



ENVIRONNEMENTAL APPROACH

EVOLUTION OF ENVIRONMENTAL INDICATORS 2021

Presentation of our environmental approach

Our company, Diam Bouchage, develops, produces and markets micro-agglomerated cork closures with high quality requirements that are in keeping with our customers' expectations. We work with a natural material, cork, from an ecosystem whose biodiversity and economic value are of vital importance to the Mediterranean basin. When transforming the cork and manufacturing our Diam, Mytik and Altop closures, we use highly innovative industrial processes such as the supercritical CO2 extraction of 2, 4, 6 TCA to guarantee the excellent quality of our finished products.

Since 2009, we have been implementing an environmental policy that is integrated into the Quality & Food Safety Management system already in place for numerous years at all our manufacturing sites. So going beyond compliance with environmental regulations, we are committed to preventing pollution and continuously improving the performance of our manufacturing sites and our products throughout their life cycle.

As part of this environmental policy, we are committed to implementing human, technical and financial resources in order to:

1

Control our consumption of energy, materials and, therefore, our carbon footprint

2

Control the industrial risks of our technical facilities

3

Engage in a circular economy approach by recycling our cork by-products and waste

4

Develop more environmentally-friendly products with eco-design as an essential factor in their lifecycle

The purpose of this document is to report on our environmental performance indicators and the steps we are taking to achieve our objectives. The indicators have been updated with the 2020 data.

ENVIRONMENTALLY-FRIENDLY PRODUCTS

Cork, a renewable resource that contributes to CO2 sequestration

Cork is stripped off the cork oak trees every 9 to 10 years. The cork oak forests are woodland ecosystems with trees that live for over 200 years and support a rich biodiversity.

What is more, like all forests, cork oak forests sequester carbon, year in year out: carbon dioxide is captured by photosynthesis and transformed into biomass that accumulates from one year to the other in the cork oak forests. Forest studies carried out in Spain and Portugal (countries where the majority of cork oak forests stand and which supply most of the cork used in the closure business) show that carbon captured by cork oak forests during a time-frame of over 100 years sequester in the order of 1.5 to 2.5 tonnes of CO2 per hectare every year, depending on their growth pattern and forestry management. The use of cork by the closure manufacturing industry, for which the maintenance and renewal of the cork oak forests is economically viable, therefore contributes to this carbon sequestration, capturing about 10 to 15 tonnes of CO2 per tonne of cork harvested from the tree¹.

By using this renewable resource, Diam Bouchage contributes to the sequestration of over 300,000 tonnes of CO2 every year.

Diam Bouchage is investing in the re-exploitation of French cork oak forests

Promoting French cork has been the subject of a stimulus policy after a long period of non-exploitation of cork oak forest resources. Diam Bouchage is participating in revitalizing this forest industry by setting up purchase contracts with groups of forest owners over several years: since 2011, for cork from the Pyrénées-Orientales, 2012 for the Maures Massif (Var), and 2016 in Corsica.

About 200 tonnes of cork are harvested every year in France for use by winegrowers in regions producing cork.

Diam Bouchage is FSC certified

All Diam Bouchage sites are FSC certified: closures made from FSC-certified cork also have FSC accreditation. This certificate enables us to respond to the growing demand from our customers and sales of FSC closures increased by 40% between 2018 and 2020.

Origine by Diam, an OK Biobased® certified closure

Since 2017, Diam Bouchage has been marketing the Origine by Diam closure, combining our cork flour with bio-sourced materials (castor oil and beeswax) used instead of petroleum-sourced products. This closure has 4-star OK Biobased® certification, a label from TÜV Austria that, based on analyses, guarantees the organic origin of the carbon content in products. Origine by Diam has 4-star accreditation, being the highest level for this certification, meaning that over 80% of the carbon contained in the closure is of organic origin (fixed through photosynthesis).

The Origine by Diam closure therefore meets our customers' expectations and sales have more than tripled in two years. **The R&D teams at Diam Bouchage continue their research and development in order to identify new biosourced formulas and extend their application to the whole range of closures.**

¹Based on average production, generally accepted by the profession, of 150 kg of cork per hectare/per annum

CONTROLLING OUR ENERGY CONSUMPTION AND GREENHOUSE GAS EMISSIONS

Evolution of Diam Bouchage’s carbon footprint

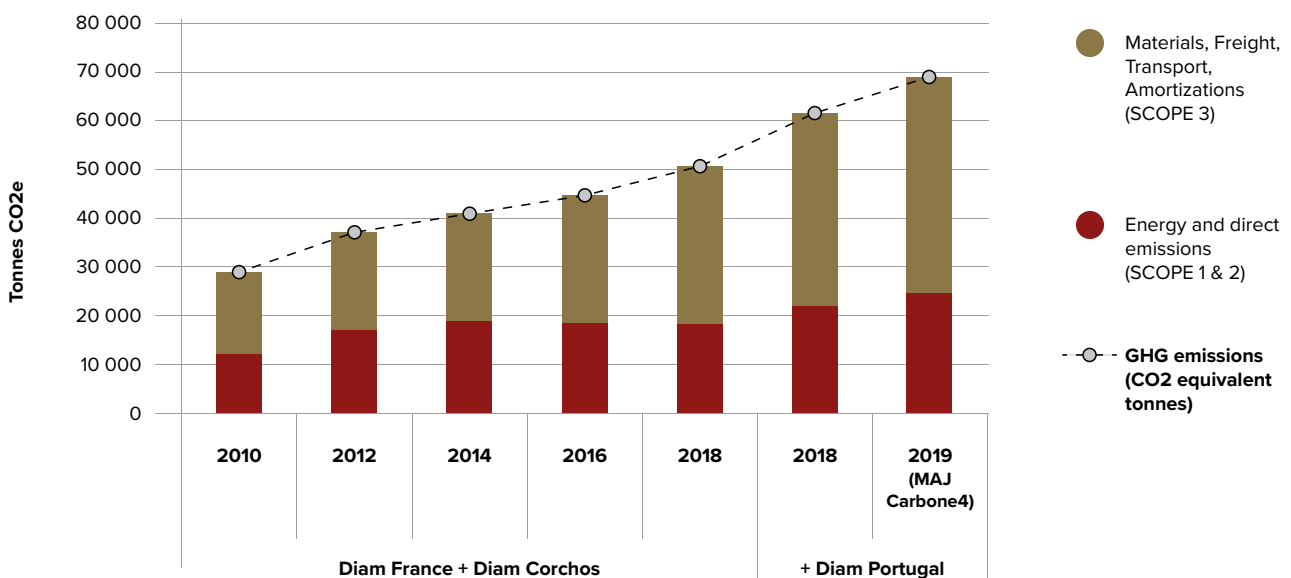
Calculation method:

Until 2018, the carbon footprint was calculated using Bilan Carbone® v8. It was applied to the extended scope of our activities (direct and indirect emissions), from the supply of raw materials to delivery of the finished product to our customers, via our production stages.

In 2019, the carbon footprint was measured as part of a global process carried out by our OENEO Group. The specialized consultancy firm Carbone4 carried out an analysis of the same scope of activities as the previous carbon footprint assessments and according to the frame of reference for the standard ISO14096. Greenhouse gas emissions for the electricity mix have been updated based on the latest values published by ADEME for France and IEA for Spain and Portugal. The Amortization item has been exhaustively updated.

Diam Bouchage’s carbon footprint stood at 69,250 tonnes of CO2 equivalent in 2019. The rise of 12% over 2018 corresponds to increased production. Although improvements were made in terms of energy efficiency and material yield at certain manufacturing stages, the 2019 result was impacted by the upward adjustment of factors relating to greenhouse gas emissions used for electricity in Spain and Portugal (more comprehensive and higher values published by the IEA than those available in ADEME’s Carbon Base used previously).

Evolution of Diam Bouchage’s greenhouse gas emissions





Supply of electricity from renewable sources at our Spanish site in Spain:

Since 2020, the Spanish site at San Vicente de Alcántara has been using green electricity guaranteed to be 100% produced from renewable energy sources backed by Guarantee of Origin certificates. This zero-carbon supply cannot be directly posted in the carbon footprint calculation as it is not produced on the site, but it corresponds to a reduction of over 11,000 tonnes of CO2 equivalent compared to the Spanish electricity mix (about 16% of Diam’s carbon footprint).

Focus on the Carbon 2025 trajectory:

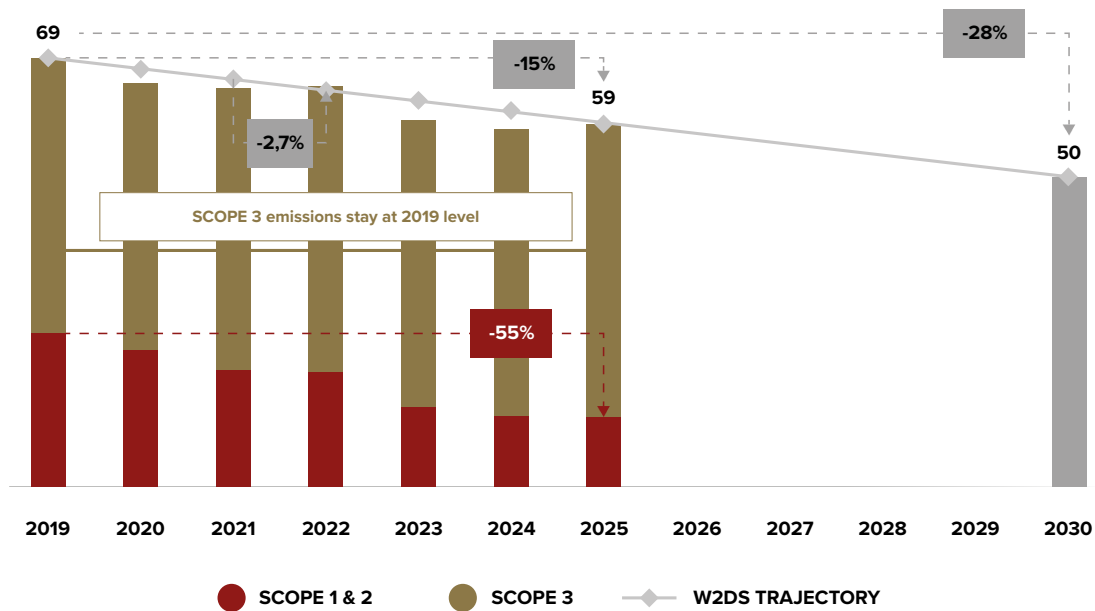
In mid-2021, the OENEO Group committed to significantly reducing its carbon footprint by engaging in the WB2DS trajectory launched by the Science Based Target Initiative².

As the primary contributor to OENEO’s carbon footprint, Diam Bouchage has committed to a 15% reduction in its carbon footprint by 2025.

Achieving this target through an ambitious reduction of 55% of GHG emissions in Scope 1&2 (energy and direct emissions) and controlling GHG emissions in Scope 3 (particularly Materials and Freight).

By reducing consumption of materials and energy through significant improvements in our processes and by developing the production of renewable energy at our industrial sites, we will contribute to the necessary reduction of greenhouse gas emissions while developing our self-sufficiency in energy.

Diam’s Carbon Trajectory – kTonnes CO2e



² Science Based Target Initiative (SBTI) is an international approach that gives companies a scientific framework to define their Carbon trajectory and contribute to achieving goals set out in the 2015 Paris Climate Agreement. WB2DS (Well below 2 Degrees) is an ambitious trajectory that aims to limit global warming to well below 2°C above pre-industrial levels.

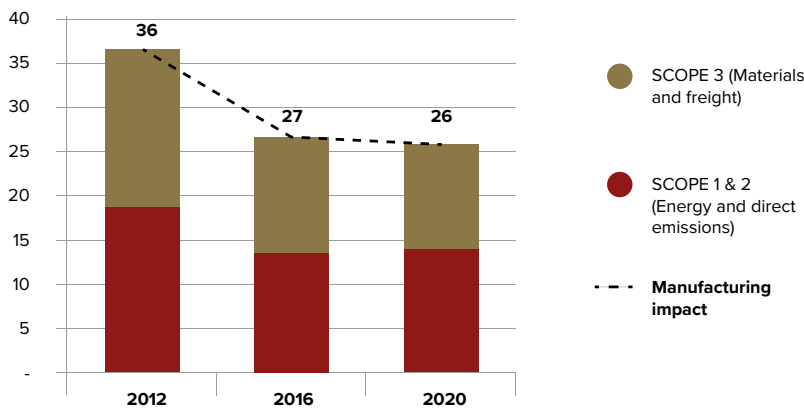
Evolution of greenhouse gas (GHG) emissions in the manufacture of Diam 5 and Mytik Diam 5 closures (from the cork oak forest to leaving the factory)

Méthod: The Greenhouse Gas Emissions indicator shown below results from the Life Cycle Analysis (LCA) of Diam Bouchage’s main closures. The calculation takes into account energy consumption and direct GHG emissions at the industrial sites (SCOPE 1 & 2); the purchase of raw materials, packing and transport of goods (SCOPE 3). The scope ends on leaving the factory (from cradle to gate).

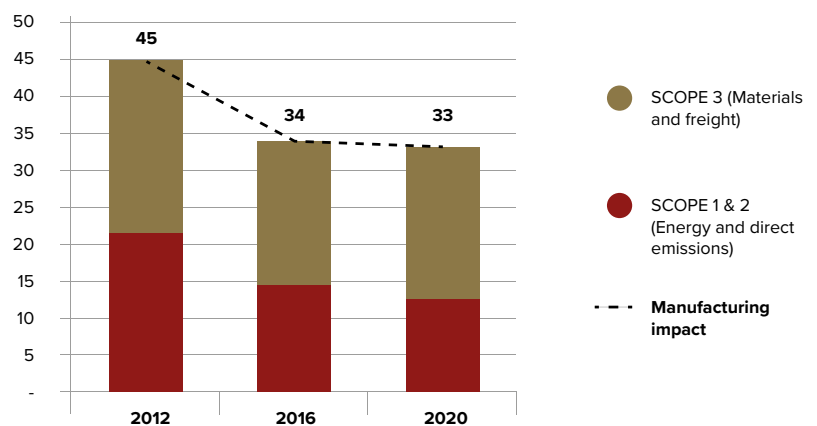
The LCA was updated in 2021 based on 2020 production data and using the methodology and indicators in the European Commission’s Product Environmental Footprint (PEF). **Refer to the methodology appendix for more details.**

Continuous improvement in processes has led to a gradual reduction in the carbon footprint of reference closures in ranges for Still Wines and Sparkling Wines. The reduction has been less pronounced over the last 4 years, rapidly gaining actions having been carried out. So the company has committed to a significant reduction in its carbon footprint by 2025 through the roll-out of new actions and investments over the coming years.

Manufacturing impact of Diam 5
g CO2e/unit - (LCA method - upon leaving the factory)



Manufacturing impact of Mytik Diam 5
g CO2e/unit - (LCA method - upon leaving the factory)



Development of our raw materials reduces the carbon footprint of our closures

Depending on the ranges, Origine by Diam closures have a manufacturing carbon footprint of less than 5 to 10% compared to ‘classic’ closures. Indeed, production of the biosourced components used has a smaller carbon footprint.

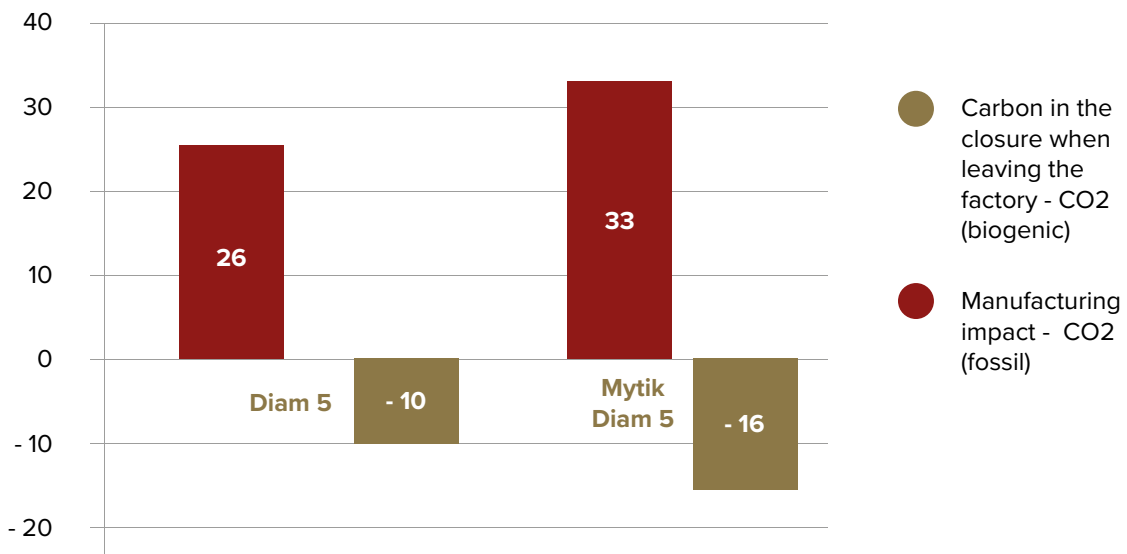
To ensure that naturalness and carbon are moving in the same direction, each new raw material identified by R&D is subject to a Life Cycle Analysis in concert with our suppliers.

Life cycle benefits of cork

The environmental added value of biosourced products like cork lies in the fact that the product’s carbon content constitutes the temporary storage of carbon captured by photosynthesis during the plant’s growth and so it is taken out of the atmosphere. Contrary to petroleum-derived carbon, biogenic carbon emitted in the form of CO2 when processing the closure after use (incineration or decomposition) does not contribute to the increase of greenhouse gas concentration in the atmosphere. Origine by Diam closures temporarily store an even greater quantity of organic carbon due to the higher biosourced portion of their composition.

The graph below enables the carbon stored in our closures when leaving the factory to be visualized; this corresponds to carbon captured by photosynthesis when the cork is growing.

Manufacturing impact and storage of carbon in the product
g CO2e/unit - (LCA-PEF method - upon leaving the factory)



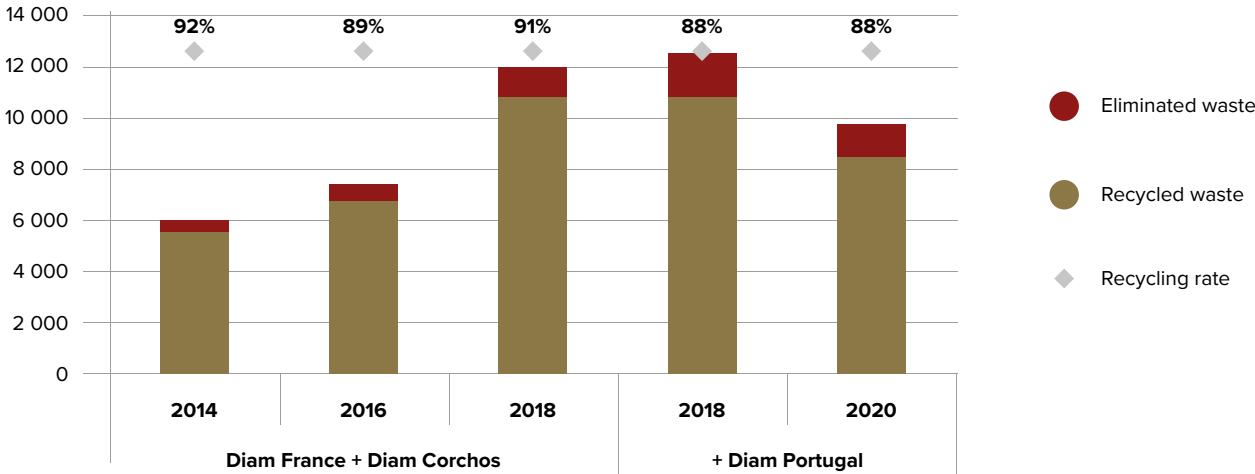
RECYCLING OUR CORK BY-PRODUCTS AND WASTE

Diam Bouchage generates cork dust, which is mostly recycled on the industrial sites in order to provide the heat of combustion necessary to the manufacturing process, thus mitigating the need to resort to fossil fuels. Between 2018 and 2020, the use of this biomass for heat requirements increased at the Spanish and Portuguese sites, leading to a significant decrease (-20%) in waste sent on to external recycling industries. Excess cork waste is sent on to recycling industries, composting or wood fuels and, since 2018, the shoe industry has also been making use of it.

At-source sorting of common waste such as packaging, office waste and maintenance waste is carried out at all sites in the aim of seeking maximum recovery. During 2020, the Spanish site followed the French site's example and also set up a big-bag cleaning and inspection service enabling the use of new big-bags to be reduced. In addition, it is equipped with cardboard and plastic compactors in order to add value to the waste sent on to recycling industries.

The recycling rate for the whole spectrum of waste remains high at around 90% Nevertheless, research into recycling continues in order to further improve this carbon footprint and engage in the dynamics of a circular economy. To this end, a Circular Economy manager for the whole division was appointed in 2020.

Production and recycling of waste (tonnes)



CONTROLLING RISKS AT OUR INDUSTRIAL SITES

Ongoing investments to minimize our environmental impacts

Diam Bouchage continuously invests in its production sites to ensure industrial and environmental risks are controlled.

In 2020, investments were made at the French and Portuguese sites in order to improve the pretreatment of industrial waste water before discharge into the public sewerage networks.

A new chemical product unit was installed at the Portuguese site with all the guarantees to deal with the control of chemical risks. Also, the mill workshop has been completely soundproofed.

Moving towards ISO14001 certification at all our industrial sites

In order to have our environmental approach recognized, we are committed to working towards ISO14001 certification, which bears witness to the implementation of a pertinent and effective environmental management system.

Diam Corchos in Spain has been certified since April 2021, Diam France applied for certification in September 2021. Diam Portugal will be undertaking certification in 2022.

Since 2016, Diam has been carrying out the LCA of two typical closures from its production: the Diam 5 closure for still wines and the Mytik Diam 5 closure for sparkling wines.

Objectives of the LCA: In keeping with its environmental policy, Diam wants to measure the environmental performance of its products in order to steer the process of ongoing improvement. The company also wants to provide its clients with information that enables them to assess the environmental profile of their products for ecological labelling or their carbon footprint (greenhouse gas emissions) in Scope 3 of their activities.

Methodological framework: The revised version of the PEF Method (Zampori, L. and Pant, R., Suggestions for updating the Product Environmental Footprint (PEF) method. EUR 29682 EN, Publications Office of the European Union, Luxembourg, 2019, ISBN 978-92-76-00654-1

Functional unit: Closing 1,000 bottles of wine

Impact indicators: 16 PEF indicators – The LCA results for all the impact indicators in the PEF method are available upon request.

Scope – From the cradle to the gate: The following life cycle stages are taken into account:

- Extraction and transformation of raw materials. Pursuant to the general methodological framework for the updated version of the PEF method, the sequestration of carbon in the forest from which the cork came is not taken into account.
- Manufacture of the cork body in Diam factories according to the industrial scheme in place.
- All upstream and internal stages of transport of the goods.

The scope stops at the gate of the factory that carried out the closure's last finishing operation.

Carbon content stored temporarily in the product

The cork in the closure contains biogenic carbon captured by photosynthesis while the bark of the cork oak was growing. Pursuant to the PEF method, carbon stored temporarily in the closure is given as supplementary information. It will be emitted when the closure decomposes during its elimination, leading to a zero carbon footprint for the life cycle "from the tree to the end of the closure's life" (cradle to grave, excluding energy recovery during processing).

Process / material data: Used in order of priority:

- Internal data for all industrial stages
- Calculation using the PEF method of impact indicators for main raw materials based on life cycle inventories provided by suppliers
- Ecoinvent 3.7 database – cut-off version (September 2020)
- Complementary LCA studies into materials not included in Ecoinvent 3.7