Alexandre Bompard, and despite the Act for Food program, it still sells meat products derived from deforestation, as described in the next chapter.
Meat products from JBS slaughterhouses sold in Carrefour supermarkets at high risk of illegal deforestation and invasion of Indigenous lands

As mentioned above, Carrefour Group sources its products from JBS, a company that has regularly been blamed for sourcing from farms that have been involved in deforestation.

Since 2020, an action has been underway against Carrefour’s main competitor in Brazil, the Casino group and its subsidiary GPA.

Carrefour is now being closely watched. Mighty Earth and other associations such as Envol Vert or Canopée have called on the Carrefour Group to put an end to the sale of meat products from deforestation. The “Drop JBS” campaign was launched to ask companies that source from JBS, or finance it, to stop dealing with the company until it actually commits to a zero deforestation policy. Carrefour is one of the main retailers of JBS meat products.

Given JBS’s irresponsible behavior, one of the main requests formulated by these associations is that the Carrefour Group stops sourcing from this forest-destroying supplier until the latter implements a policy that guarantees all its customers zero deforestation in its supply chain.

Mighty Earth has been discussing this issue with Carrefour for many years, asking for a commitment that meets the challenge of ending deforestation. In 2022, these communications increased, with official letters from several NGOs (Envol Vert, Canopée, CPT, Notre affaire à tous) and regular bilateral discussions. However, Carrefour still buys from JBS, which still provides its customers with meat from illegal deforestation.

THE ‘DROP JBS’ CAMPAIGN CALLS FOR ENDING SOURCING FROM JBS UNTIL IT IMPLEMENTS A ZERO DEFORESTATION POLICY
Mighty Earth therefore sought to measure the level of Carrefour’s reliance on the JBS company in Brazil, and more broadly the level of deforestation risk of the meat products it sells. The field investigation was conducted in-store and ran from May to August 2022. It also included products from the former Grupo BIG supermarkets.

Our investigation gathered a representative sample of 102 products that were identified in six Carrefour stores in six different cities across Brazil. Three stores in the state of São Paulo were inspected in August 2022:

- Atacadão in Limeira
- Maxxi Atacado in Araras
- Carrefour in São José de Rio Preto

A Carrefour in Manaus in Amazonas, a Carrefour in Belém in the state of Pará (both visited last August) and an Atacadão in Sinop in the State of Mato Grosso were also investigated. The products from the Atacadão in Sinop were listed in May 2022. All these stores belong to the Carrefour Group in Brazil.

The slaughterhouses were identified using the SIF number on the product labels. The meat origins were analyzed by Global Canopy’s Do Pasto ao Prato tool. Global Canopy rated JBS products from both slaughterhouses 457 and 4302, and sold by Carrefour, as high risk of deforestation, with scores of 96/100 and 70/100 respectively. Global Canopy’s risk-level analysis map (see above) identifies the slaughterhouses located in livestock deforestation risk areas. The Amazon and the Cerrado are the areas of greatest risk.
Beef product sold in a Carrefour store in Belém, state of Pará. This JBS product comes from a slaughterhouse (SIF n° 457) connected to deforestation activities. Source: Mighty Earth and Global Witness investigation August 2022.

Beef product sold in an Atacadão store, property of the Carrefour Group, in Sinop, state of Mato Grosso. This product comes from a JBS slaughterhouse (SIF n° 4302). Source: Mighty Earth investigation May 2022.

Map 2: Map indicating the level of deforestation risk surrounding slaughterhouses. Source: Global Canopy
Findings from the analysis of beef products sold by Carrefour

50%

Approximately 50% of the products analyzed during the investigation (52 out of 102) came from slaughterhouses that were generally rated as high risk on all Global Canopy’s criteria of deforestation, wildfires, slavery, and sanitary standards. Only 6% of the listed products came from slaughterhouses that were well evaluated for all these criteria.

81%

Approximately 81% of the products (83 of 102) came from slaughterhouses located in areas at high risk of deforestation and wildfire.

72%

Lastly, 72% of the products (73 out of 102), or more than two thirds of the meat product samples sold during this last quarter in the six Carrefour stores in Brazil, came from JBS slaughterhouses. Carrefour stores are therefore more reliant on JBS than JBS’s own meat production capacity in Brazil (47%, as indicated in the previous chapter dedicated to JBS). The Carrefour Group does not leverage its major customer status to push JBS to act and stop supplying meat products from illegal deforestation.

Carrefour is linked to JBS slaughterhouses in Rondônia that threaten the Uru-Eu-Wau-Wau

Of the 102 products sampled, 12% came from the state of Rondônia in the Amazon (12 products identified). The related SIF numbers are 2880, attributed to a JBS slaughterhouse in Pimenta Bueno, and 4333, attributed to another JBS slaughterhouse in Vilhena.

Map 3: Tracing a case of cattle laundering from an Indigenous reserve to products sold in Carrefour stores.

Sources: Mighty Earth investigation and CCCA report
According to the Transparency for Sustainable Economies (Trase) initiative, these two Brazilian slaughterhouses are those (with the one in Maraba, Pará) that are exporting the most deforestation. Their products are sold 2,400 km away from Rondônia in the three stores in the state of São Paulo, but also in the store located in Manaus, Amazonas.

According to the latest report published in June 2022 by the CCCA on the Casino case, these slaughterhouses are among those that indirectly source from the Uru-Eu-Wau-Wau Indigenous territory in the heart of the Amazon region of the Rondônia state.

This detailed report maps deforestation and pasture areas in the Amazon, within the Uru-Eu-Wau-Wau Indigenous community with particular emphasis on the area that overlaps with the Burareiro territory. In addition, the supply chain analysis showed that nine of the illegal farms located on these Indigenous territories indirectly fueled the supply chains of the two JBS slaughterhouses that were also identified in the Carrefour supply chain.

The CCCA field investigations conducted in June 2022 reported illegal invasions of the Uru-Eu-Wau-Wau Indigenous territory to make way for cattle farms. The CCCA identified the illegal presence of 25,482 head of cattle in the Indigenous reserve of Rondônia, and 13,411 hectares of forest were cleared for grazing—an area larger than the city of Paris. These investigations also document the many impacts of these invasions on the Indigenous peoples:

- The environmental damage from deforestation and cattle ranching is estimated at more than 128 million euros.
- The security, livelihoods and the very culture of Indigenous peoples are also under threat. “The Uru-Eu-Wau-Wau people have suffered from a constant and expanding encircling of their territory that threatens their lives,” said a member of the Indigenous people.
• On top of that, there is also a sanitary impact. According to witnesses, “Invaders have also violated the rights of isolated Indigenous populations by making contact with them while these people with no immunological memory are particularly vulnerable, especially in times of a pandemic.”

The Carrefour Group in Brazil indicated to Mighty Earth, in previous exchanges, that it had stopped sourcing meat from JBS slaughterhouses in Rondônia but did not provide a date. The analyses carried out recently in stores show on the contrary that Carrefour sells massively (12% of the sample), and across Brazil, meat originating from Rondônia slaughterhouses in the Amazon. In addition, the monitoring system for supplies at risk of links to deforestation did not work, since this case of illegal deforestation of an Indigenous territory, which was revealed in June 2022, should have led to an immediate suspension of sales of the meat products from JBS slaughterhouses in Rondônia, in August 2022.

The risk level associated with Carrefour’s supplies, as well as the weakness of the policy implemented, especially on indirect beef suppliers, shows that the entire group in Brazil is heavily linked to deforestation.

IN FRANCE, CARREFOUR STILL SELLS ANIMAL PRODUCTS FROM ANIMALS FED WITH SOY LINKED TO THE CONVERSION OF NATURAL ECOSYSTEMS

Bunge: A major player in deforestation in Brazil, and France and Europe’s main soy supplier

Bunge is the main importer of soy in France. According to the French government and its scorecard assessing deforestation risks associated with its soy imports, Bunge accounts for 32% of soy imports. Bunge’s two main import points are the ports of Brest, where the soybeans are imported, and Saint-Nazaire, where soy is imported in the form of meal for livestock feed.

According to French customs (August 2022), 2,839 kt of soy meal and 538 kt of soybeans were imported during the last 12 months. Since August 2021, Bunge has imported more than one million tons of soy into France, which ranks Bunge as the largest importer of agricultural commodities into France in terms of volume.

The French government itself indicates in the National Strategy to Combat Imported Deforestation that 40% of Bunge’s imports present a high risk of deforestation.

Soy imported into France originates mainly from the municipality of Formosa Do Rio Preto, in the state of Bahia, which provides 319 kt of soy every year according to the French customs and Trase (2018 data). This municipality faces a high risk of deforestation,
as shown above by the red peak on Map 4. Trase data also show that Bunge trades 55% of Formosa Do Rio Preto’s soy,\textsuperscript{53} which makes it \textbf{the largest importer of soy from this high-risk municipality}. Lastly, according to Trase data, this soy is mainly shipped to France.

The report \textit{Promises, Promises!}\textsuperscript{54}, released in July 2022 by Mighty Earth in collaboration with AidEnvironment, provides an analysis of the operations within this municipality. The scale of the destruction is astounding.

The most spectacular deforestation documented in the report occurred in the Condominio Agrícola Estrondo, located in the municipality of Formosa Do Rio Preto, where over 15,000 hectares were cleared after 2020. Of these 15,000 hectares, more than 100 hectares were destroyed illegally, in what should have been the farm’s protected Legal Reserve.

Disclose\textsuperscript{55} also traced the soy supply chain from Brazil to France and found that some of the imports were linked to arson and violence against the population of the Cerrado, particularly in Formosa Do Rio Preto, the region where Bunge sources its products.
Furthermore, Bunge was found to be the global soy importer with the largest increase in silo storage capacity in municipalities with high deforestation risk, accounting for 110,000 tons between 2019 and 2021.56

The Promises, Promises! report also indicates that five major importers, including Bunge and Cargill, are sourcing from a dozen farms that have caused the deforestation of more than 27,000 hectares in the Cerrado.

The Mighty Earth investigation also revealed that Bunge and Cargill were the two importers with the highest risk of deforestation in 2021, with 87,866 hectares and 63,701 hectares destroyed respectively.

Despite repeated calls and cooperative initiatives to improve the sustainability and traceability of supply chains, major traders still have not made tangible and clear commitments to address the conversion of natural ecosystems after the cut-off date of January 1, 2020.

And lastly, in August 2022, a recent Earthsight57 report focused once again on Cargill and Bunge, and found that these two traders were sourcing soy produced on a farm located on the traditional lands of the Guarani-Kaiowá Indigenous group in Mato Grosso do Sul. These companies’ practices are not sustainable and violate the commitments made by France and by the companies that source animal products from farms fed on these importers’ soy.
Figure 7: Cerrado farms with signs of deforestation after August 2020.

Source: Mighty Earth Promises, Promises! 2022
In France, Carrefour is connected to recent soy-driven deforestation in the Cerrado

Cattle farms, which supply dairy products, as well as layer and broiler chicken farms, account for between 63% (according to Envol Vert) and 76% (according to CEREOPA) of soy imports in France. Mighty Earth focused its attention on the origin of the soy used for livestock feed in the farms that supply animal products (meat and dairy products) for Carrefour’s private labels.

Meanwhile, Carrefour measured its soy footprint, which constitutes a significant first step. The same proportions were found as those identified previously.

According to Carrefour, the three markets (milk, chicken, and eggs) accounted for more than three quarters of the group’s soy footprint in 2020. The group boasts of supporting non-GMO soy, yet according to its own 2020 figures at group level, 70% of the soy used for livestock feed was GMO soy without guarantees on its origin, and this just for their private labels.

Meat poultry and chicken

Poultry farmers are most often built-in players with little leeway on the choice of feed, often mandated by the company to which they sell their poultry or eggs.

As part of its transparency policy, Carrefour has disclosed the list of its main suppliers of animal products. Carrefour’s chicken for its private label is primarily supplied by the Maître Coq Group, then by other subsidiaries of the LDC Group and by the Galiance Group. The first two structures mentioned are companies that belong to LDC, the leader of the broiler poultry industry in France. LDC is also the leading poultry producer in Europe.
Mighty Earth interviewed various players in the soy and livestock feed market. They confirmed that the LDC Group inevitably sources its soy from Bunge, the main French importer. This was said for the port of Montoir regarding soy meal, or for soybeans imported into the Brest facility and processed on site, which belongs exclusively to Bunge.* Bunge is even considered by the LDC Group as a key soy supplier for its brands.

In addition, both LDC and Carrefour have signed the manifesto for sustainable soy. By sourcing its poultry products from LDC without checking the origin of the soy or requiring guarantees, Carrefour is complicit in the deforestation that took place after the January 1, 2020, cut-off date and in the conversion of natural ecosystems. These practices violate their commitment as signatories, alongside the French government, of the manifesto for sustainable soy. The latter states that retailers are committed to supporting the rapid implementation of the January 1, 2020, cut-off date, common to all players of the industry, to ban any soy originating from a Cerrado area that has been deforested/converted after this date.

**Laying hens and eggs**

Carrefour sources its eggs from the Cocorette Group, LŒUF and Matines companies. Two of these companies are also part of the LDC Group. Therefore, Carrefour eggs are also potentially linked to deforestation through the importer Bunge.
Dairy cattle and milk products

Dairy products account for about one third of the group’s soy footprint in France, and the main market for soy in France, according to Carrefour’s estimates.

Unlike the poultry sector, dairy farmers have far more freedom to choose their suppliers. When the farmer’s agricultural land is not sufficient to provide enough grass for fodder, farmers must switch to a corn-soy combination.

Corn is mostly produced locally while soy is imported directly in the form of meal. Some of these dairy farmers charter their own trucks to buy soy to supplement the feed. Meetings with Mighty Earth experts over the past few years have helped identify that the main selection criterion is the distance between the farm and the port of import.*

Dairy farmers are thus choosing imported soy depending on the location of the port in France. As they are mainly located in Brittany and on the west coast, depending on the dairy industry, farmers are therefore primarily sourcing soy from the ports of Montoir and Brest (indicated by the black dots on map 5 below).

* Expert consultations
The Carrefour Group is mainly supplied by the Sodiaal Group (Orlait and Candia) and the Lactalis Group (LNUF). Sodiaal’s collection sites are located in 73 French departments. Even the Sodiaal Group’s farmers located in the Lot department, whom Mighty Earth was able to meet, are supplied with Bunge soy meal from Saint-Nazaire. As for Lactalis, based in Brittany, the group’s farmers with no guaranteed origin (organic or non-GMO) are, because of their location and the influence of Bunge, also strongly linked to this major soy importer.

* * Expert consultations
These groups collect dairy products in regions that are very close to the ports of Montoir or Brest, from where dairy farmers buy imported soy. These farmers did not receive any specific requirement from their buyer regarding the soy origin.

Since Bunge is France’s main supplier of soy, and is located in Brest and Montoir, it supplies the farms from which the Carrefour Group sources its conventional dairy products. Carrefour is therefore also strongly linked to the importer Bunge for the dairy products on sale in its stores. However, it is possible to ask for non-GMO soy, or Proterra for example, to guarantee its origin. Proterra ensures that its soy does not originate from deforestation.

The Mighty Earth investigation does not include other animal industries such as the pig industry. However, it is very likely that the conventional farmers supplying the other animal products to the Carrefour Group are also linked to the deforestation for soy of the importer Bunge.
MIGHTY EARTH CALLS ON CARREFOUR TO LIVE UP TO THE MEAT CHALLENGE

The various cases of deforestation connected to the Carrefour Group’s meat supply chain in Brazil and in France suggest that its practices apply to the group’s other stores located in other countries.

The following requests apply to all products containing animal proteins and to the entire Carrefour Group. Particular attention will be paid to Brazil, where Carrefour has become the leading retail chain, but also to Europe, where Carrefour offers dairy and meat products made from soy related to deforestation and the destruction of natural ecosystems.

BEEF

- **Remove suppliers responsible for deforestation**: Immediately remove JBS from the beef supplier list for the entire Carrefour Group, including Brazil.

- **Adopt a robust zero conversion and zero deforestation policy**: Implement an updated beef policy by including all stages of beef production (indirect farms) to ensure a verified zero illegal deforestation beef by the end of 2022 and a zero deforestation and conversion (ZDC) beef by 2025.

- **Transparency**: Immediately disclose on a public platform dedicated to all direct and indirect suppliers, the footprint and origin of the beef products (list of slaughterhouses, direct, and indirect identified farms with the percentage of meat from a ZDC guaranteed supply chain).
SOY

• **Ban those responsible for deforestation**: Immediately end all direct or indirect business relationships with companies that source from soy traders (including Bunge and Cargill) that failed to implement a ban on deforestation and conversion after the January 2020 cut-off date.

• **Adopt a robust zero conversion and deforestation policy**: Immediately release an updated ZDC soy policy. This policy must explicitly include the January 2020 cut-off date with a goal of ZDC soy to be achieved by 2023.

• **Transparency**: Immediately disclose on a dedicated public platform the origin of soy at the Carrefour Group level (including traders, ports, the list of silos and crushers, direct and indirect producers as well as the percentage of soy from a ZDC supply chain).

MEAT, CLIMATE, AND WATER

• **Reduce meat products**: Commit to a 50% drop in animal products sold in Carrefour stores worldwide by 2030 compared with current figures (2022), especially by increasing the sale of alternative proteins such as plant-based products to reach 15%.

• **Methane**: Reduce methane emissions by 45% (in absolute terms), both group-wide and from suppliers who must be helped to adopt better practices on the ground, by 2030.

• **Scope 3 emissions**: Conduct a full external audit of Carrefour’s global footprint for methane and other scope 3 emissions and add a 50% reduction target for scope 3 GHG emissions by 2030.

Such a policy will involve:

• Additional dedicated staff for beef and soy supply chains.

• A substantial increase in Carrefour’s support for independent monitoring projects on beef and soy supply chains.
CARREFOUR CAN AND MUST BECOME THE LEADER IN FOOD TRANSITION THAT IT CLAIMS TO BE

Judging from experience, actions such as those described above can help engage the most reluctant big companies to change their own business practices and will encourage them to work together to develop industry-wide solutions.

We know that these approaches can succeed, as it happened with palm oil deforestation in Southeast Asia. Mighty Earth and other NGOs have campaigned to condemn the ravages of palm oil plantations in the region’s forests. The pressure exerted has led the major manufacturers concerned to ask the farmers to change their production methods. Palm oil deforestation in Indonesia dropped sharply by 95% in 5 years.62

The zero deforestation commitments made by most of the intermediary players have been crucial in achieving this.63 But in order to get started, someone had to make the first move. Carrefour must be this leader for the meat industry.

Similar progress has been achieved in the paper industry, after Sinar Mas, the leading company in the industry, has seen many of its contracts broken as a result of pressure from NGO campaigns such as Greenpeace and WWF.64

Now is the time for similar success in the meat industry, the largest agricultural driver of deforestation and climate pollution.

Mighty Earth’s mission is to deliver results on the ground, and Carrefour has the opportunity to make ambitious commitments. By implementing the necessary actions that have long been requested by associations and Indigenous representatives to meet the challenges we face, Carrefour will position itself as the long-awaited leader on these food transition issues.
JBS, “THE MONSANTO OF DEFORESTATION”

VISUAL DISPLAY OF A SAMPLE OF ARTICLES TARGETING THE JBS GROUP.

Multiple sources identified by Mighty Earth
**Exclusive: UK supermarkets ‘funding destruction of the natural world’**

A Greenpeace investigation found they are trading with a company that buys from unethical Brazilian ranches.

**CLIMATEWIRE**

Emissions of meat giant JBS rival rich countries, data shows

Environmental groups released the data ahead of tomorrow’s shareholder meeting. They are calling for a divestment of JBS, which supplies meat to Walmart and Burger King.

**Politicopro**

Groups Urge Investors, Grocers to Drop Brazil’s JBS on Rising Emissions

- Meatpacker’s emissions rose 51% in the past 5 years: report
- JBS says report uses flawed methodology to calculate emissions

**Just Food**

Meat giant JBS criticised over net-zero efforts

The world’s largest beef packer has hit back at what the Brazil-based group claimed was a “faked” study.
BIBLIOGRAPHY


12. IPAM. Amazonia em Chamas. Published online October 2021. https://ipam.org.br/wp-content/uploads/2022/05/Amaz%C3%B4nia-em-Chamas-8-英格%C3%AA.pdf


22. Ignacio Amigo. When will the Amazon hit a tipping point? Nature. Published online February 25, 2020. https://www.nature.com/articles/d41586-020-00508-4


47. CGFTheForum. CGF Forest Positive Coalition of Action: CEO Introduction. https://www.youtube.com/watch?v=JoQuVjBLMc


49. Don’t be fooled by the cover: Deforestation is in JBS’s DNA. Drop JBS. https://dropjbs.org/


52. Ministère de la transitio écologique. Tableau de bord d’évaluation des risques de déforestation liés aux importations françaises de soja. https://www.deforestationimportee.fr/fr/tableau-de-bord-devaluation-des-risques-de-deforestation-lies-aux-importations-francaises-de-soja

53. Supply Chains. Brazil, Soy. https://supplychains.trase.earth/flows?toolLayout=1&countries=27&commodities=1&selectedColumnsIds=0_16-1_1-2_11-3_10&selectedNodesIds%5B%5D=5035&selectedNodesIds%5B%5D=37421&sources=5035&exporters=37421


57. The Guardian. Leading grain traders ‘sourcing soy beans from Brazilian farm linked to abuse.’ August 2022.


ACKNOWLEDGEMENT

Lead author: Boris Patentreger
Contribution and review: Laura Alarcon, Mariana Bombo Perozzi Gameiro, Glenn Hurowitz, Marion Touboul, & Alex Wijeratna
Design: Boris Chauvet
Copyediting: Julie Higonnet
September 2022
Cover: Mighty Earth creation