ENVIRONMENTAL STATEMENT 2021

GIRBAU

BEYOND LAUNDRY

1. PRESENTATION

Thinking about the future and keeping a constant line of improvement, GIRBAU commits to achieve, through ethical and responsible behaviour, a series of environmental goals aimed at the conservation and maintenance of natural resources, the permanent improvement of health and safety at work, and the prevention of nuisances and disturbances to residents in the surrounding area.

We understand that **Quality Management ensures our customers quality and homogeneity** in the products we manufacture, as well as high production efficiency.

Industrial safety, work conditions and permanent training **ensure that our employees work in satisfactory conditions.**

Moreover, **an Environmental management system ensures** that our products have been manufactured **optimizing natural resources** and in compliance with all environmental regulations and laws.

Our company's environmental management is a commitment to promote constant improvement in our environmental performance and materializes in the implementation of an Environmental Management System, which includes the undertaking of periodic evaluations and audits so as to constantly assess, document and improve its performance.

Our idea of quality does not limit itself to the manufacturing of a good product, a good service and the searching for our customers' satisfaction. We wish to go further on and we are also concerned about environmental impact.

For this reason, we understand that this Environmental Management System is our small contribution to leave a better world than the one we found.

Pere Girbau

General Manager of Girbau, S.A.

CERTIFICATIONS

At GIRBAU, we understand that certifications are a starting point for the constant improvement of our products.

The present environmental statement is intended to show all the efforts made by GIRBAU to improve its competitiveness and productivity while preserving the environment.

GIRBAU goes beyond the requirements of the regulations and spares no efforts to contribute to a better environment.

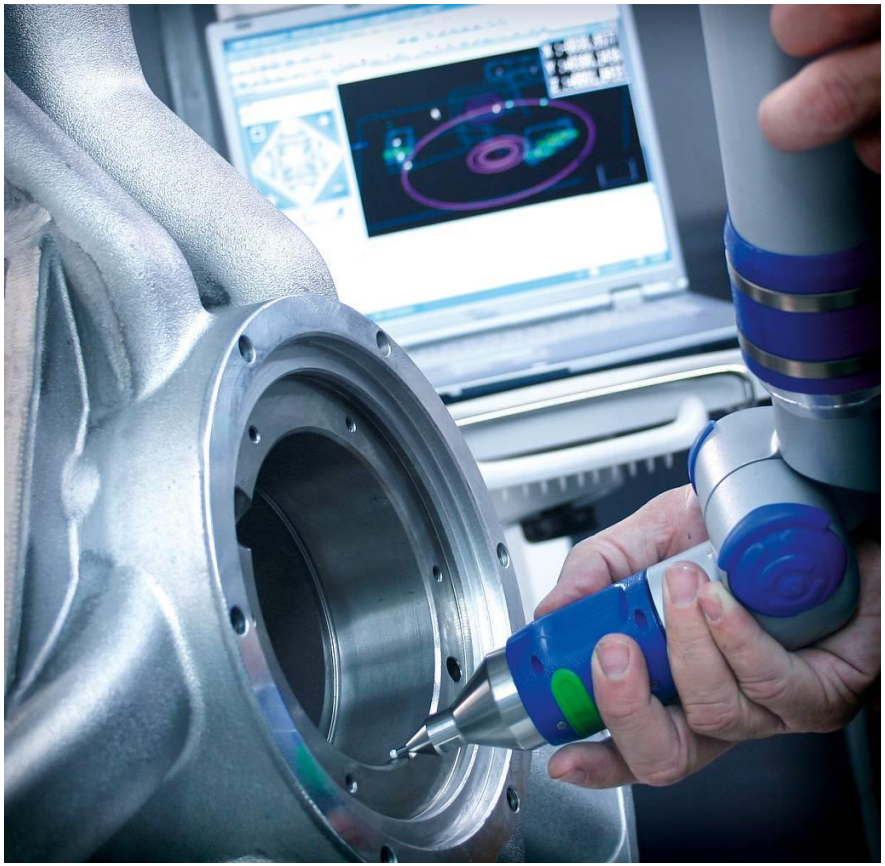
In this respect GIRBAU holds certifications UNE EN ISO 9001:2015, UNE EN ISO 14001:2015 and Regulation (CE) 1221/2009 of the European Parliament and of the Council of 25 November 2009-EMAS – EMAS, modified in accordance with the Regulation (UE) 2017/1505 and the EU REGULATION 2018/2026.

RELATIONSHIP WITH RELATED ORGANISATIONS

GIRBAU has relationships with several organisations that can affect the environment, and noteworthy in this regard is the participation with European working groups CENELEC and ETCT, which are working on the draft version of the Eco-friendly energy label regulation.

Also of note is the collaboration with chemical product companies to provide turnkey "wet cleaning" laundries, which represent an alternative to dry cleaning laundries that are highly-polluting due to the use of chlorinated solvents among others.

Also noteworthy has been Girbau Lab's drive to promote several projects with the collaboration of technology centres and universities in order to improve the circularity of laundries.



THE PREMISES

GIRBAU is a company located in the municipality of Vic, about 50 Km away from of Barcelona, specializing in the manufacture and sale of laundry equipment and textile finishing. It can produce installations of any type and size and is one of the world's leading manufacturers.

Since the company was started, GIRBAU has been working to guarantee its customers complete satisfaction while providing maximum quality.

To achieve this, the company set up a quality system that has been UNE EN ISO 9001 certified since 1994.

Currently, on the premise that the concept of quality also includes environmental quality, the company operates an environmental management system that is certified under UNE EN ISO 14001.

The rules and procedures of this system guarantee that the company's products are designed and manufactured in an environmentally friendly way.

G1 Factory

GIRBAU has the following two production centres in Vic:

GIRBAU S.A.	**GIRBAU 1 Factory (G1)**	**GIRBAU 2 Factory (G2)**
Location	Ctra. Manlleu, Km. 1 08500 Vic (Barcelona)	Polígon Ind. Malloles. C.Pruit 08500 Vic (Barcelona)
Contact Details	Tel. 93 886 11 00 Fax 93 886 07 85 E-mail: girbau@girbau.es	Tel. 93 886 64 00 Fax. 93 889 29 86 E-mail: girbau@girbau.es
Type of products manufactured and NACE	Machinery for laundries NACE: 2894	Machinery for OPL and industrial laundries NACE: 2894
Land use in relation to biodiversity[1]	Constructed and paved floor space: 21,000 m^2 Total land use: 21,000 m^2 Total paved floor space: 21,000 m^2	Constructed and paved floor space: 13,600 m^2 Total land use: 13,600 m^2 Total paved floor space: 13,600 m^2

With the aim of strengthening the company's commitment to the environment, it has taken the decision to adopt European Union Regulation (EC) 1221/2009 of the European Parliament and of the Council of 25 November 2009, which enables voluntary participation by organisations in a European Union eco-management and audit scheme (EMAS III). Modified in accordance with the EU Regulation 2017/1505 and 2018/2026.

This Regulation sets out three main courses of action:

- Control of environmental aspects resulting from our activity.
- Continuous reduction of such impact. Setting of goals and actions for its achievement, periodically controlling the results by means of environmental audits.
- Keeping the public informed of its actions.

Through this Environmental Statement, GIRBAU, S.A. wishes to show the work done and the objectives set to continuously improve its activity with regard to environmental conservation in a clear and understandable way.

[1] Data related to land use with respect to biodiversity have not changed over the last three years.

ORIGINS AND PRESENT SITUATION

GIRBAU was set up as a public limited company on 31 December 1971, as a continuation of the activities of Mr. Joan Girbau i Vilageliu. It is a family company that started with an initial share capital of 13,500,000 Spanish Pesetas.

GIRBAU, S.A. has 443 employees, working in the following departments: Research, Product Development, Mechanical, Electrical and Electronic Production, Laundry Project Office, Personnel Training, Commercial Office and Technical Support Services.

In 2020, GIRBAU, S.A.'s turnover was 70 million euros, of which more than a 60% came from exports. Its main markets include: United States, United Arab Emirates, United Kingdom, and Cuba.

GIRBAU products have various certifications that guarantee compliance with the strictest regulations at a European Community and world level, such as EC, WRAS, Applus +.

In order to control the overall quality of all our products, it is not enough to only have product and business certifications. We need to be sure that all the components in our products are reliable and of good quality. We therefore demand that our products have these certifications: CSA, UL and VDE.

G2 Factory

CHRONOLOGY OF ACTIONS FOR PROTECTION OF THE ENVIRONMENT

1988-2000

- Regular waste controls began.
- Measurement of atmospheric emissions began.
- GIRBAU sponsored a campaign for selective paper collection in the companies, organized by Osona District Council. Selective collection was implemented at GIRBAU, S.A.
- Waste water controls began.
- The use of trichloroethylene is replaced with other aqueous products. This was applied to 80% of the production process for surface treatment.
- Since part of the G1 factory was being expanded, trees surrounding the car park area were transplanted to a city park in Vic. The operation was neither easy nor cheap, but it was an environmental success: all trees survived the transplanting process.
- It was agreed that from then on, the design of factory modifications and expansion would include roofing enabling the use of 60% more daylight. Underground water tanks were also built holding 250m3 in order to recover 50% of the water from the quality control department when washers can be tested without linen.
- Aqueous waste was eliminated from the paint booths, replacing the water curtain booths with dry filter ones.

2000-2010

- Chlorine derivatives were no longer used in the company's production processes.
- UN-EN-ISO-14001 certification was obtained.
- Reduction in testing time for each machine. This meant a saving of 25% in electrical power in the quality control department of G1 factory.
- Four destratifiers were fitted, and skylight openings were covered. This represents a saving of 30% of the energy required to heat one plant in the G2 factory.
- Existing fluorescent lighting was replaced by triphosphor fluorescents (recyclable and not classed as special waste) and magnetic reactances were replaced with electronic ones (their tube lasts 3 times longer).
- A tank was constructed with a capacity of 100 m3 to recover 85% of water from the quality control department of the G2 factory.
- In February 2004, GIRBAU received confirmation of its registration in the EC's Eco Management and Audit Scheme (EMAS).
- A closed circuit water cooler was purchased and installed for a point soldering machine. This implies an annual saving of 603,000 l. of water.
- Four skylights were opened in the manual painting section with the aim of improving working conditions and saving power.
- The Factory 1 Contaminated Soil Statement was presented as stipulated in R.D.9-2005. The building work underway for the flatwork ironers laboratory provided the opportunity to check that the soil was not contaminated in that area (this work is being carried out in the old machine plant, where there was more likelihood of subsoil contamination, as large quantities of oil and lubricant were used).
- An ongoing process of computerising the distribution system for job orders and plans.
- A significant energy saving was achieved by extending the unloading bay, thereby enabling all types of trucks to back close up to the plant and avoiding large winter heating bills.

- A significant saving in water (600,000 l/year) was achieved in the soldering section by purchasing a second closed circuit water cooler for another point soldering machine.
- Reduction in atmospheric emissions of paint powder particles during the manual painting process, thanks to the purchase and installation of a more efficient filter for paint powder particles.
- Water savings during the series 6 tests with the construction, in Factory 2, of a washer checking space with two different drains: one for recovering the water used in the tests and another for evacuating the water. This represents a saving of 80%, with only 20% waste water.
- Study for the installation of photovoltaic panels: the installation of a number of solar panels on the roof of the warehouse, as part of the extension work on the building.
- Tests begin to find ways of avoiding the atmospheric emission of VOCs (volatile organic compounds).
- In the painting section tests begin to find ways of eliminating the use of primer type paint with solvents.

2010-2020

- The installation of collective printers with double feeders, one for clean sheets and the other for the reuse of the blank side of used sheets of paper.
- In the painting section tests continue with new products to try to reduce phosphates in the washing process and eliminate VOCs during the primer processes.
- Lighting tests with LED-type tubes.
- Energy efficiency improvements in the batch washer and washing machines.
- Implementing the 400v transformer at Girbau 1.
- Refurbishing the facades with insulation for better energy management.
- The manual for the machines is provided on a USB stick rather than in paper form.
- Progressive replacement of fluorescent tubes by LED type lighting.
- Incorporation of optical laser cutting machinery with high efficiency.
- Installation of photovoltaic solar panels on the roof of G1: pre-study and trial phase.
- Training GIRBAU users at the Girbau Experience Centre.
- Starting up of the first phase of the installation of solar panels in G1 with 99 kWp of power.
- Reduction of the total consumption of solvent by 8%
- Study to reduce by 10% the weight of the packaging of Series 6 washing machines.

2020

- Reduction of the weight of the packaging of Series 6 washing machines by 50%.
- Consolidation of the reuse of square wooden struts as a by-product, meaning a reduction on the wood waste higher than 50%.

2021

- Calculating carbon footprint for 2020

2. COMPANY ACTIVITY

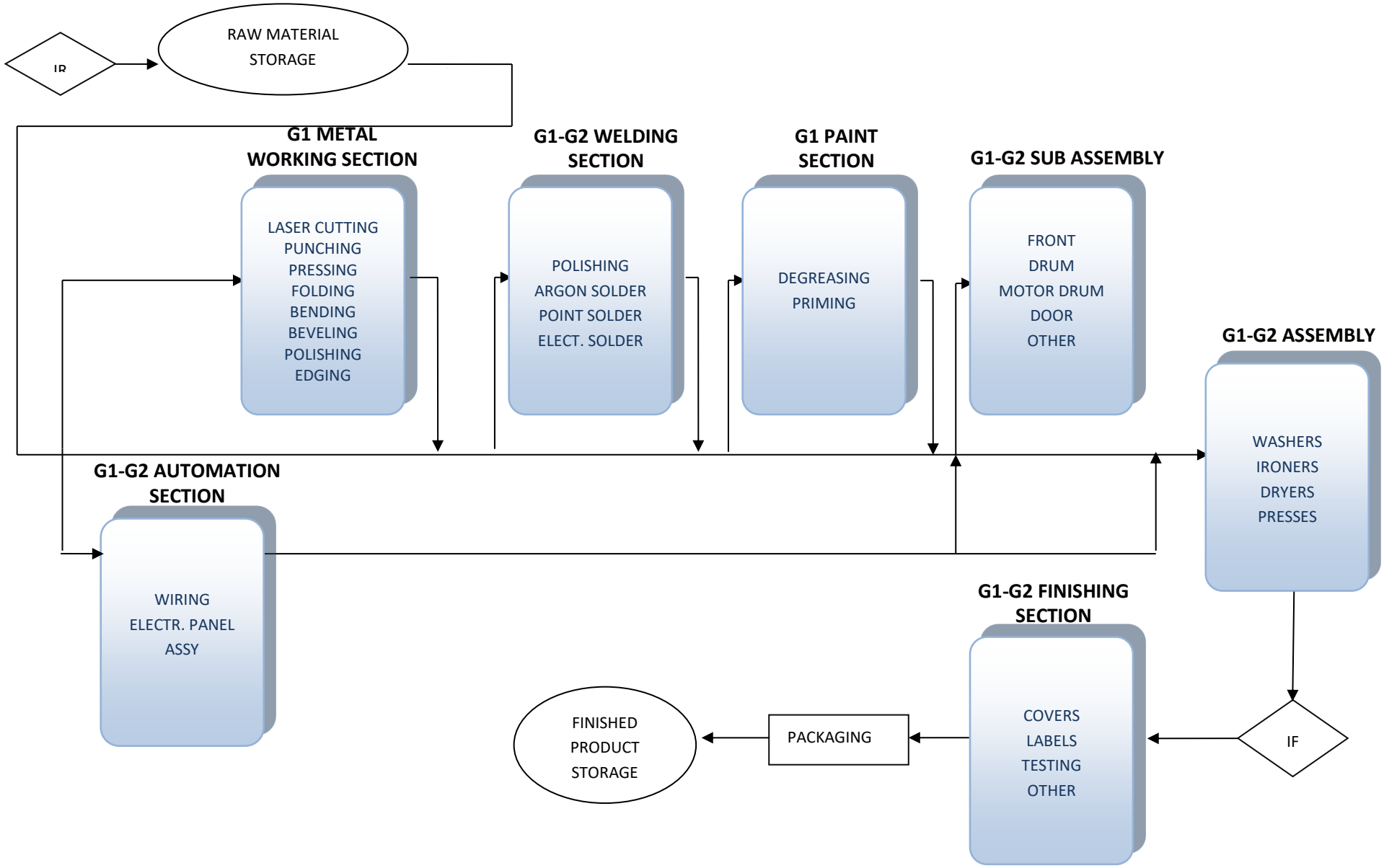
Our company specializes in the manufacturing and marketing of industrial laundry equipment.

All GIRBAU products are manufactured in adherence to the principles of respect for the Environment.

Therefore, already in the phase of new product design, the engineering department of GIRBAU follows the procedure established in the Environmental Management System, by which different measures are to be taken into account in order to minimize the negative effects on the environment.

Factors to be taken into account during the phase of GIRBAU product design	Environmental improvements achieved
Equipment that guarantees optimization of natural resources.	Energy and water saving
Noiseless machines	Less acoustic pollution
Reduction of the weight of machines	Raw materials savings
Use of durable materials	Materials last longer, therefore consumption of new materials is prevented
Use of recyclable materials	Materials can be recovered

MANUFACTURING DIAGRAM



MAIN PRODUCTS MANUFACTURED BY GIRBAU

Washers

With a great range of washing machines that incorporate the latest technological advances and countless benefits, GIRBAU seeks efficiency in the consumption of natural resources.

Free-standing Washers

The *MDS* - Multi-Directional Springs - system enables spinning speeds of over 250G with silent and highly stable operation. The system absorbs up to 95% of vibrations and considerably lengthens the life of the shock absorbers.

The Aquafall system, which is based on a series of holes in the drum blades, enables the entry of additional water in the form of a cascade to increase action and reduce the rinsing time. In addition, the Aquamixer system is a hot and cold water mixer that makes it possible to achieve a great precision in the temperature of the water programmed.

Hard-mount Washers – HMS Series

Free-standing Washers – HS Series

Hard-Mount Washer-Extractors

These machines require bolting down and reach spin speeds of up to 700 rpm. They are robust, reliable and versatile, offering optimum features and achieving maximum productivity and performance.

They are available with two types of controls to suit any requirement, the COIN version: for self-service laundries, and the LOGI PRO that makes it possible to set all the washing parameters in addition to incorporating the *Just in Load* function, which succeeds in adjusting the water consumption and the time of dosing proportional to the program and the weight of the load selected, in addition to saving water, energy and chemical products.

Tumble dryers

The range of Ecodryer dryers incorporate the *Transflow* system which aids the penetration of the hot air into the linen articles while taking advantage of the temperature to the maximum, in addition to having the door with double glazing and a double panel, *Heat Capture Technology*, ensuring a better use of energy and at the same time increasing the performance of some of the more expensive laundry processes.

In addition to lengthening the life of the linen thanks to the Care Touch Drum system, which is based on inlaying the holes to prevent the linen from coming into contact with sharp edges.

Ecodryer dryers – ED Series

PB flatwork ironer

Wall-type ironers

The **PB/PBP** wall-type ironers combine productivity, ergonomics and safety, and provide the best ironing quality and profitability.

Girbau's exclusive *cinematic strap tensioning system* maintains a uniform ironing cylinder pressure, thereby achieving an exceptional finish for the item.

They incorporate the *Autospeed* system that automatically adjusts the ironing speed depending on the type of fabric and its degree of moisture.

PBP models incorporate a photocell system at the linen input and output that calculates the total length of the article and allows completely automatic folding.

Industrial laundry: Batch washing system

A system made up of a tunnel washer, extraction press and dryer

The tunnel washer is a completely versatile installation with features that guarantee a long mechanical life. It has an optimal control that allows full control of the process parameters.

Thanks to the electronic control of the water flow, and the *Drain Intercooler* - which takes advantage of the thermal energy of the water from the drainage to preheat the water in the external network, having the ECO+ option available makes it possible to achieve savings of 80% in water consumption, 70% in energy and 40% in detergents compared to a conventional tunnel.

In the drying phase, the GIRBAU dryer ensures a really reduced energy consumption.

Batch washing system

PC120 flatwork ironer

Industrial laundry: Multi-cylinder flatwork ironers

GIRBAU's flatwork ironers are a guarantee of efficiency, functionality, safety and productivity.

Designed in accordance with the European machinery safety directive for industrial laundries. The pressure elements are certified in accordance with the Asme code and provide a double safety device for hands and a daily self-checking.

Equipped with a large evaporation capacity and a high ironing capacity, they provide a perfect finish.

3. ENVIRONMENTAL POLICY

GIRBAU, devoted to the manufacture of equipment for laundries and textile finishing, a leader in the international market, recognises the protection of the environment as a priority and for this reason maintains an environmental management system duly implemented in accordance with Standard ISO 14001 and EMAS, respecting the following commitments:

- To comply with applicable environmental legislation and other voluntary commitments.
- To protect the environment and prevent pollution by making a rational use of resources and managing the atmospheric emissions and waste that are generated properly.
- To incorporate the best available techniques in the design of our products, pursuing the minimum risk of environmental impact in all the activities involved in the machine's life cycle.
- To adapt environmental management to our context, by implementing the necessary processes for the continuous improvement of our environmental performance.
- To train, to raise awareness and to involve all the GIRBAU team in order to develop and apply good environmental practices.
- Permanent assessment of the effects on health, safety in the workplace and the environment that our products and procedures may cause.
- Collaboration with our suppliers, both those of products and of services, in order to improve their procedures with regard to the environment.
- To inform all interested parties about the risks that our machines and installations can have for health and the environment, as well as about the protection measures adopted and environmental efficiency in their use, maintenance, handling and disposal at the end of their useful life.
- To establish a permanent communication with all staff and stakeholders, spreading these principles and commitments and promoting environmental management at all times as a task involving participation at all levels.

Pere Girbau i Pous

General Manager of GIRBAU, S.A.

Vic, March 26th 2019

4. ENVIRONMENTAL MANAGEMENT SYSTEM

Since 2000, GIRBAU has been establishing an Environmental Management System (EMS) in G1 and G2 to ensure all its environmental commitments are met.

The GIRBAU Environmental Management System uses three important tools to control and promote the fulfilment of its environmental objectives:

- An environmental management handbook and associated procedures: gives an account of all responsibilities and activities in order to achieve the established objectives of the environmental policy.
- Regular inspections: ensure procedures are correctly implemented and carried out.
- Regular environmental audits verify and ensure system efficiency.

The environmental committee is the body responsible for the monitoring of the EMS and consists of the following members:

- General Manager
- R&D&I Director
- Environmental Coordinator
- Manufacturing Director
- Quality Director
- Committee Secretary
- Employees' representatives

GIRBAU´s General Manager supervises the EMS on an annual basis once he has received the system review report drawn up by the Environmental Coordinator.

The environmental committee is in charge of monitoring environmental management issues and delegates its representation to the environmental coordinator.

The Environmental Coordinator, together with the people in charge of each department, identify the environmental effects of each activity carried out in the department and then assesses them under both normal and emergency conditions, according to the Procedure for identification and assessment of environmental issues (MAP03). On the basis of the results obtained in the assessment, the procedures for operational control are established.

All employees are involved in the correct functioning of the EMS. The department managers ensure that all established procedures are followed in order to achieve good Environmental management

In order to train new staff members and increase their awareness regarding environmental management issues, GIRBAU is considering setting up a training to convey to staff:

- The importance of complying with the environmental policy and with EMS procedures and requirements.
- The significant effects and benefits of better personal behaviour for the Environment.
- Their functions and responsibilities in meeting environmental requirements and the response to be given in the event of an emergency situation.

5. THE ENVIRONMENTAL IMPACT

In matters of Environmental protection, GIRBAU does not wish to limit its practice to merely complying with current standards and regulations. At GIRBAU there is a culture of respect for the Environment and on many occasions the company has engaged in voluntary Environmental protection work (See Chronology of actions for protection of the environment.)

The two basic premises for the culture of Environmental conservation at GIRBAU are to work with materials that are as non-aggressive as possible and minimize waste generation at the source.

The fact that the products manufactured by GIRBAU do not produce a high level of pollutants (neither during the manufacturing process nor at the end of their useful life) makes the application of corrective measures for Environmental protection easier.

Year after year, the data that we are presenting in the environmental statement are in line with Girbau environmental policy commitments.

EVALUATION METHOD FOR ENVIRONMENTAL ISSUES

Despite the good practices implemented, we are aware that GIRBAU's production activity generates a series of environmental impacts. For this reason, we have implemented an operating method that makes it possible to identify and evaluate the direct and indirect environmental aspects of all the activities carried out at GIRBAU and be able to determine their degree of importance in order to work on these activities as a matter of priority in order to prevent, reduce, and if that is not possible, control the impacts arising.

This operating method is included in the Procedure for identifying and evaluating environmental aspects (MAP03), and has been applied to all the different sections and activities that are carried out at GIRBAU’s facilities.

The environmental aspects are identified as the following types:

- Natural resources consumption
- Raw materials consumption
- Waste water generation
- Waste generation
- By-products generation
- Atmospheric emissions
- Soil pollution
- Noise pollution
- Other (visual impact, offensive odours, etc.)

In order to evaluate them in the case of direct aspects under normal conditions, the nature, the magnitude/frequency and the possibility of implementing technological or management improvements in the environmental sphere are taken into account. In emergency conditions, the probability, the severity and the possibility of implementing technological or management improvements in the environmental sphere are taken into account.

In the case of indirect aspects, evaluation differs depending on the type of aspect, so that, for example, the EMS availability and the origin/grouping in the case of aspects associated with supplier/carriers; or whether training has been carried out, and whether the manuals are delivered to the customers-users of GIRBAU machinery are taken into account for aspects arising from the use of the machines.

In all cases, the possibility of implementing technological or management improvements in the environmental sphere is taken into account.

The indicators used for the assessment of environmental aspects are in line with the decision *(EU) 2021/2053 of 8 November 2021 best environmental management practices, environmental performance indicators and benchmarks of excellence for the fabricated metal products manufacturing sector*.

The result of this evaluation, the significant aspects related to GIRBAU in 2021 are presented below.

SIGNIFICANT DIRECT ASPECTS IN 2021: G1 FACTORY

DIRECT ENVIRONMENTAL ASPECTS	MAIN ENVIRONMENTAL ASPECTS
✓ Water consumption	→ Natural resources consumption
✓ Electricity consumption	→ Depletion of non-renewable resources, impact on biodiversity, generation of radioactive waste
✓ Natural gas consumption	→ Depletion of non-renewable resources
✓ Metal raw materials consumption	→ Depletion of non-renewable resources, loss of air quality
✓ Consumption of wood	→ Consumption of renewable natural resources
✓ Consumption of paints	→ Depletion of non-renewable resources, loss of air quality
✓ Consumption of paper	→ Consumption of renewable natural resources
✓ Fuel consumption of own fleet	→ Consumption of non-renewable natural resources
✓ Generation of cast iron and steel waste	→ Energy consumption for treatment, loss of air quality and contribution to global warming, complete recovery of metal (positive impact)
✓ Generation of batteries waste	→ Energy consumption for treatment, loss of air quality and contribution to global warming
✓ Generation of waste from fluorescents	→ Energy consumption for treatment, loss of air quality and contribution to global warming
✓ Generation of I.T. and electrical material waste	→ Energy consumption for treatment, loss of air quality and contribution to global warming
✓ Generation of absorbent filter waste	→ Possible soil pollution and landscape impact (landfills)
✓ Generation of paint waste in powder form	→ Possible soil pollution and landscape impact (landfills)

DIRECT ENVIRONMENTAL ASPECTS	MAIN ENVIRONMENTAL ASPECTS
✓ Generation of solvent waste	→ Possible soil pollution and landscape impact (landfills)
✓ Generation of degreasing water waste	→ Possible soil pollution and landscape impact (landfills)
✓ Generation of oil waste	→ Energy consumption for treatment, loss of air quality and contribution to global warming
✓ Generation of general factory waste	→ Possible soil pollution and landscape impact (landfills)
✓ Generation of powder from the laser waste	→ Possible soil pollution and landscape impact (landfills)
✓ Generation of traction batteries waste	→ Energy consumption for treatment, loss of air quality and contribution to global warming
✓ Activated carbon generation	→ Possible soil pollution and landscape impact (landfills)
✓ Generation of paper and cardboard waste	→ Energy consumption for treatment, loss of air quality and contribution to global warming
✓ Emissions resulting from natural gas combustion	→ Loss of air quality and contribution to global warming
✓ Emissions from the sources of the painting chamber	→ Loss of air quality (emission of VOCs)
✓ Emissions resulting from our own fleet	→ Loss of air quality and contribution to global warming

SIGNIFICANT DIRECT ASPECTS IN 2021: G2 FACTORY

DIRECT ENVIRONMENTAL ASPECTS	MAIN ENVIRONMENTAL ASPECTS
✓ Water consumption	→ Consumption of renewable natural resources
✓ Electricity consumption	→ Depletion of non-renewable resources, impact on biodiversity, generation of radioactive waste
✓ Natural gas consumption	→ Depletion of non-renewable resources
✓ Metal materials consumption	→ Depletion of non-renewable resources, loss of air quality
✓ Consumption of wood	→ Consumption of renewable natural resources

DIRECT ENVIRONMENTAL ASPECTS	MAIN ENVIRONMENTAL ASPECTS
✓ Consumption of paper	→ Consumption of renewable natural resources
✓ Fuel consumption of own fleet	→ Consumption of non-renewable natural resources
✓ Generation of cast iron and steel waste	→ Energy consumption for treatment, loss of air quality and contribution to global warming, complete recovery of metal (positive impact)
✓ Generation of batteries waste	→ Energy consumption for treatment, loss of air quality and contribution to global warming
✓ Generation of waste from fluorescents	→ Energy consumption for treatment, loss of air quality and contribution to global warming
✓ Generation of I.T. and electrical material waste	→ Energy consumption for treatment, loss of air quality and contribution to global warming
✓ Generation of oil waste	→ Energy consumption for treatment, loss of air quality and contribution to global warming
✓ Generation of paper and cardboard waste	→ Energy consumption for treatment, loss of air quality and contribution to global warming
✓ Generation of general factory waste	→ Possible soil pollution and landscape impact (landfills)
✓ Generation of waste from drums containing hazardous substances	→ Energy consumption for treatment, loss of air quality and contribution to global warming
✓ Emissions resulting from natural gas combustion	→ Loss of air quality and contribution to global warming
✓ Emissions resulting from our own fleet	→ Loss of air quality and contribution to global warming

SIGNIFICANT INDIRECT ASPECTS IN 2021: G1 AND G2 FACTORY

INDIRECT ENVIRONMENTAL ISSUES	MAIN ENVIRONMENTAL ASPECTS
✓ Fuel consumption and emissions from transfers between factories and warehouses	→ Non-renewable resources consumption and loss of air quality and contribution to global warming
✓ Fuel consumption and emissions resulting from delivering machines to client's premises	→ Non-renewable resources consumption and loss of air quality and contribution to global warming
✓ Fuel consumption and emissions from the commercial department	→ Non-renewable resources consumption and loss of air quality and contribution to global warming
✓ Fuel consumption and emissions from commuting and teleworking	→ Non-renewable resources consumption and loss of air quality and contribution to global warming
✓ Environmental aspects derived from suppliers: resource consumption, waste generation, atmosphere emissions and wastewater generation.	→ Depletion of non-renewable and renewable resources, possible soil pollution, eutrophication of the waters, loss of air quality and contribution to global warming
✓ Environmental aspects arising from the use of the machines by the users: consumption of resources, generation of waste and wastewater and generation of atmospheric emissions	→ Depletion of non-renewable and renewable resources, possible soil pollution, eutrophication of the waters, loss of air quality and contribution to global warming
✓ Emissions resulting from the consumption of electricity	→ Loss of air quality and contribution to global warming

6. TARGETS

STATUS OF ENVIRONMENTAL TARGETS AND GOALS 2021

Below is the evaluation and status of implementation of the environmental targets defined for 2021.

GOAL	SDG	SCOPE	DESCRIPTION OF THE ACTIONS	RESPONSIBLE	RESOURCES	PERIOD	INDICATOR	STATUS
Reaching 296 KWp of installed power in photovoltaic panels for producing electricity for self-consumption		G1	Expanding the existing installation of panels by 197 KWp and their commissioning	Environmental Coordinator	**Economic**	December 2021	Installed capacity of panels	**Not achieved**
Improving roof insulation		G1	Changing the fibre cement roof (3,942 sq. metres) with a transmittance of 83.33 W/m2K for an 80 mm thick panel with a transmittance 0.27 W/m2K	Environmental Coordinator	**Economic**	December 2021	Roof insulation level	**Achieved**
Reducing travel by accessing the workplace via teleworking		G1	For various reasons teleworking days will be implemented for staff who can carry out their work at home	RH manager	Human	December 2021	Number of teleworking days worked[2]	**Achieved**
Calculating carbon footprint	 	G1 & G2 (the project includes the whole group)	Calculating the Girbau Group's 1,2 and 3 scope	Environmental Coordinator	**Economic**	November 2021	CO^2 emissions per scope	**Achieved**

[2] Travel has been reduced because a teleworking policy has been established in the offices, so that staff can telework a maximum of six days per month. The proposed indicator, number of teleworking days carried out, does not adequately measure the fulfilment of the objective, as in 2020 teleworking days were higher than in 2021 due to the context of the pandemic.

GOAL	SDG	SCOPE	DESCRIPTION OF THE ACTIONS	RESPONSIBLE	RESOURCES	PERIOD	INDICATOR	
Life cycle analysis (LCA) of GS7018 and HS6017 washing machines		G1 and G2	Life cycle analysis according to LCA Standard ISO 14040 and 14044	R&D&I Team	**Economic**	December 2021	Life cycle analysis studies of washing machines	**Not achieved**
Defining a sustainable vehicle purchase policy		G1 and G2	Drafting and approving the purchasing policy for the vehicle fleet taking into account sustainability criteria	Board of directors	**Economic**	December 2021	Vehicle fleet purchase policy	**Achieved**
Improving the selective collection of waste in the offices		G1	Installing bins for the selective collection of paper and cardboard, containers and ordinary waste	Environmental Coordinator	**Economic**	December 2021	Eliminating single-person wastepaper bins	**Achieved**

2022 ENVIRONMENTAL TARGETS AND GOALS

In accordance with the significant environmental aspects deriving from GIRBAU's production activity, the following environmental programme is established for 2022. The achievement of these targets is monitored periodically and at least once a year in the Environment Committee meetings.

GOAL	SDG	SCOPE	DESCRIPTION OF THE ACTIONS	RESPONSIBLE	RESOURCES	PERIOD	INDICATOR
Reduction of electricity consumption by 7%.	 	G1	Expanding the existing installation of panels by 197 KWp and their commissioning. In total, 296 kWp of installed capacity for self-consumption production will be achieved.	Environmental Coordinator	**Economic**	April 2022	kWh electricity consumed in G1-G2 /machine produced
		G1	Changing the fibre cement roof (2,176 sq. metres) with a transmittance of 83.33 W/m2K for an 80 mm thick panel with a transmittance 0.27 W/m2K	Environmental Coordinator	**Economic**	October 2022	
		G2	Replacement of the existing lighting by other more efficient luminaires with a longer lifespan as e.g. LED.	Environmental Coordinator	**Economic**	December 2022	
Reduce powder paint waste by 20%.		G1	Implement a complete new system for paint treatment to replace the current manual tunnel.	Environment Coordinator and Layout Manager	**Economic**	December 2023	kg of paint waste / machine produced
7% reduction in emissions from accessing to the workplace		G1	For various reasons teleworking days will be implemented for staff who can carry out their work at home	RH manager	Human	December 2022	t CO_2 eq for accessing the workplace

GOAL	SDG	SCOPE	DESCRIPTION OF THE ACTIONS	RESPONSIBLE	RESOURCES	PERIOD	INDICATOR
To understand the main environmental impacts of the GS7018 and HS6017 washing machines in order to determine actions for their reduction.		G1 and G2	Life cycle analysis according to LCA Standard ISO 14040 and 14044	R&D&I Team	**Economic**	May 2022	Results of the life cycle analysis
To know the greenhouse gas emissions derived from Girbau's activity in order to be able to define action plans for reduction and compare with emissions in 2021.		G1 and G2	Calculating the Girbau Group's 1,2 and 3 scope	Environmental Coordinator	**Economic**	May 2022	t CO_2 eq per scope
To ensure that 40% of the vehicles in Girbau's fleet are sustainable.		G1 and G2	Replacement of traditional vehicles by sustainable vehicles and infrastructure for recharging them	Environmental Coordinator	**Economic**	December 2022	No. of sustainable vehicles / total no. of vehicles

7. ENVIRONMENTAL BEHAVIOUR

The indicators to assess the organisation's environmental performance are listed below.

Relative indicators are given by number of machines manufactured in total (G1+G2). Water is also calculated on the basis of turnover.

The indicators used for the monitoring are in line with the decision *(EU) 2021/2053 of 8 November 2021 best environmental management practices, environmental performance indicators and benchmarks of excellence for the fabricated metal products manufacturing sector*. The number of machines produced is considered instead of the weight of the finished product.

	2019	2020	2021
No. of machines manufactured	13,434	9,055	**10,696**
Turnover (millions of €)	122	70	**80**

Table 7.1 Production data and turnover

7.1. CONSUMPTION OF NATURAL RESOURCES

WATER

In the G1 factory, water is supplied from two wells belonging to the company, one 50m deep and the other 90m.

In addition, water from the Aigües Vic public water supply is used in toilets and showers, as well as in coffee machines and as refrigerated drinking water.

The water supplied from the public water mains is used in the surface finishing processes (in the de-greasing and rinsing baths), for demineralising, air-conditioning and eye-baths.

At the G2 Factory, water supplied from the Vic water main is used in the industrial processes and for cold drinking water, beverage machines, washrooms and air conditioning.

	2019		2020		2021	
	G1	**G2**	**G1**	**G2**	**G1**	**G2**
Aigües Vic (m^3)	5,581	4,613	4,767	5,135	5,019	6,890
Own supply (m^3)	2,163	Not available	1,142	Not available	1,080	Not available
TOTAL CONSUMPTION WATER (m^3)	**7,744**	**4,613**	**5,909**	**5,135**	**5,199**	**6,890**

Table 7.1.1. Water consumption[3]

[3] The data for the consumption of water come from the invoices, and in the case of the well, from the measurements carried out internally.

Water consumption indicators

m^3 of water /millions of Euros

2019: 101.29

2020: 157.77

2021: 151.11

m^3 of water /manufactured machines

2019: 0.91

2020: 1.22

2021: 1.13

The increase in G2 consumption is explained by the mix of machines manufactured and the use of water for prototype testing. The 2021 indicator shows increased production and improved resource efficiency.

ENERGY

The production activity has required the following consumption of electricity, natural gas and fuels of own fleet. Solar panels with an output of 99 kWp were installed as of March 2019. 2021 is the third year of production.

	2019	2020	2021
G1 (MWh)	2,488	1,737	**1,994**
G2 (MWh)	674	574	**629**
TOTAL CONSUMPTION (MWh)	**3,162**	**2,311**	**2,623**

Table 7.1.2. Total electricity consumption[4]

[4] According to data from the NUS consulting program that collects electronic invoice consumption, in the case of network supply, and the data from investors provided by Kostal Solar Electric, in the case of production by solar panels.

	2019		2020		2021	
	G1	**G2**	**G1**	**G2**	**G1**	**G2**
Non-renewable mains electricity (MWh)	2,054	583	1,291	458	**1,341**	**450**
Renewable mains electricity (MWh)[5]	321	91	323	116	**535**	**179**
PV solar panels for self-consumption (MWh)[6]	113	---	**123**	**---**	**118**	**---**
TOTAL CONSUMPTION (INCLUDING SELF-CONSUMPTION MWh)	3,162		**2,311**		**2,623**	
TOTAL CONSUMPTION OF NON-RENEWABLES (MWh, %)	2,637 83.4%		**1,845** **75.7%**		**1,791** **68.3%**	
TOTAL CONSUMPTION OF RENEWABLES (MWh, %)	525 (including solar) 16.6%		590 (including solar) **24.3%**		**832 (including solar)** **31.7%**	
TOTAL CONSUMPTION OF RENEWABLES PRODUCED (MWh, %)	113 3.7%		**123** **5.3%**		**118** **4.5%**	

Table 7.1.3 Consumption of electricity according to origin

	2019	2020	2021
G1 (MWh)	4,427	3,764	**3,980**
G2 (MWh)	2,154	2,351	**2,190**
TOTAL CONSUMPTION (MWh)	**6,581**	**6,115**	**6,170**

Table 7.1.4. Consumption of natural gas according to invoice data

GIRBAU uses electric power for machine operation and lighting in general.

Natural gas is also used for the operation of ovens, hot air generators, steam generators and heating. GIRBAU also uses propane gas[7], but its consumption is minimal. It is used only for testing ironers.

Girbau's own fleet of vehicles uses mainly diesel and petrol.

	2020	2021
Diesel (MWh)	55	**84**
Petrol (MWh)	340	**561**
TOTAL CONSUMPTION (MWh)	**395**	**645**

Table 7.1.5. Fuel consumption according to suppliers' data[8]

[5] Based on renewable energy production values of the National Commission for Markets and Competition (CNMC) (April 2021), the renewable energy of the marketer FOENER corresponds to 20.2% in 2020 and 13.5% in 2019. In 2021, TOTAL Energías Electricidad y Gas España was the marketer, with 28.5% renewable energy.

[6] From the investors data provided by Kostal Solar Elèctric.

[7] Propane gas consumption only occurs in G1. In 2021 it has not been consumed. In 2020 and 2019, consumptions were 1,171 kg and 1,170 kg respectively.

[8] In 2021 they are reported for the first time according to the carbon footprint. The conversion factors from DEFRA for 2021 and from the Catalan Office for Climate Change Guide for 2020 have been used.

Power supply indicators

Total direct energy consumption: MWh/number of machines manufactured

2019: 0.73 (electricity and natural gas)

2020: 1.0 (electricity, natural gas and fuels)

2021: 0.88 (electricity, natural gas and fuels)

The indicator reflects the decrease compared to the previous year due to the increase in production.

Electricity: MWh/number of machines manufactured

2019: 0.23

2020: 0.27

2021: 0.24

Electricity: MWh renewable energy/number of machines manufactured

2019: 0.039

2020: 0.065

2021: 0.078

Electricity: MWh renewable energy produced/number of machines manufactured

2019: 0.008

2020: 0.013

2021: 0.011

The electricity consumption indicators show a decrease compared to the previous year due to the increase in production.

Natural gas: MWh/number of machines manufactured

2019: 0.49

2020: 0.67

2021: 0.57

Fuels: MWh/number of machines manufactured

2020: 0.04

2021: 0.06

In the case of natural gas, a decrease is also reflected due to increased production.

In the case of fuel consumption, the indicator increases due to the recovery of mobility in 2021.

RAW MATERIALS

The main raw materials consumed are shown below.

Metal raw materials (t)	2019	2020	2021
Cast iron	250	275	**317**
Stainless steel	2,364	1,673	**1,956**
Steel	1,930	1,084	**1,929**
Aluminium	94	160	**296**
Copper	1.7	1.9	**2**
TOTAL	**4,639.7**	**3,193.9**	**4,500**

Table 7.1.5. Consumption of Metal Raw Materials[9]

Raw Materials Paint (kg)	2019	2020	2021
Primer paint	2,438	1,360	**1,538**
Yellow paint	1,500	749	**1,350**
Powder paint	16,490	13,200	**15,200**
Solvent	1,692	800	**1,068**
TOTAL	**22,120**	**16,109**	**19,156**

Table 7.1.6. Paint Consumption[10]

Material consumption indicators

Metal raw materials:

Tonnes of metal raw materials / number of machines manufactured

2019: 0.34

2020: 0.35

2021: 0.42

In 2021, the consumption of metallic materials has increased due to the mix of machines manufactured.

Painting:

Tonnes of paint purchased/number of machines manufactured

2019: 0.0015

2020: 0.0018

2021: 0.0017

The value of the paint consumption indicator for the year 2021 is due to the mix of machines manufactured.

[9] The data of the consumption of metal raw materials have been obtained from the company's ERP.

[10] The data of the paint consumption have been obtained from the company's ERP.

7.2. WASTE GENERATION

The amounts[11] and types of waste generated over the last three years are listed below.

	2019		2020		2021		
Type of waste and hazard rating[12]	**G1**	**G2**	**G1**	**G2**	**G1**	**G2**	**Treatment[13]**
Cast iron and steel (t) (NH)	947.25	-	883.59	-	896.13	-	Valorisation
Copper (t) (NH)	3.02	-	1.20	-	2.20	-	Valorisation
Aluminium (t) (NH)	2.11	-	1.86	-	1.54	-	Valorisation
Stainless steel (t) (NH)	345.01	-	170.61	-	174.61	-	Valorisation
Powder from the laser (t) (NH)	0.17	-	0.50	-	0.55	-	Disposal
Batteries (t) (H)	0.06	-	0.11	-	0.31	-	Valorisation
Fluorescent tubes (t) (H)	0.07	-	0.04	-	0.11	-	Valorisation
Paper and cardboard (t) (NH)	35.73	33.31	22.86	27.58	31.33	28.75	Valorisation
Toners (t) (NH)	0.05	-	0.06	-	0.01	-	Valorisation
General factory waste (t) (NH)	42.82	21.60	20.46	12.46	34.16	14.37	Disposal
Hydraulic fluids (t) (H)	1.50	-	1.71	-	1.62	-	Valorisation
Drums that have contained hazardous substances (t) (P)	1.58	0.1	1.80	-	0.69	0.15	Valorisation
Airbrush and absorbent paint filters (t) (H)	1.48	-	1.14	-	0.95	-	Disposal
Powder paint (t)(H)	9.98	-	5.30	-	7.98	-	Disposal

[11] The amounts of waste shown are those declared in the Waste Statements and they come from the waste output control record.

[12] The hazard is indicated in accordance with the European Waste Catalogue with the initials H: hazardous and NH: not hazardous.

[13] In accordance with the data from the waste statements.

	2019		2020		2021		
Type of waste and hazard rating[12]	**G1**	**G2**	**G1**	**G2**	**G1**	**G2**	**Treatment[13]**
Wood remains (t) (H)	82.62[14]	64.26	32.55[15]	50.49	38.37 [16]	44.08	Valorisation
Solvent (t)(H)	1.48	-	1.20	-	0.75	-	Disposal
Electric motors (t) (NH)	1.61	-	0.19	-	0.59	-	Valorisation
Rubble from rehabilitating industrial buildings (t) (NH)	49.10	-	30.26	-	22.95	-	Valorisation
I.T. and electrical material (t) (NH)	0.30	-	0.53	-	0.82	-	Valorisation
Degreasing liquids (t) (H)	13.64	-	15.98	-	18.10	-	Disposal
Traction batteries (t) (H)	0.16	-	0.16	-	0.31	-	Valorisation
Aerosols (t) (H)	0.01	-	0.19	-	0.11	-	Valorisation
Glass (t) (NP)	-	-	-	-	8.20	-	Valorisation
Spent activated carbon (t) (NP)	-	-	-	-	0.75	-	Disposal
TOTAL (t)	**1,539.77**	**119.27**	**1,192.30**	**90.53**	**1,243.14**	**87.35**	

Table 7.2.1 Waste generated at GIRBAU

[14] In 2019 a total of 41.80 tonnes of timber (corresponding to square wooden struts) have been allocated as a by-product for a third party to make pallets.

[15] In 2020 a total of 42.54 tonnes of timber (corresponding to square wooden struts) have been allocated as a by-product for a third party to make pallets.

[16] In 2021 a total of 58.58 tonnes of timber (corresponding to square wooden struts) have been allocated as a by-product for a third party to make pallets.

All waste generated in GIRBAU. is treated by waste managers authorized by the Agència de Residus de la Generalitat de Catalunya (Waste Board).

In the case of cardboard, it should be highlighted that GIRBAU reuses this material internally thanks to different points set up for its collection at both the G1 and G2 factories.

Continuing with 2019 initiative, a total of 58.54 tonnes of square wooden struts coming from the pallets used to transport sheet metal have been treated as a by-product enabling the use of this material by a third party that uses them as raw material for the reconstruction of pallets.

Waste indicators

% Hazardous waste, % Non-hazardous waste

2019:

Hazardous waste: 30.06 t →1.80%

Non-hazardous waste: 1,628.98 t →98.20%

2020:

Hazardous waste: 27.66 t → 2.32%

Non-hazardous waste: 1,164.67 t → 97.68%

2021:

Hazardous waste: 31.08 t → 2.34 %

Non-hazardous waste: 1,299.41 t → 97.66 %

% waste not reused, % waste reused

2019:

Not reused: 92,68 t → 5,59%

Reused: 1,566.36 t →94.41%

2020:

Not reused: 46.64 t → 3.9 %

Reused: 1,145.69 t → 96.1%

2021

Not reused: 77,61 t → 5,83%

Reused: 1,252.88 t → 94.17 %

The total production of waste has increased by 37% in absolute value (1330.49 in 2021 compared to 1,282.86 in 2020).

The percentage of hazardous waste has increased slightly due to the increase of water with dye residues from intensive tests performed on the new products being developed, dealt with using the same system as the water from the degreasing process.

Thanks to the recovery of production and efficiency, the indicators of generation, waste recovery and ratios per machine produced in 2021 are already very similar to those of 2019

Kg of metal waste/number of machines manufactured

2019: 96.58

2020: 116.76

2021: 124.39

Kg of aerographic paint filter waste/number of machines manufactured

2019: 0.11

2020: 0.13

2021: 0.09

Kg of powder painting waste/number of machines manufactured

2019: 0.74

2020: 0.59

2021: 0.75

Kg of solvent waste/number of machines manufactured

2019: 0.11

2020: 0.13

2021: 0.07

Indicators for the generation of metal waste and powder paint waste have increased. Solvent and filter residues have decreased. These results are attributed to the mix of machines manufactured. In the manufacture of high-capacity machines, thicker sheets are used and the scrap destined for waste weighs less.

7.3. ATMOSPHERIC EMISSIONS

GIRBAU has a total of 36 sources of emissions into the external atmosphere, 20 located in G1 and 13 in G2.

Of the 20 sources of emission in G1, 4 correspond to industrial processes and the remaining 16 are from natural gas combustion. In this last group, a total of 9 are affected by Spanish Thermal Building Regulations (RITE-Reglamento de Instalaciones Térmicas en los Edificios) and are not considered industrial.

In the case of the G2 factory, the 13 existing points are natural gas combustion, and only 2 of them are considered to be industrial, since the others are all affected by the Thermal Building Regulations (RITE).

GIRBAU has the corresponding record books for these points and controls them in accordance with the legislation in force.

The main direct atmospheric emissions derive from the combustion of natural gas for heating and fuels used by the vehicle fleet. They are set out in the following tables:

	2019		2020		2021	
	G1	G2	G1	G2	G1	G2
GHG emissions (t eq CO_2)[17](scope 1)	807.30	392.80	683.20	426.73	805.78	443.48
Total t CO_2 eq (scope 1)	1,200.10		1,109.93		1,249.26	
NOx emissions (t NOx)[18]	0.61	0.29	0.51	0.32	0.54	0.30
Total t NOx	0.90		0.83		0.84	
PM emissions (t PM)[15]	0.0032	0.0016	0.0027	0.0017	0.0029	0.0016
Total t PM	0.0047		0.0044		0.0045	

Table 7.3.1. Direct emissions resulting from the combustion of natural gas

[17] In 2021 the calculation of GHG emissions has been made in accordance with the GHG protocol and the DEFRA 2021 emission factor has been taken into account. CO_2 emissions from fluorinated gases are in 2021: 54,06 teq. CO_2 (28.72 kg), in 2020: 27,40 teq. CO_2 (15.5 kg) and in 2019: 28,5 teq. CO_2 (15.5 kg). For the calculation, the emission factors *Intergovernmental Panel on Climate Change (IPCC) Fourth Assessment Report (AR4) over a 100-year period* and own calculations based on the composition of *GWP of the IPCC Fourth Assessment Report (AR4) over a 100-year period* have been taken into account.

[18] Estimated values for 2021 considering the pollutants emission factors emitted to the atmosphere in 2021 by the Directorate-general for energy and Climate Change of the Government of the Balearic Islands: 38 g NOx /GJ and 0,2 g Particles/GJ.

	2020	2021
Diesel GEH emissions (t eq CO_2)[19] (scope 1)	99.77	147.77
SO_2 emissions (t SOx) [20]	0.00006	0.0007
NOx emissions (t NOx)[18]	0.04	0.65
PM emissions (t PM)[18]	0.0001	0.13

Table 7.3.2 Direct emissions resulting from the vehicle fleet diesel consumption.

	2020	2021
Petrol GEH emissions (t eq CO_2) [21] (scope 1)	13.37	21.84
SO_2 emissions (t SOx)[20]	0.0005	0.0001
NOx emissions (t NOx)[20]	0.4	0.06
PM emissions (t PM)[20]	0.08	0.0002

Table 7.3.3 Direct emissions resulting from the vehicle fleet petrol consumption.

[19] The calculation of GHG emissions has been carried out in accordance with the GHG protocol and considering the DEFRA emission factors for the year 2021 and the Catalan Office of Climate Change Guidance for 2020.

[20] Estimated values considering the pollutants emission factors emitted to the atmosphere in 2021 by the Directorate-general for energy and Climate Change of the Government of the Balearic Islands: 0.015 g SO_2 /kg fuel, 12.96 g NOx /Kg fuel, 2.64 g Particles / kg fuel.

[21] Estimated values considering the pollutants emission factors emitted to the atmosphere in 2021 by the Directorate-general for energy and Climate Change of the Government of the Balearic Islands: 0.015 g SO_2 /kg fuel, 8.73 g NOx /Kg fuel, 0.03 g Particles / kg fuel.

In addition, indirect atmospheric emissions resulting from the consumption of electricity need to be taken into consideration.

	2019		2020		2021	
	G1	G2	G1	G2	G1	G2
Power supply GEH emissions (t eq CO_2)[22] (scope 2)[23]	665	188.72	338.94	120.54	356.54	119.52
Total t CO_2 eq (scope 2)	853.72		459.48		476.07	
Nox emissions (t NOx)[24]	3.86	1.15	2.23	0.79	1.38	0.46
Total t NOx	5.01		3.03		1.84	
SOx emissions (t SOx)	0.07	0.02	1.37	0.49	1.21	0.41
Total t SOx	3.07		1.86		1.62	
PM emissions (t PM)[18]	0.07	0.02	0.05	0.02	0.03	0.01
Total t PM	0.09		0.07		0.04	

Table 7.3.2. Indirect atmospheric emissions resulting from the consumption of electricity

GEH emission indicators

Total GHG emissions:

tCO_2 /No. of machines

2019: 0,15 (natural gas, refrigerant gases and electricity)

2020: 0,19 (natural gas, fuels, refrigerant gases and electricity)

2021: 0,18 (natural gas, fuels, refrigerant gases and electricity)

[22] For calculating GHG emissions in 2019 and 2020, the Guide for greenhouse gas emission calculation established by the Catalan Office for Climate Change has been used (version April 2021) The electricity mix from Foener provider has been taken into account: 0.21 kg CO2/kWh in 2020 and 0.28 kg CO2/kWh in 2019. For 2021, emissions have been calculated according to the GHG Protocol. The electricity mix of the electricity trader Total Energías Electricidad y Gas España has been taken into account: 0,19 Kg CO2/kWh.

[24] For the calculation of NOx, SOx and PM emissions for the year 2021, the emission factors for pollutants emitted into the atmosphere 2021 of the Directorate General for Energy and Climate Change of the Government of the Balearic Islands have been taken into account: 1.027 g NOx/kWh, 09036 g SOx/kWh and 0.0202 g Particles/kWh.

Direct CO_2 emissions indicators are unchanged from the previous year. Although in absolute terms emissions have increased due to greater mobility and more natural gas consumption, in relative terms they have remained the same as more machines have also been produced.

With regard to indirect emissions, the indicator decreases due to the change to a supply company with lower CO_2 emissions.

Source	Emission level[25]			Legal limit (mgC/Nm^3)
Source 24 Painting of metal parts (Registry nº 16854)	COT	56 mgC/Nm^3	0.477 KgC/h	100
Source 25 Painting of metal parts (Registry No. 16855)	COT	57 mgC/Nm^3	0.483 KgC/h	100
Source 22 Plate Satinating (Registry nº 12289)	PST	<3 mg/Nm^3	0.019 Kg/h	150
Source 23 Ring Satinating (Registry nº12285)	PST	4 mg/Nm^3	<0.008 Kg/h	150

Table 7.3.3. G1 Industrial Processes Emission Sources – painting and suction chamber

[25] Source: DEKRA emission control report ref. 00198_002-EA_43172ATM01_anA01.

7.4 ENVIRONMENTAL ASPECTS OF OUR MACHINES

GIRBAU is aware of the environmental impact in the phase during which their machines are in use, which is why the fundamental premise of the organisation is the continuous improvement of the machinery that it manufactures, seeking mainly energy efficiency and the reduction of water consumption.

In this respect it should be noted that GIRBAU meets the market's most demanding standards on an international level (e.g. the British WTL water consumption standard), which has made it a pioneer and a leader in its sector.

In the area of energy efficiency, it is in line with the guidelines being drafted by the technical commission, of which GIRBAU is also a part, for the energy labelling of washing machines.

With the aim of ensuring that the phase during which the machine is used is the most efficient from the environmental point of view, GIRBAU commissions the installation by carrying out training, either directly or via distributors or at the Girbau Experience Center, supported by the machine's user manual, where, among other things, instruction is given on how to proceed in the management of the waste once the machine reaches the end of its life cycle.

In this sense we should also highlight the creation of an open innovation platform for the laundry industry - GIRBAU LAB, fully operational as of this year and with three strategic core work elements:

- Digital transformation
- Sustainability and circularity
- People's health and well-being

In terms of sustainability and circularity, its activity focuses on offering sustainable laundry solutions and transforming the traditional industrial business into more circular solutions that are essential in order to minimise the machines' environmental footprint during their life-cycle.

In this sense its goals are:

- To save water and energy in products and processes, and create more efficient systems.
- The use and generation of alternative energy sources.
- Treatment and re-use of waste in the production process.
- New business models and solutions that contribute to a more efficient use of industrial laundry facilities and machinery.
- New solutions and business models that promote the collaborative economy in which users share resources and contribute to extending the lifespan of products.
- Alternative technologies for laundering that contribute to developing more sustainable solutions: infrared, ultrasound, artificial vision and others.

8. LEGAL COMPLIANCE

GIRBAU declares that it complies with the environmental legislation applicable to its facilities. However, it should be borne in mind that GIRBAU is currently awaiting corrections to the anomalies in the latest inspections of the thermal installations in office buildings.

The main regulations applicable are listed below:

- Law 20/2009 and subsequent amendments, concerning environmental licensing, Appendix II. 2. exempt from periodical controls as a result of having the EMAS.
- Registration in the Industrial Registry.
- Low and high voltage installation in accordance with R.D. 337/2014 of 9 May and RD 842/02 of 2 August respectively.
- R.D. 656/2017, approving the regulations concerning storage of chemical products, and their Complementary Instructions. Legalisation of cylinders of compressed gases (APQ 05) and the flammable warehouse (APQ 01) on 15.11.2000 with dossiers No. 2434 and 2435 respectively.
- R.D. 849/1986 Regulations concerning the Hydraulic Public Domain, and R.D.L.1/2001 approving the Water Law. It has the concession for both wells dated 26.07.2001 by the ACA (Well 1-753) and dated 23.01.2001 by the Directorate General of Mines (Western factory well).
- Permit for discharging wastewater generated, from Osona District Council, for both factories in accordance with the maximum admissible limits of the discharge characteristics of Annex II of Decree 130/2003, of 13 May, approving the regulation of public sewerage services.
- R.D. 110/2015, about waste from electrical and electronic devices. Declaration of producer of waste Products from Electrical and Electronic devices RAEE 28-02-06, registered at the Ministry of Industry, Tourism and Commerce (*Ministeri d'Industria, Turisme i Comerç*) as manufacturer nº 3533 dated 9th November 2010.
- R.D.919/2006, approving the technical regulations and those for the distribution and use of gas fuels their complementary technical instructions ICG 01 to 11. Gasification station ITC-MIE-AP 10.
- R.D. 244/2019, of 5 April, regulating the administrative, technical and economic conditions for the self-consumption of electricity (RAC- 16000088 and RITSIC registration number: BT -14-1145630-Q).

9. INFORMATION, COMMUNICATION AND AWARENESS-RAISING

With the aim of maintaining an open channel on an ongoing basis for any kind of questions or information about GIRBAU's relationship with the environment, the managing director of Girbau is responsible for the company's dialogue with all interested parties on this topic.

The General Manager will also ensure that this statement is delivered to Vic Town Council, the Generalitat and to all those who may require it.

Where deemed appropriate, requests made by external interested parties will be considered when setting improvement goals.

10. ENVIRONMENTAL CHECK

GIRBAU has the EMAS-ES-CAT-00152 record and validates the Environmental Statement on an annual basis. The details of the Statement are updated annually and are available on GIRBAU's website: www.girbau.com

This environmental statement is the first validation of changes in respect of the content of previous Environmental Statements.

Checked by:

General Manager of Girbau, S.A.:

Mr. Pere Girbau i Pous