RESULT OF THE STUDY OF MAPPING AND ANALYSIS OF CLIMATE-RELATED RISKS AND OPPORTUNITIES

ACCORDING TO THE GUIDELINES OF THE TASK FORCE ON CLIMATE-RELATED FINANCIAL DISCLOSURES

(TCFD)

Between 2022 and 2023, Minerva Foods, with the support of a specialized consultancy, developed the project to map and analyze climate-related risks and opportunities. The scope of operations considered in the project included 27 assets in the six countries where the Company concentrates its production (Argentina, Australia, Brazil, Colombia, Paraguay, and Uruguay). The project also included an analysis of the physical risks in municipalities within a 300 km radius of each of these assets to assess the potential impacts on the cattle supply chain. The areas of Sustainability, Audit, Risks and Compliance, Animal Welfare, Business Intelligence, Cattle Purchasing, Engineering, Finance, Innovation, Legal, Logistics, Environment, Investor Relations, SESMT and representatives of the Minerva Energia and Minerva Biodiesel divisions and the subsidiary MyCarbon participated in the process of mapping and analyzing climate-related risks and opportunities.

In the process of mapping climate-related physical risks, the history of occurrence of extreme weather events that impacted the assets considered in the scope of the project in the last ten years, sector analysis, bibliographic research, and Company documents, such as reports, booklets and reference form, were surveyed. To analyze the physical risks, the scenarios 'SSP1-2.6', 'SSP2-4.5' and 'SSP3-7.0' of the *Intergovernmental Panel on Climate Change* (IPCC) were used. The scenarios were chosen considering three perspectives of the evolution of the increase in the global average temperature and its potential effects on climate change (optimistic, intermediate, and pessimistic). The 'SSP1-2.6' scenario considers the achievement of the goal of limiting the temperature increase to below 2°C during the 21st century, projecting the efforts that would be required for the transition to a low-carbon economy. The maximum warming would be 1.7°C by 2060. The 'SSP2-4.5' scenario considers that human and technological development is not very different from current trends, whose challenges for mitigation and adaptation are considered moderate. The goal of keeping global warming to 2°C would not be met, the rate of increase could reach 2.5° by 2100. Finally, the 'SSP3-7.0' scenario considers that GHG emissions will rise steadily over the course of the 21st century, presenting greater challenges for both mitigation and adaptation. The rate of global warming could reach almost 4°C by 2100.

In the process of mapping and analyzing transition risks and opportunities, the '*Net Zero 2050*', '*Divergent Net Zero*' and *'NDC 2020' scenarios* of the *Network of Central Banks and Supervisors for Greening the Financial Systems (NGFS)* were used. The three scenarios were also chosen considering an optimistic, intermediate, and pessimistic perspective on the evolution of the fight against climate change. The 'Net Zero 2050' scenario considers the effective application of public policies to achieve climate goals, evenly distributed among different sectors of the economy. The '*Divergent Net Zero'* scenario also considers the effective application of public policies to achieve climate goals, but distributed with different intensities among the sectors of the economy whose challenges for mitigation and adaptation are considered moderate. The goal of limiting warming to 2°C would be met. Finally, the 'NDC 2020' scenario considers the application of public policies that are ineffective in achieving climate goals.

All scenarios were assessed in the 2030 (medium-term) and 2050 (long-term) horizons. For comparison, the period from 1995 to 2014 was also considered as a baseline. At the end of the process, risks and opportunities were prioritized based on the Company's probability and impact rules.

The result of the project has been classified by type of risk and opportunity.

More information on the project, decarbonization projects and progress on the goals of the Commitment to Sustainability is available in the 2023 Sustainability Report.

Opportunity 1: Trading Decarbonization Credits (CBios)	
Description	Brazil aims to increase the share of bioenergy in the national energy matrix to around 18% by 2030, with annual decarbonization targets for the fuel sector. The average price of a unit of CBio increased from R$43.00 in June 2020 to R$144.24 in July 2023, a variation of 235%. The Minerva Biodiesel division, which produces biodiesel from vegetable and animal fats, was certified to participate in the RenovaBio program. This program is part of the National Decarbonization Policy. As a result, the division began generating Decarbonization Credits (CBios), which are then sold to fuel distributors.
Classification	Opportunity.
Impact	**Medium-term (2030) and long-term (2050):** Brazil's bioenergy target will create greater demand for CBios from fuel distributors, which could mean increased sales for Minerva's biodiesel division. The financial impact of this opportunity has as of yet not been calculated at this stage of the mapping process, in which climate risk assessment has been prioritized. It may be calculated in the next study update cycle.
Susceptibility	**Company-owned operations:** Biodiesel production plant in Brazil (Palmeiras de Goiás). **Value chain:** not assessed.
Relevant target(s)	-
Direct mitigation/adaptation efforts	**Implemented:** Currently, Minerva Biodiesel has a production capacity of 200m³/day. In 2023, the business unit received the International Sustainability and Carbon Certification (ISCC). This certification allows the biodiesel produced by the Company to access the international market, contributing to the decarbonization of the world's energy matrix. **Scheduled:** There are no scheduled efforts during the reporting period.
Indirect mitigation/adaptation efforts	**Implemented:** As of the reporting period, no initiatives have been implemented. **Scheduled:** There are no scheduled efforts during the reporting period.

Opportunity 2: Trading carbon credits	
Description	The carbon credit market is poised for growth as a result of heightened global awareness of climate change and the pressing need to reduce carbon emissions. Companies and nations are recognizing the economic and environmental benefits of participating in this market.
Classification	Opportunity.
Impact	**Medium-term (2030):** A consolidation of carbon market players and an increase in the number of organizations engaged in the climate agenda with GHG mitigation and offsetting goals. **Long-term (2050):** Increased demand for carbon credits. The financial impact of this opportunity has as of yet not been calculated at this stage of the mapping process, in which climate risk assessment has been prioritized. It may be calculated in the next study update cycle.
Susceptibility	**Company-owned operations:** The Company as a whole. **Value chain:** Ranches that supply livestock.
Relevant target(s)	i. Purchase at least 50% of animals from ranchers participating in the Renove program.
Direct mitigation/adaptation efforts	**Implemented:** In 2021, Minerva Foods launched MyCarbon, a subsidiary specializing in the origination and trading of carbon credits, with the goal of connecting rural producers with this emerging market. Since its inception, MyCarbon has traded more than 1.2 million carbon credits. It was the only Brazilian company approved in the pilot project to trade these certificates on DFM/Nasdaq, a remarkable achievement presented at COP28 in Dubai, United Arab Emirates. **Scheduled:** Technical and economic feasibility studies are underway for projects to improve wastewater treatment plants and to replace fossil fuels in boilers at industrial units in Argentina and Colombia. Economic feasibility studies are also underway for other clean power generation projects in the Company's operations. Projects with carbon credit generation potential.
Indirect mitigation/adaptation efforts	**Implemented:** Minerva Foods believes that market incentives, such as carbon credits, can encourage the development of integrated agriculture that optimizes the use of natural resources, incorporates regenerative practices, and achieves profitability. This approach enables rural producers to contribute to climate change solutions. Connecting the carbon credit market with this public can accelerate the adoption of practices that reduce the carbon footprint of the Company's value chain. With these objectives in mind, Minerva Foods launched the Renove Program in 2021 to assist cattle ranchers in implementing production intensification practices in conjunction with low-carbon emissions and sequestration on their properties. **Scheduled:** There are no scheduled efforts during the reporting period.

Opportunity 3: Issuance of green bonds linked to sustainability goals and/or financing climate mitigation and adaptation initiatives.	
Description	Green bonds are a type of financial instrument designed to raise funds for projects with environmental benefits. These bonds are specifically designed to finance projects that contribute to climate change mitigation, adaptation, or other ecologically sustainable initiatives.
Classification	Opportunity.
Impact	**Medium-term (2030) and long-term (2050):** In order to align investments with environmental goals or comply with emerging regulations, there may be an increase in demand for this type of instrument from investors, which would consequently reduce the cost of capital for issuing companies. The financial impact of this opportunity has as of yet not been calculated at this stage of the mapping process, in which climate risk assessment has been prioritized. It may be calculated in the next study update cycle.
Susceptibility	**Company-owned operations:** The Company as a whole. **Value chain:** not assessed.
Relevant target(s)	i. Reduce greenhouse gas emissions intensity by 30% by 2030 (Scopes 1 and 2); and ii. Zero the Company's net emissions by 2035 (Scopes 1, 2, and 3).
Direct mitigation/adaptation efforts	**Implemented:** The Company has implemented energy efficiency projects in its industrial units (e.g. regular maintenance of cold room seals; installation of frequency converters to modulate compressors in machine rooms; shutting down equipment when it is not in use or when the room temperature has reached the required level), with performance indicators monitored weekly in a meeting with representatives from Engineering, Environmental and Sustainability. In addition, there are initiatives aimed at generating our own clean electricity, such as those implemented at the industrial units in Bucaramanga, Colombia, and Colac and Sunshine, Australia, producing 474,172 kWh, 1,245,676 kWh and 227,283 kWh respectively in 2023. Since 2020, all of Minerva Foods' operations have been powered by renewable sources of electricity, which are traceable through Renewable Energy Certificates (I-REC). Additionally, hydroelectric energy certificates were acquired in 2023. It is worth noting that in Paraguay, all of the energy consumed is already from renewable sources, so there is no need to acquire certificates. Through this initiative, carried out in partnership with the Minerva *Energia* business division, the Company aims to promote the production of energy generated from renewable sources with high performance while also achieving zero scope 2 emissions from the purchase of electricity using the market approach. Minerva Foods was the first company in Brazil to obtain the Renewable Energy Seal, issued by the Totum Institute in partnership with the Brazilian Wind Energy Association (ABEEólica) and the Brazilian Clean Energy Association (Abragel). This seal ensures the renewable origin of the energy and the adoption of differentiated practices in the social and community relations aspects by the electric power generation plants.

	Scheduled: Technical and economic feasibility studies are underway for projects to improve wastewater treatment plants and to replace fossil fuels in boilers at industrial units in Argentina and Colombia. Economic feasibility studies are also underway for other clean power generation projects in the Company's operations.
Indirect mitigation/adaptation efforts	**Implemented:** The majority of Scope 3 emissions are related to animals sourced (methane emissions from cattle enteric fermentation and waste management at supplier operations). In 2021, Minerva Foods initiated the Renove Program with the objective of enhancing engagement with rural producers in the implementation of regenerative agricultural practices that enhance productivity and income. Additionally, the program aims to contribute to environmental benefits through the reduction of carbon emissions and the sequestration of carbon, as well as the sustainable intensification of ranching activities. The Renove Program is structured around three fundamental components: training, green finance, and technical and institutional partnerships. Training and technical assistance are essential for ensuring the long-term implementation and maintenance of regenerative practices on ranches. The Program cultivates partnerships and rural extension activities, technology transfer, and training to provide rural technicians and livestock ranchers with the necessary tools and knowledge. In the area of Green Finance, the Renove Program works with financial institutions to enable credit lines and funds that recognize the performance of partner cattle ranchers. Access to differentiated rural credit for cattle ranchers engaged in sustainable cattle ranching is a crucial factor in enabling the widespread implementation of good practices. Finally, the Renove Program collaborates with renowned institutions in South America, including Embrapa (the Brazilian Agricultural Research Corporation) and Imaflora (the Institute for Forest and Agricultural Management and Certification), to guarantee the use of well-known methodologies with international credibility, scientific backing, and innovation. In 2023, the program expanded to include two main projects: (1) certification of carbon-neutral products (Zero Carbon Impact), which began with the process of expanding certification in Brazil. In 2023, more ranches were certified in Brazil, in addition to the five ranches that were certified in 2022. Additionally, new industrial units were added to the program, including the Araguaína (TO) unit, which was certified in 2022. In Uruguay, a total of 108 ranches have been certified, and the Canelones, Carrasco, and Melo (PUL) industrial units have renewed their certification. The new BPU Meat industrial unit in Durazno is currently undergoing certification for 2024. The second project (2), is the origination of carbon credits. This project aims to generate carbon credits from agricultural activities in partnership with the subsidiary MyCarbon. **Scheduled:** There are no scheduled efforts during the reporting period.

Opportunity 4: Adopt public policies related to the climate agenda ("ABC+" plan)	
Description	The adoption of strategies aligned with the ABC+ Plan and the consolidation of public-private partnerships represents an opportunity for Minerva Foods to enhance its resilience in the face of climate change. The implementation of sustainable practices aimed at reducing GHG emissions in agriculture can mitigate the potential negative consequences of climate change.
Classification	Opportunity.
Impact	**Medium-term (2030) and long-term (2050):** With a commitment to achieve net zero emissions by 2035, implementing sustainable practices in the value chain will support the reduction of Scope 3 emissions and reduce Minerva Foods' reliance on carbon credits. The financial impact of this opportunity has as of yet not been calculated at this stage of the mapping process, in which climate risk assessment has been prioritized. It may be calculated in the next study update cycle.
Susceptibility	**Company-owned operations:** Slaughtering, deboning and processing units in Brazil. **Value chain:** Ranches supplying livestock located in Brazil.
Relevant target(s)	i. Zero Company net emissions by 2035 (scopes 1, 2 and 3).
Direct mitigation/adaptation efforts	**Implemented:** Annual monitoring of emission sources in corporate greenhouse gas inventories. **Scheduled:** There are no scheduled efforts during the reporting period.
Indirect mitigation/adaptation efforts	**Implemented:** The majority of Scope 3 emissions are related to animals sourced (methane emissions from cattle enteric fermentation and waste management at supplier operations). In 2021, Minerva Foods initiated the Renove Program with the objective of enhancing engagement with rural producers in the implementation of regenerative agricultural practices that enhance productivity and income. Additionally, the program aims to contribute to environmental benefits through the reduction of carbon emissions and the sequestration of carbon, as well as the sustainable intensification of ranching activities. The Renove Program is structured around three fundamental components: training, green finance, and technical and institutional partnerships. Training and technical assistance are essential for ensuring the long-term implementation and maintenance of regenerative practices on ranches. The Program cultivates partnerships and rural extension activities, technology transfer, and training to provide rural technicians and livestock ranchers with the necessary tools and knowledge. In the area of Green Finance, the Renove Program works with financial institutions to enable credit lines and funds that recognize the performance of partner cattle ranchers. Access to differentiated rural credit for cattle ranchers engaged in sustainable cattle ranching is a crucial factor in enabling the widespread implementation of good practices. Finally, the Renove Program collaborates with renowned institutions in South America, including Embrapa (the Brazilian Agricultural Research Corporation) and Imaflora (the Institute for Forest and Agricultural Management and Certification), to guarantee the use of well-known

	methodologies with international credibility, scientific backing, and innovation. In 2023, the program expanded to include two main projects: (1) certification of carbon-neutral products (Zero Carbon Impact), which began with the process of expanding certification in Brazil. In 2023, more ranches were certified in Brazil, in addition to the five ranches that were certified in 2022. Additionally, new industrial units were added to the program, including the Araguaína (TO) unit, which was certified in 2022. In Uruguay, a total of 108 ranches have been certified, and the Canelones, Carrasco, and Melo (PUL) industrial units have renewed their certification. The new BPU Meat industrial unit in Durazno is currently undergoing certification for 2024. The second project (2), is the origination of carbon credits. This project aims to generate carbon credits from agricultural activities in partnership with the subsidiary MyCarbon. **Scheduled:** There are no scheduled efforts during the reporting period.

Opportunity 5: Develop solutions for climate mitigation or adaptation through R&D and innovation	
Description	Establish partnerships, initiatives and projects aimed at developing technologies to mitigate GHG emissions or adapt to the effects of climate change. Examples of innovative initiatives include: i. food compounds that reduce methane formation in the stomach of animals without health or environmental side effects; ii. compounds that prevent the formation of nitrous oxide, resulting in lower GHG emissions and reduced water pollution from fertilizer runoff; and iii. crop varieties that absorb more nitrogen and/or inhibit nitrification.
Classification	Opportunity.
Impact	**Medium-term (2030) and long-term (2050):** The Company could help increase productivity on supplier operations through regenerative agricultural practices; and achieve greater production efficiency, reduce costs and expenses, enhance competitiveness, guarantee access to more demanding markets, develop new products and services, engage more effectively with stakeholders, and create long-term value for investors. The financial impact of this opportunity has as of yet not been calculated at this stage of the mapping process, in which climate risk assessment has been prioritized. It may be calculated in the next study update cycle.
Susceptibility	**Company-owned operations:** Slaughtering, deboning and processing units in Argentina, Australia, Brazil, Colombia, Paraguay and Uruguay. **Value chain:** Ranches that supply livestock.
Relevant target(s)	i. Reduce greenhouse gas emissions intensity by 30% by 2030 (Scopes 1 and 2); ii. Achieve net zero emissions, taking into account the market approach for Scope 2; iii. Zero the Company's net emissions by 2035 (Scopes 1, 2, and 3); iv. Purchase at least 50% of animals from ranchers participating in the Renove program; v. 100% of direct suppliers monitored against socio-environmental criteria by 2030; and vi. Develop and implement a socio-environmental monitoring program for indirect suppliers in South America by 2030.
Direct mitigation/adaptation efforts	**Implemented:** The Company has implemented energy efficiency projects in its industrial units (e.g. regular maintenance of cold room seals; installation of frequency converters to modulate compressors in machine rooms; shutting down equipment when it is not in use or when the room temperature has reached the required level), with performance indicators monitored weekly in a meeting with representatives from Engineering, Environmental and Sustainability. In addition, there are initiatives aimed at generating our own clean electricity, such as those implemented at the industrial units in Bucaramanga, Colombia, and Colac and Sunshine, Australia, producing 474,172 kWh, 1,245,676 kWh and 227,283 kWh respectively in 2023. Since 2020, all of Minerva Foods' operations have been powered by renewable sources of electricity, which are traceable through Renewable Energy Certificates (I-REC). Additionally, hydroelectric energy certificates were acquired in 2023. It is worth noting that in Paraguay, all of the energy

	consumed is already from renewable sources, so there is no need to acquire certificates. Through this initiative, carried out in partnership with the Minerva *Energia* business division, the Company aims to promote the production of energy generated from renewable sources with high performance while also achieving zero scope 2 emissions from the purchase of electricity using the market approach. Minerva Foods was the first company in Brazil to obtain the Renewable Energy Seal, issued by the Totum Institute in partnership with the Brazilian Wind Energy Association (ABEEólica) and the Brazilian Clean Energy Association (Abragel). This seal ensures the renewable origin of the energy and the adoption of differentiated practices in the social and community relations aspects by the electric power generation plants. **Scheduled:** Technical and economic feasibility studies are underway for projects to improve wastewater treatment plants and to replace fossil fuels in boilers at industrial units in Argentina and Colombia. Economic feasibility studies are also underway for other clean power generation projects in the Company's operations.
Indirect mitigation/adaptation efforts	**Implemented:** The majority of Scope 3 emissions are related to animals sourced (methane emissions from cattle enteric fermentation and waste management at supplier operations). In 2021, Minerva Foods initiated the Renove Program with the objective of enhancing engagement with rural producers in the implementation of regenerative agricultural practices that enhance productivity and income. Additionally, the program aims to contribute to environmental benefits through the reduction of carbon emissions and the sequestration of carbon, as well as the sustainable intensification of ranching activities. The Renove Program is structured around three fundamental components: training, green finance, and technical and institutional partnerships. Training and technical assistance are essential for ensuring the long-term implementation and maintenance of regenerative practices on ranches. The Program cultivates partnerships and rural extension activities, technology transfer, and training to provide rural technicians and livestock ranchers with the necessary tools and knowledge. In the area of Green Finance, the Renove Program works with financial institutions to enable credit lines and funds that recognize the performance of partner cattle ranchers. Access to differentiated rural credit for cattle ranchers engaged in sustainable cattle ranching is a crucial factor in enabling the widespread implementation of good practices. Finally, the Renove Program collaborates with renowned institutions in South America, including *Embrapa* (the Brazilian Agricultural Research Corporation) and *Imaflora* (the Institute for Forest and Agricultural Management and Certification), to guarantee the use of well-known methodologies with international credibility, scientific backing, and innovation. In 2023, the program expanded to include two main projects: (1) certification of carbon-neutral products (Zero Carbon Impact), which began with the process of expanding certification in Brazil. In 2023, more ranches were certified in Brazil, in addition to the five ranches that were certified in 2022. Additionally, new industrial units were added to the program, including the Araguaína (TO) unit, which was certified in 2022. In Uruguay, a total of 108

	ranches have been certified, and the Canelones, Carrasco, and Melo (PUL) industrial units have renewed their certification. The new BPU Meat industrial unit in Durazno is currently undergoing certification for 2024. The second project (2), is the origination of carbon credits. This project aims to generate carbon credits from agricultural activities in partnership with the subsidiary MyCarbon. Minerva Foods' pioneering efforts to combat illegal deforestation in the value chain have led to the monitoring of 100% of direct suppliers using socio-environmental criteria in Brazil since 2020 and in Paraguay since 2021. The Company achieved its goal of monitoring the same percentage of direct suppliers in Colombia by December 2023, six months ahead of schedule. In 2023, approximately 90% of direct suppliers in Argentina were monitored, and over 60% in Uruguay. In 2021, Minerva Foods took steps to improve traceability in the value chain by engaging partner ranchers through the transfer of its geomonitoring technology. The SMGeo Prospec® application, developed in partnership with Niceplanet Geotecnologia, enables rural producers to verify the socio-environmental compliance of their suppliers, similar to the industry's practices. This ensures that monitoring practices extend to indirect suppliers. In 2023, Minerva Foods distributed over 3,000 vouchers free of charge to around 1,000 partner ranchers to use the tool. This group supplied over 40% of the animals purchased in Brazil. **Scheduled:** Feasibility study to assess the economic viability of logistics services using renewable fuels. In addition, a monitoring program for indirect suppliers in South America based on socio-environmental criteria is being developed to be implemented by 2030.

Opportunity 6: Leading role in the climate agenda	
Description	Minerva Foods' leadership in the climate agenda, developed through its efforts to mitigate GHG emissions and adapt to the effects of climate change, is reflected in its good positioning in various sustainability ratings (Carbon Disclosure Project, Coller FAIRR Protein Producer Index, Forest 500, among others).
Classification	Opportunity.
Impact	**Medium-term (2030) and long-term (2050):** By implementing measures to mitigate GHG emissions and adapt to the effects of climate change, the Company can achieve greater production efficiency, reduce costs and expenses, enhance competitiveness, guarantee access to more demanding markets, develop new products and services, engage more effectively with stakeholders, and create long-term value for investors. The financial impact of this opportunity has as of yet not been calculated at this stage of the mapping process, in which climate risk assessment has been prioritized. It may be calculated in the next study update cycle.
Susceptibility	**Company-owned operations:** The Company as a whole. **Value chain:** The entire value chain.
Relevant target(s)	i. Reduce greenhouse gas emissions intensity by 30% by 2030 (Scopes 1 and 2); ii. Achieve net zero emissions, taking into account the market approach for Scope 2; iii. Zero the Company's net emissions by 2035 (Scopes 1, 2, and 3); iv. Purchase at least 50% of animals from ranchers participating in the Renove program; v. 100% of direct suppliers monitored against socio-environmental criteria by 2030; and vi. Develop and implement a socio-environmental monitoring program for indirect suppliers in South America by 2030.
Direct mitigation/adaptation efforts	**Implemented:** The Company has implemented energy efficiency projects in its industrial units (e.g. regular maintenance of cold room seals; installation of frequency converters to modulate compressors in machine rooms; shutting down equipment when it is not in use or when the room temperature has reached the required level), with performance indicators monitored weekly in a meeting with representatives from Engineering, Environmental and Sustainability. In addition, there are initiatives aimed at generating our own clean electricity, such as those implemented at the industrial units in Bucaramanga, Colombia, and Colac and Sunshine, Australia, producing 474,172 kWh, 1,245,676 kWh and 227,283 kWh respectively in 2023. Since 2020, all of Minerva Foods' operations have been powered by renewable sources of electricity, which are traceable through Renewable Energy Certificates (I-REC). Additionally, hydroelectric energy certificates were acquired in 2023. It is worth noting that in Paraguay, all of the energy consumed is already from renewable sources, so there is no need to acquire certificates. Through this initiative, carried out in partnership with the Minerva *Energia* business division, the Company aims to promote the production of energy generated from renewable sources with high

	performance while also achieving zero scope 2 emissions from the purchase of electricity using the market approach. Minerva Foods was the first company in Brazil to obtain the Renewable Energy Seal, issued by the Totum Institute in partnership with the Brazilian Wind Energy Association (ABEEólica) and the Brazilian Clean Energy Association (Abragel). This seal ensures the renewable origin of the energy and the adoption of differentiated practices in the social and community relations aspects by the electric power generation plants. **Scheduled:** Technical and economic feasibility studies are underway for projects to improve wastewater treatment plants and to replace fossil fuels in boilers at industrial units in Argentina and Colombia. Economic feasibility studies are also underway for other clean power generation projects in the Company's operations.
Indirect mitigation/adaptation efforts	**Implemented:** The majority of Scope 3 emissions are related to animals sourced (methane emissions from cattle enteric fermentation and waste management at supplier operations). In 2021, Minerva Foods initiated the Renove Program with the objective of enhancing engagement with rural producers in the implementation of regenerative agricultural practices that enhance productivity and income. Additionally, the program aims to contribute to environmental benefits through the reduction of carbon emissions and the sequestration of carbon, as well as the sustainable intensification of ranching activities. The Renove Program is structured around three fundamental components: training, green finance, and technical and institutional partnerships. Training and technical assistance are essential for ensuring the long-term implementation and maintenance of regenerative practices on ranches. The Program cultivates partnerships and rural extension activities, technology transfer, and training to provide rural technicians and livestock ranchers with the necessary tools and knowledge. In the area of Green Finance, the Renove Program works with financial institutions to enable credit lines and funds that recognize the performance of partner cattle ranchers. Access to differentiated rural credit for cattle ranchers engaged in sustainable cattle ranching is a crucial factor in enabling the widespread implementation of good practices. Finally, the Renove Program collaborates with renowned institutions in South America, including *Embrapa* (the Brazilian Agricultural Research Corporation) and *Imaflora* (the Institute for Forest and Agricultural Management and Certification), to guarantee the use of well-known methodologies with international credibility, scientific backing, and innovation. In 2023, the program expanded to include two main projects: (1) certification of carbon-neutral products (Zero Carbon Impact), which began with the process of expanding certification in Brazil. In 2023, more ranches were certified in Brazil, in addition to the five ranches that were certified in 2022. Additionally, new industrial units were added to the program, including the Araguaína (TO) unit, which was certified in 2022. In Uruguay, a total of 108 ranches have been certified, and the Canelones, Carrasco, and Melo (PUL) industrial units have renewed their certification. The new BPU Meat industrial unit in Durazno is currently undergoing certification for 2024. The second project (2), is the origination of carbon credits. This project aims to

	generate carbon credits from agricultural activities in partnership with the subsidiary MyCarbon. Minerva Foods' pioneering efforts to combat illegal deforestation in the value chain have led to the monitoring of 100% of direct suppliers using socio-environmental criteria in Brazil since 2020 and in Paraguay since 2021. The Company achieved its goal of monitoring the same percentage of direct suppliers in Colombia by December 2023, six months ahead of schedule. In 2023, approximately 90% of direct suppliers in Argentina were monitored, and over 60% in Uruguay. In 2021, Minerva Foods took steps to improve traceability in the value chain by engaging partner ranchers through the transfer of its geomonitoring technology. The SMGeo Prospec® application, developed in partnership with Niceplanet Geotecnologia, enables rural producers to verify the socio-environmental compliance of their suppliers, similar to the industry's practices. This ensures that monitoring practices extend to indirect suppliers. In 2023, Minerva Foods distributed over 3,000 vouchers free of charge to around 1,000 partner ranchers to use the tool. This group supplied over 40% of the animals purchased in Brazil. **Scheduled:** Feasibility study to assess the economic viability of logistics services using renewable fuels. In addition, a monitoring program for indirect suppliers in South America based on socio-environmental criteria is being developed to be implemented by 2030.

Opportunity 7: Taking a leading role in protecting biodiversity	
Description	Minerva Foods' leading role in the protection of biodiversity, developed through efforts to advance the management of quantitative data related to the significant direct and indirect impacts of its activities on biodiversity and the adoption of strategies to restore ecosystems affected by agribusiness, can be seen in the company's good positioning in various sustainability assessments (Carbon Disclosure Project, Coller FAIRR Protein Producer Index, Forest 500, among others).
Classification	Opportunity.
Impact	**Medium-term (2030) and long-term (2050):** By implementing measures to quantify the direct and indirect impacts of Minerva Foods' activities on biodiversity and adopting strategies to restore ecosystems impacted by agribusiness, the Company will be able to promote productivity gains on supplier ranches through regenerative agriculture practices; and achieve greater production efficiency, reduce costs and expenses, enhance competitiveness, guarantee access to more demanding markets, develop new products and services, engage more effectively with stakeholders, and create long-term value for investors. The financial impact of this opportunity has as of yet not been calculated at this stage of the mapping process, in which climate risk assessment has been prioritized. It may be calculated in the next study update cycle.
Susceptibility	**Company-owned operations:** The Company as a whole. **Value chain:** Ranches that supply livestock.
Relevant target(s)	i. Reduce greenhouse gas emissions intensity by 30% by 2030 (Scopes 1 and 2); ii. Achieve net zero emissions, taking into account the market approach for Scope 2; iii. Zero the Company's net emissions by 2035 (Scopes 1, 2, and 3); iv. Purchase at least 50% of animals from ranchers participating in the Renove program; v. 100% of direct suppliers monitored against socio-environmental criteria by 2030; and vi. Develop and implement a socio-environmental monitoring program for indirect suppliers in South America by 2030.
Direct mitigation/adaptation efforts	**Implemented:** The Company has implemented energy efficiency projects in its industrial units (e.g. regular maintenance of cold room seals; installation of frequency converters to modulate compressors in machine rooms; shutting down equipment when it is not in use or when the room temperature has reached the required level), with performance indicators monitored weekly in a meeting with representatives from Engineering, Environmental and Sustainability. In addition, there are initiatives aimed at generating our own clean electricity, such as those implemented at the industrial units in Bucaramanga, Colombia, and Colac and Sunshine, Australia, producing 474,172 kWh, 1,245,676 kWh and 227,283 kWh respectively in 2023. Since 2020, all of Minerva Foods' operations have been powered by renewable sources of electricity, which are traceable through Renewable Energy Certificates (I-REC). Additionally, hydroelectric energy

	certificates were acquired in 2023. It is worth noting that in Paraguay, all of the energy consumed is already from renewable sources, so there is no need to acquire certificates. Through this initiative, carried out in partnership with the Minerva *Energia* business division, the Company aims to promote the production of energy generated from renewable sources with high performance while also achieving zero scope 2 emissions from the purchase of electricity using the market approach. Minerva Foods was the first company in Brazil to obtain the Renewable Energy Seal, issued by the Totum Institute in partnership with the Brazilian Wind Energy Association (ABEEólica) and the Brazilian Clean Energy Association (Abragel). This seal ensures the renewable origin of the energy and the adoption of differentiated practices in the social and community relations aspects by the electric power generation plants. **Scheduled:** Technical and economic feasibility studies are underway for projects to improve wastewater treatment plants and to replace fossil fuels in boilers at industrial units in Argentina and Colombia. Economic feasibility studies are also underway for other clean power generation projects in the Company's operations. The Company also plans to conduct a study to incorporate the Taskforce on Nature-related Financial Disclosures (TNFD) guidelines.
Indirect mitigation/adaptation efforts	**Implemented:** The majority of Scope 3 emissions are related to animals sourced (methane emissions from cattle enteric fermentation and waste management at supplier operations). In 2021, Minerva Foods initiated the Renove Program with the objective of enhancing engagement with rural producers in the implementation of regenerative agricultural practices that enhance productivity and income. Additionally, the program aims to contribute to environmental benefits through the reduction of carbon emissions and the sequestration of carbon, as well as the sustainable intensification of ranching activities. The Renove Program is structured around three fundamental components: training, green finance, and technical and institutional partnerships. Training and technical assistance are essential for ensuring the long-term implementation and maintenance of regenerative practices on ranches. The Program cultivates partnerships and rural extension activities, technology transfer, and training to provide rural technicians and livestock ranchers with the necessary tools and knowledge. In the area of Green Finance, the Renove Program works with financial institutions to enable credit lines and funds that recognize the performance of partner cattle ranchers. Access to differentiated rural credit for cattle ranchers engaged in sustainable cattle ranching is a crucial factor in enabling the widespread implementation of good practices. Finally, the Renove Program collaborates with renowned institutions in South America, including *Embrapa* (the Brazilian Agricultural Research Corporation) and *Imaflora* (the Institute for Forest and Agricultural Management and Certification), to guarantee the use of well-known methodologies with international credibility, scientific backing, and innovation. In 2023, the program expanded to include two main projects: (1) certification of carbon-neutral products (Zero Carbon Impact), which began with the

	process of expanding certification in Brazil. In 2023, more ranches were certified in Brazil, in addition to the five ranches that were certified in 2022. Additionally, new industrial units were added to the program, including the Araguaína (TO) unit, which was certified in 2022. In Uruguay, a total of 108 ranches have been certified, and the Canelones, Carrasco, and Melo (PUL) industrial units have renewed their certification. The new BPU Meat industrial unit in Durazno is currently undergoing certification for 2024. The second project (2), is the origination of carbon credits. This project aims to generate carbon credits from agricultural activities in partnership with the subsidiary MyCarbon. Minerva Foods' pioneering efforts to combat illegal deforestation in the value chain have led to the monitoring of 100% of direct suppliers using socio-environmental criteria in Brazil since 2020 and in Paraguay since 2021. The Company achieved its goal of monitoring the same percentage of direct suppliers in Colombia by December 2023, six months ahead of schedule. In 2023, approximately 90% of direct suppliers in Argentina were monitored, and over 60% in Uruguay. In 2021, Minerva Foods took steps to improve traceability in the value chain by engaging partner ranchers through the transfer of its geomonitoring technology. The SMGeo Prospec® application, developed in partnership with Niceplanet Geotecnologia, enables rural producers to verify the socio-environmental compliance of their suppliers, similar to the industry's practices. This ensures that monitoring practices extend to indirect suppliers. In 2023, Minerva Foods distributed over 3,000 vouchers free of charge to around 1,000 partner ranchers to use the tool. This group supplied over 40% of the animals purchased in Brazil. **Scheduled:** Feasibility study to assess the economic viability of logistics services using renewable fuels. In addition, a monitoring program for indirect suppliers in South America based on socio-environmental criteria is being developed to be implemented by 2030.