CIRCULAR ECONOMY IN INDUSTRY

BEST PRACTICES

FIESP
Strong Industry » Strong Country

CNI
Brazilian National Confederation of Industry

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Presentantion

Building a more resilient and sustainable economy necessarily involves transforming the way we produce, consume, and manage resources.

In this context, the circular economy breaks away from the linear logic of extraction, use, and disposal, replacing it with a model that prioritizes reuse, innovation, and the regeneration of resources and ecosystems.

With the aim of identifying and showcasing solutions developed by the industrial sector in Latin America and the Caribbean, the National Confederation of Industry (CNI) and the Federation of Industries of the State of São Paulo (FIESP) launched a Public Call for Circular Economy Practices.

This e-book, the result of this collective effort, brings together concrete initiatives that demonstrate how companies of different sizes and sectors are redesigning processes, products, and strategies—generating environmental, economic, and social benefits. More than just a catalog of good practices, this publication is a call to action. We hope the cases presented here will spark new collaborations and inspire business leaders to move forward in the transition toward more circular models.

We believe that the industry's transformative power will be key to building a more prosperous and balanced future for all. We wish you an enriching and inspiring read.

Antonio Ricardo Alvarez Alban
President of CNI

Josué Gomes da Silva
President of FIESP

Introduction

Introduction

The circular economy in the Brazilian industrial sector is at a promising stage of development, with a growing number of companies adopting sustainable practices. However, there are still challenges to be overcome for the circular model to be consolidated on a large scale.

In a recent survey by the National Confederation of Industry (CNI) and the Circular Economy Research Center at the University of São Paulo (USP), 85% of industries in Brazil develop at least one circular economy practice.

FIESP launched, in 2024, in partnership with the CNI, a public call aiming to identify these practices already adopted by the Brazilian industrial sector, but also for Latin American countries, listing the different topics covered by the circular economy, in accordance, including the provisions of the recent family of ISO 59,000 standards, such as:

- **design circular;**
- **implementation of new business models;**
- **simbiose industrial;**
- **innovative technologies for circular economy;**
- **energy efficiency;**
- **prolonging the useful life of the product;**
- **efficiency in the use of resources;**
- **efficiency in the use of utilities;**
- **resource value recovery.**

The results of the call were excellent: 275 projects registered, from the most varied industrial segments, from 7 Latin American countries, companies of all sizes, ranging from recycling actions to technological innovations and new business models.

For an adequate evaluation of the cases, experts of renowned knowledge were invited from different institutions, external to the entities, who considered the following criteria for classifying the cases:

I. Compliance with the Regulations;

II. Potential for replicability and scalability;

III. Impact of circular practice;

IV. Innovative nature of the practice;

V. Size of the problem to be solved.

The classified cases can be accessed on the page https://economiacircular.fiesp.com.br/melhores-praticas.html

In this e-book, we present a selection of case studies, grouped by industrial sector, to illustrate good practices that are already being implemented—demonstrating growing awareness of the importance of the circular economy.

Despite this progress, significant challenges remain in the implementation of circular practices. These include the lack of adequate infrastructure, high investment costs, shortage of skilled labor, and the need for technological innovation, among others.

Brazil holds enormous potential to lead in the circular economy. With the implementation of appropriate public policies, investments in infrastructure and innovation, and the collaboration of all sectors of society, the country can position itself as a global leader in this field.

We hope the examples presented here will serve as inspiration for other companies to recognize the many opportunities that come with adopting circular practices—including the creation of new jobs, the gradual reduction of dependence on raw materials, and increased competitiveness across the industrial sector.

INDUSTRIAL SEGMENTS

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- TYPCAL

2. AUTOMOTIVE

- BORKAR
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- TOYOTA DO Brazil
- VW TRUCKS

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- CAMACOL
- CENCOSUD
- ECOPETROL
- IVECO
- MAIGOTEX
- MONDELEZ
- SCANCONTROLS

Selected Cases
Food

Country	Company name	Industry	
Brazil	Cargill Agrícola SA	Manufacture of food products	LEARN MORE

FOOD

Circular Economy Program - performs

Improper disposal of cooking oil is a serious sanitation problem. In the frying process, the food absorbs the oil and releases fat, which can cause clogging of the domestic sanitation network and eventually obstruct the public sewage network. The oil can also be thrown directly into the rivers, creating an organic layer that impairs the oxygenation of the water.

Cargill, through the Liza brand and its program, provides voluntary delivery points (PEV) and promotes environmental education actions. The collected oil is destined to partner companies for the production of biodiesel, transforming what would be garbage into renewable fuel.

Currently, the program has more than 7,500 collection points in 23 states, has recycled more than 14 million liters of oil. The environmental education program is present in more than 600 schools. With the 14 million liters collected, the program contributed to the preservation of more than 350 billion liters of water and avoided the emission of 157 thousand tons of CO_2.

Press Office

Country	Company name	Industry	
Brazil	Nestlé Brazil Ltda.	Manufacturing of food products	LEARN MORE

FOOD

First Brazilian chocolate with 100% recycled plastic packaging

The concept of circularity is based on the reuse and recycling of goods, materials, and services, with the goal of extending their life cycle and avoiding waste. With this in mind, the Kit Kat project embraces circularity from the very beginning, starting with the sourcing of sustainable cocoa. This approach aims to improve the quality of life of cocoa farmers while supporting the regenerative cultivation of this native Brazilian fruit. At the other end of the chain, in post-consumer stages, Kit Kat promotes a second life for plastic—the kind we place in our household recycling bins every day—by wrapping its chocolate in packaging that was once something else. This concept, which connects both ends of the cycle, offers a tangible way to communicate to consumers and stakeholders the importance of collaborative action in fostering a robust, continuous circular economy—one that delivers benefits not only to the planet but to everyone involved in the process.

Country	Company name	Industry	
Brazil	Mushbites Alimentos Ltda.	Manufacturing of food products	LEARN MORE

FOOD

Fermentation of mycelium (fungi) through circular economy

Typcal is a Brazilian foodtech founded entirely with private capital in 2021, with the mission of offering healthier food ingredients for people and more sustainable solutions for the planet. To achieve this, Typcal developed a proprietary technology for producing mycelium as a food ingredient (B2B), becoming the first in Latin America to do so. The company now holds the fastest fermentation process in the world, outperforming international players in the US, Europe, and Asia. Its fermentation process is rooted in circular economy principles, using by-products from large food industries—such as breweries, bakeries, and dairy producers—as the fermentation substrate. Typcal has secured key partnerships with major multinational players, including Ambev. The resulting mycelium-based protein comes in two formats—powder and wet—and can be used in a wide range of products, from meat alternatives to snacks and bread, enhancing their nutritional value. Typcal is capable of producing 7,000 times more protein per square meter than beef and 6,000 times more than soy, while emitting 99% less CO_2 than beef and 46% less than soy, making it the most sustainable protein alternative on the market.

eat typcal

Press Office

Selected Cases
Automotive

Country	Company name	Industry	
Brazil	Borkar Tapetes Automotivos Ltda.	Manufacture of rubber products and plastic material	LEARN MORE

AUTOMOTIVE

Carpet with History: Smart reuse and sustainable value in the automotive chain

Carpet with history has transformed waste from the automotive industry into products by promoting the circular economy. Borkar, in partnership with Toyota, started the reuse of the previously co-processed discarded PVC sealant, reducing CO2 emissions and optimizing production processes. Launched in August 2021, the project faced challenges such as quality and logistics agreements, but was successful in integrating this waste into the manufacture of automotive carpets. The initiative ensured the sustainability and quality of the products, as well as expanding to other automakers, such as GM and Hyundai, who are now participating in the practice, as well as other suppliers of the automotive chain that generate waste from PVC chips. The practice generated the possibility of expansion for Argentina, Borkar is positioning itself as a pioneer in the implementation of sustainable practices in the sector, contributing to the SDGs (9 - 11 - 12 - 13 and 17) and inspiring other industries to adopt circular economy models.

To date, more than 200 tons of materials were received and reprocessed, thus avoiding the emission of approximately 400 tons of greenhouse gases (GHG).

BORKAR

Country	Company name	Industry	
Brazil	Hyundai Motor Brazil	Manufacture of motor vehicles, trailers and vehicle bodies	LEARN MORE

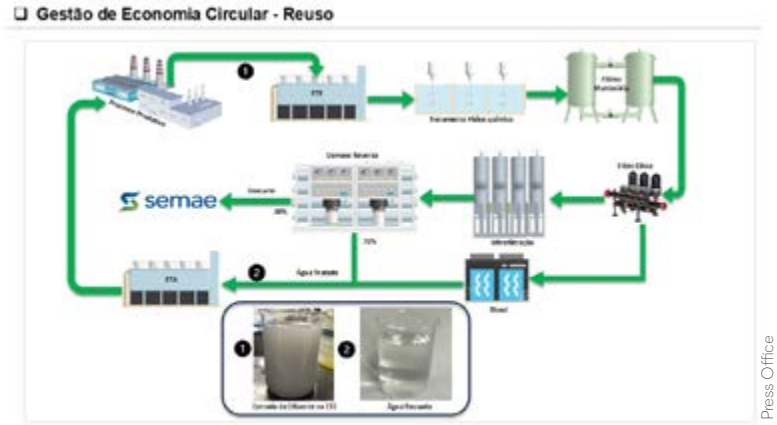
AUTOMOTIVE

Practice of reuse of water and reuse of other wastewater treatment lines

The recovery of water resources and the reuse of effluents are essential for industrial sustainability in Brazil, especially in the face of water scarcity and environmental requirements. Hyundai Motor Brazil adopts advanced technologies, such as ultrafiltration and reverse osmosis, to recover water from industrial effluents, reducing the catchment of the Piracicaba River and promoting circular reuse. The benefits include lower effluent disposal, improved sustainability indicators and increased operational efficiency. The company stands out as a reference when integrating water reuse and mass balance, aligning with environmental standards and cost optimization.

This water management model has generated economic and environmental value, besides positioning itself as a competitive differential in the Brazilian industrial market.

Since 2017, Hyundai has been harvesting fruit both from an environmental and economic point of view. From this period until the first half of 2024, the company has already achieved a cost reduction of 10 million reais, as a direct result of the optimization in water consumption and the reuse of industrial effluents. The reuse in 2023 totaled 72,884 m^3 of treated and reused water in the production process.



Press Office

Country	Company name	Industry	
Brazil	Toyota do Brazil	Manufacture of motor vehicles, trailers and bodies	LEARN MORE

AUTOMOTIVE

Toyota do Brasil – Circular Economy: Reimagining the Sustainable Future

Since its inception, Toyota has embedded in its DNA a culture of continuously improving its products and processes. The Toyota Production System (TPS) is a clear example of this and is widely admired and studied around the world. This culture of improvement also extends to sustainability initiatives, such as the development of kaizens aimed at environmental enhancements. Waste generation is a relevant indicator in this context. Although Brazil has made progress with its National Solid Waste Policy (Law No. 12.305/2010), there is still much to be done. Toyota do Brasil follows ESG principles and promotes circular economy initiatives, such as the recirculation of over 230 tons of waste per year, generating both financial and social gains. The goal is to reincorporate waste into the industrial process, using it in automotive parts or upcycled products with social impact—thus contributing to waste reduction, decarbonization, and harmony with nature. Waste management is a strategic pillar in Toyota's ESG agenda.

Press Office

Country	Company name	Industry	
Brazil	Volkswagen Caminhões e Ônibus	Manufacture of motor vehicles, trailers and vehicle bodies	LEARN MORE

AUTOMOTIVE

Automotive circularity, the way to unlink the growth of Volkswagen Trucks and Buses business from resource use

To “unlink VWCO’s growth from resource use”, the company: Reduces consumption and waste; incorporates recycled, reusable, renewable materials; optimizes vehicle life; develops business models. Highlights: 1) Development of the 1st tank of ARLA32 Brazilian, composed of 30% ethanol polyethylene. The tank has been installed on heavy trucks since 2023. In 2024, it avoided 1,150 tons of CO_2 and reduced the consumption of electricity in tank production by 20%, reducing operating costs. 2) REMANUFACTURE of automotive components: Volks Greenline is a business model to extend the life of components due to the recovery of their functions and quality. It is carried out by partnerships between dealers and suppliers, encouraging the customer to deliver damaged parts. The supplier carries out the collection, repair and quality tests on the parts. It has 85 components, including motors. Components can cost up to 30% less than new ones.

Caminhões e Ônibus

Press Office

Selected Cases
Pulp and Paper

Country	Company name	Industry	
Brazil	Klabin S.A.	Manufacture of pulp, paper and paper products	LEARN MORE

PULP AND PAPER

Klabin Transforma Território Circular Program: development of innovative social technology to promote the circular economy in 7 municipalities in Paraná

Klabin has the largest installed capacity for recycling corrugated cardboard scrap in Brazil, with facilities located in the Southeast and Northeast regions. Its industrial plants promote the circularity of post-consumer paper waste, working with suppliers from several states. In addition to being the country's largest producer of packaging paper, Klabin launched the Klabin Transforma Território Circular (Klabin Transforms – Circular Territory) program in 2014 to support municipalities in Paraná with solid waste management. The program strengthens selective collection, reverse logistics, and social inclusion by professionalizing cooperative workers and assisting in the creation of regulatory frameworks. Through environmental education initiatives and the distribution of reusable bags, it engages the public and improves the quality of recyclable materials. Between 2018 and 2024, it reached 168,000 people in seven cities, diverted 14,000 tons of waste from landfills, and involved 91 recycling professionals.

Klabin

Press Office

Country	Company name	Industry	
Brazil	Suzano S.A.	Manufacture of pulp, paper and paper products	LEARN MORE

PULP AND PAPER

Suzano's journey to a circular economy in the textile sector

Suzano has stood out in the development of bioproducts that contribute to the decarbonization of sectors such as textiles. One of its initiatives is the partnership with Finnish startup Spinnova, focused on the production of sustainable textile fibers from Biofiber®, Suzano's microfibrilated cellulose (MFC), an innovative bioproduct derived from eucalyptus kraft pulp.

The results of the collaboration between Suzano and Spinnova reflect disruptive innovation in the textile industry. SPINNOVA® fiber presents itself as a circular solution for the sector, offering a reduced carbon footprint and lower water consumption compared to other conventional fibers, such as cotton and polyester, according to studies previously released by Spinnova. In addition, its production process does not generate waste or microplastics.

With a strategic vision, Suzano develops biotechnological solutions that promote circularity from the bioeconomy.

Country	Company name	Industry	
Brazil	Veracel Celulose S.A.	Manufacture of pulp, paper and paper products	LEARN MORE

PULP AND PAPER

Zero process waste to landfill

Veracel was the first pulp mill in Brazil, in 2005, to start manufacturing operations with a unit that produces agricultural products ready to receive solid waste from the pulp manufacturing process and convert them into fertilizers and soil acidity correctives. However, in 2011, the recycling rate of solid waste in the process was about 70% and the generation was 55 kg of waste per ton of cellulose (kg/ADT), on a dry basis. Consequently, the only cell in the industrial landfill had its useful volume to receive almost depleted waste. This was a very challenging scenario that motivated the company, in 2012, to develop a very robust action plan to increase recycling and seek an extremely challenging long-term goal of reducing the amount of process waste sent to landfill by 2025 to zero. In 2019, we achieved a recycling rate of process waste of 99%. The actions to zero the shipment of waste to the landfill continue.

Press Office

Selected Cases
Household Appliances/ Electronics

Country	Company name	Industry	
Brazil	Electrolux do Brazil S.A.	Manufacture of machinery and equipment	LEARN MORE

HOUSEHOLD APPLIANCES/ELECTRONICS

Electrolux ECOPLUS: Selection of the most efficient products that facilitate and transform the lives of consumers

Our sustainability framework — For the Better 2030 — defines how we work to achieve our goals in Better Company, Better Solutions and Better Living, in addition to our Climate Goals. The framework, which supports the UN Sustainable Development Goals (SDGs), includes our most important sustainability topics and helps us pursue our purpose of transforming life for the better. One of the goals of this strategy is to inspire better habits and guide our consumers toward more sustainable practices in home care. ECOPLUS selection plays a key role in achieving this goal. Comprised of 71 products divided into six categories, it is the most efficient in the group. These products were relevant to the growth of the company and its ESG strategy, accounting for 11% of the total units sold in 2024, 26% of gross revenues in the same period and contributing to a change of behavior focused on consumer culture.

Press Office

Country	Company name	Industry	
Brazil	Flex	Manufacture of computer equipment, electronic and optical products	LEARN MORE

HOUSEHOLD APPLIANCES/ELECTRONICS

Flex Brazil: A closed-loop operation, uniting the human being, the environment and technology.

Flex is a global manufacturing and engineering services company that provides design, manufacturing and logistics solutions for a variety of industries. In Brazil, Flex has operations in the cities of Sorocaba, Manaus and Jaguariúna.

+12 years ago, the Flex team in Sorocaba invested in creating a circular economy ecosystem, designed to maximize and generate value through electronic waste. This ecosystem uses technologies from the 4ª Industrial Revolution to transform electronic waste and reintroduce reused materials into the supply chain. The processed electronic materials are basically the same as those used in new equipment. Post-consumer products are repaired and reused, parts are extracted and materials are recycled to the quality level of virgin materials. Since 2018, this plant has been certified as zero waste, which transforms industrial and post-consumer electronic waste into new parts for new products.

Country	Company name	Industry	
Brazil	Indústria Fox Economia Circular Ltda.	Collection, treatment and disposal of waste; material recovery	LEARN MORE

HOUSEHOLD APPLIANCES/ELECTRONICS

TudoBônus – an innovative sustainable and circular consumption model for remanufactured household appliances

The TudoBônus digital platform helps integrate the circular model of product life extension, promoting the reuse and remanufacturing of products that would otherwise be discarded, at prices 30% to 50% lower than new ones. Among the implemented actions, Fox Industry remanufactures the products sold through TudoBônus, including disassembly, parts replacement, quality testing, and reassembly. The platform also offers a reverse logistics system, enabling the collection of obsolete appliances at the time of delivery of remanufactured ones. Consumers who donate their old products receive a bonus or discount, encouraging responsible disposal. The initiative has resulted in the saving of 3,200 tons of raw materials and a 70% reduction in carbon footprint compared to manufacturing new appliances. The practice has also created over 110 direct jobs, promoting social inclusion and the development of technical skills.

Indústria Fox
Economia Circular

Press Office

Country	Company name	Industry	
Brazil	Lorenzetti S.A. Indústrias Brazileiras Eletrometalúrgicas	Metallurgy	LEARN MORE

HOUSEHOLD APPLIANCES/ELECTRONICS

Circular Economy and LorenShower

Lorenzetti S.A. has consolidated its circular economy strategy, reducing dependence on external inputs and improving production processes. The LorenShower product exemplifies this innovation by being 90.8% recyclable after consumption and collapsible in less than 60 seconds.

The company intensified the reuse of non-compliant materials, previously discarded, mitigating the shortage of polymers and packaging. The improvement of recycling systems resulted in cost and CO_2 emissions reduction, and the need for transportation of waste. The reprocessing of PP, PVC and ABS strengthened eco-efficiency and improved resource and labor management.

By minimizing the consumption of virgin raw materials, Lorenzetti not only preserved natural resources, but also reinforced its commitment to sustainability, turning adversity into opportunities.

LORENZETTI

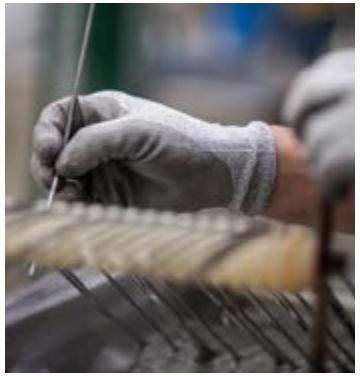
Press Office

Country	Company name	Industry	
Brazil	HP Brazil Indústria e Comércio de Equipamentos Eletrônicos Ltda.	Manufacture of computer equipment, electronic and optical products	LEARN MORE

HOUSEHOLD APPLIANCES/ELECTRONICS

HP Circularity Ecosystem

HP has adopted Circular Economy (CE) practices to reduce its environmental impact and maximize material reuse. Since 2012, the company has been recycling end-of-life products in Brazil, reintegrating them into the production process. One example is the Ink Tank printer, which contains 45% recycled plastic. In addition, HP uses renewable energy and maintains zero-waste processes in its factories. The inclusion of waste picker cooperatives in its ecosystem strengthens electronic waste collection, promotes social inclusion, and expands the program's reach. With a goal of reaching 75% circularity in products and packaging by 2030, HP drives initiatives that generate environmental, economic, and social benefits, while strengthening its market competitiveness and reputation.



Press Office

Selected Cases
Personal Hygiene, Perfumery and Cosmetics

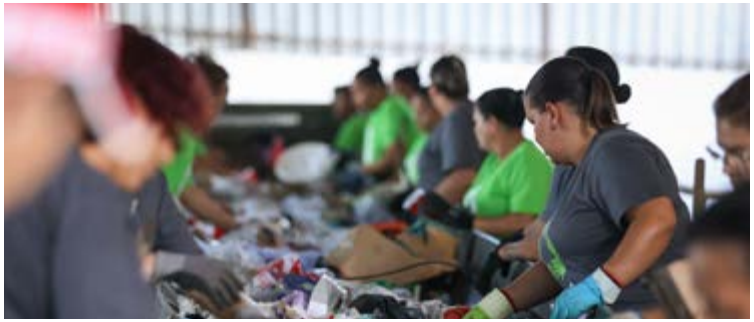
Country	Company name	Industry	
Brazil	Associação Brazileira das Indústrias de Higiene Pessoal, Perfumaria e Cosméticos - ABIHPEC	Representative entity of the industrial sector	LEARN MORE

PERSONAL HYGIENE, PERFUMERY AND COSMETICS

Structuring Reverse Logistics Program Mãos Pro Futuro

The Mãos Pro Futuro Program, since 2006, faces the challenge of solid waste management in Brazil with structural reverse logistics. It offers companies a complete solution for tracking and correct destination of packaging, promoting environmental conservation, circular economy and recycling. Serving about 200 companies from four sectors, the Program also supports the social and economic development of thousands of recyclable waste pickers. In 19 years of operation, it recovered more than 1 million tons of waste; it avoided emissions of more than 3.8 million tons of greenhouse gases (2013-2023); it invested more than 150 million reais in waste pickers' organizations; it was recognized by ECLAC-UN as a sustainability case; it is the largest structural reverse logistics program in the country, according to a survey by the Ministry of Environment and Climate Change (2023).

ABIHPEC
Associação Brasileira da Indústria de Higiene Pessoal, Perfumaria e Cosméticos



MÃOS PRO FUTURO
PROGRAMA DE LOGÍSTICA REVERSA

Press Office

Country	Company name	Industry	
Brazil	Assessa Indústria, Comércio e Exportação Ltda.	Chemical manufacturing	LEARN MORE

PERSONAL HYGIENE, PERFUMERY AND COSMETICS

Development of Cosmetic Ingredients Using Waste from the Juice Industry

The project was developed to create cosmetic ingredients from waste, with a strong focus on sustainability and socio-environmental responsibility. The foundation of the bioactive ingredient production lies in the use of sustainable extraction techniques, which led to significant results in the development of natural and effective cosmetic ingredients. One example is ZINBLOQ, an active compound derived from ginger waste, which protects the hair fiber from the harmful effects of ultraviolet radiation, helping to preserve a youthful hair appearance. In addition to the environmental benefits, the project fostered innovation in inland areas of the state of Rio de Janeiro, strengthening collaboration with research centers and stimulating economic development in remote regions. The adoption of Circular Economy and Bioeconomy principles was key to transforming industrial residues into high value-added inputs, promoting sustainability and meeting the global demand for eco-friendly cosmetic products.

Press Office

Country	Company name	Industry	
Brazil	Unilever Brazil Ltda.	Manufacture of various products	LEARN MORE

PERSONAL HYGIENE, PERFUMERY AND COSMETICS

Closing the Loop: The Recycled Post-Consumer Plastic Revolution in the Circular Economy

Unilever Brazil faces the challenge of plastic pollution and has set global targets for 2025, including 25% recycled plastic in packaging. The solution involves reduction, circularity, and partnerships, such as with Ecological Recycling, and adherence to the Global Plastic Treaty. As a result, the use of post-consumer recycled plastic (PCR) has already reached 38% by 2024 in Brazil. Between 2021 and 2024, more than 57,000 tons of virgin plastic were eliminated, avoiding 100,000 tons of CO_2 emissions. Many personal care products, such as shampoos, conditioners, and treatment creams, have started using PCR in their packaging. OMO, Cif, and Brilhante now have 100% recycled packaging; Comfort uses 100% PCR. Rexona roll-on deodorants innovated with the first 100% PCR cap in Brazil, and additionally, the brand launched the first actuator with 80% PCR inclusion in 2024. Hellmann's launched 100% recycled ketchup bottles in 2022 and mayonnaise packaging with 40% PET PCR in 2023, totaling 5.1 thousand tons per year of PCR by 2024.

Press Office

Selected Cases
Mining/Steel

Country	Company name	Industry
Brazil	Gerdau Aços Longos	Metallurgy

LEARN MORE

MINING/STEEL

Scrap management at Gerdau

Steel is fundamental in our daily lives and essential for a sustainable future, besides being 100% recyclable. Gerdau, Brazil's largest steel producer and recycler in Latin America, has the circular economy in its strategy, promoting sustainable practices, ranging from partnerships to increase scrap collection to support thousands of suckers spread throughout the locations where the company operates, and also promote education-related initiatives. Through these practices, which generate social and environmental benefits, Gerdau reinforces its commitment to sustainability.

Gerdau also implements sustainable and innovative actions such as the dismantling of offshore platforms, renovation of old fleet and partnerships with Senai and Prolata. These initiatives transform scrap metal into raw material, strengthen the circular economy, reduce environmental impacts and promote social inclusion. With a focus on innovation, scalability and replicability, practices contribute to a more efficient and sustainable industry.

GERDAU
O futuro se molda

Press Office

Country	Company name	Industry	
Brazil	Metso Brazil Indústria e Comércio Ltda.	Manufacture of machinery and equipment	LEARN MORE

MINING/STEEL

Crushing as Services

To meet the challenges mining companies face in their operations, such as meeting productivity and sustainability goals, Metso has created a business model. The concept crushing as a service assumes investments in equipment, labor, inventory, maintenance and management of the plant. The service is charged per ton produced and all these agreements are designed with the customer.

In addition, Metso uses equipment that consumes less energy and operates more efficiently, reducing environmental impact. Because they are mobile, these equipment reduce the need for trucks, which contributes to the reduction of the environmental footprint, and the plant structure can be reused, generating less waste. Waste generated during the process, such as parts and components, is returned to Metso's foundry in Sorocaba, where it is transformed into new materials, promoting circular economy. When the contracts are finished, the equipment is reformed and reused in new contracts, which reduces the need for new equipment production and, consequently, reduces CO_2 emissions associated with manufacturing.

Metso

Press Office

Country	Company name	Industry	
Brazil	Vale S.A.	Extraction of metal minerals	LEARN MORE

MINING/STEEL

Sustainable Suppressor: Circular economy in mining generating shared value

Vale faces the challenge of making its operations more sustainable and reducing dust emissions. As part of its environmental controls, it developed a dust suppressor in partnership with the Federal University of Espirito Santo. Sustainable Suppressor uses low recyclability PET bottles and plastics, resulting in a biodegradable, non-toxic resin. When applied on piles of ore, coal and unpaved access roads, it forms a protective layer that minimizes the dispersion of particles by the wind. The PET is acquired from associations of recyclable waste pickers, which raised the income of the participants by 56%. Since the beginning of the project, the volume of plastic collected has increased by 77% and more than 160 new selective collection points have been established. This model has reused more than 5 million plastic bottles, highlighting the application of the circular economy in the industrial sector to promote environmental and social solutions.

Press Office

Selected Cases
Chemical

Country	Company name	Industry	
Brazil	BASF S.A.	Manufacture of rubber products and plastic material	LEARN MORE

CHEMICAL

A Bucket turns into a Bucket

The project A Bucket turns into a Bucket is an initiative of Suvinil, a reference in decorative paints and that has been present for more than 60 years in Brazil, facilitating the journey of painting people and acting in a sustainable way.

The initiative aims to create a circular economy system with the purpose of collecting dirty buckets of paint from the Civil Construction so that waste works are removed and the packaging is intended for the plastic recycling company for processing into new buckets, which can be used by Suvinil itself and/or other industries. The action is a pioneer in the sector, and within BASF itself, because it is the only circular economy project that closes the complete cycle of matter.

Since the beginning of the project in 2021, Suvinil has reached the mark of 130.2 tons of recycled plastic, 58.5 tons of material reinserted in the plastic buckets production chain and 71.7 tons of material directed to other recycling routes.

Press Office

Country	Company name	Industry	
Brazil	Braskem S.A.	Chemical manufacturing	LEARN MORE

CHEMICAL

Cazoolo

Created by Braskem, Cazoolo is a circular packaging design lab aimed at fostering collective intelligence for the sustainable development of packaging. Cazoolo offers infrastructure to the production chain, including a prototyping workshop for the co-creation of new packaging and business solutions. The lab focuses on developing packaging that reduces environmental impact and aligns with design for recyclability, packaging system optimization, reusable packaging, refillable packaging and systems, and packaging redesign through a circular consumer journey.

CAZOOLO
empowered by Braskem

Press Office

Country	Company name	Industry	
Brazil	Lwart Soluções Ambientais Ltda.	Manufacture of coke, petroleum products and biofuels	LEARN MORE

CHEMICAL

Industrial Symbiosis: Rerefining of used or contaminated lubricating oil produces raw material for the formulation industry of new lubricants

The process developed by Lwart Environmental Solutions is a success case related to the circular economy, since the company removes from circulation a hazardous waste to the environment and human health and reinserts into the production chain. Rerefining, as is called recycling used or contaminated lubricating oil (OLUC), is an efficient eco-process that does not generate waste, and can be carried out endless times.

In addition to the environmental benefits, the industrial symbiosis promoted by Lwart, by providing the lubricant formulators industry with a high quality basic oil, guarantees a foreign exchange economy to the country since Brazil is not self-sufficient in oil refining. This means that an important portion of the basic oils of first refining come from the import. Therefore, the industrial symbiosis in this case meets a part of the national industry's need for supply, with a product resulting from an environmentally sound process.

LWART SOLUÇÕES AMBIENTAIS

Press Office

Country	Company name	Industry	
Brazil	Novo Nordisk Produção Farmacêutica do Brazil Ltda.	Manufacture of pharmochemical and pharmaceutical products	LEARN MORE

CHEMICAL

Water and Effluent Management at Novo Nordisk Site Montes Claros - MG: Capturing rainwater and harvesting sustainability

In 2023, the Novo Nordisk plant in Montes Claros began, in a pioneering way, to produce rain-water insulin! With the implementation of more than 3km rainwater harvesting networks in its buildings and warehouses, construction of a reservoir with capacity for 80 million liters, and development of an innovative purification system, it became the first pharmaceutical company in Latin America to produce drugs with rainwater, reducing consumption by 40% of the local concessionaire. We also treat all the effluent, cascading into multiple reuse, ensuring the circularity of this vital resource. And we e xpanded the project to more than 15 NGOs, empowering communities to collect rainwater, where more than 500mil liters have already been reused. Thus, we seek to ensure the sustainability of operations, support to millions of patients with diabetes, mitigating water scarcity, enabling nature to regenerate, and contributing to the development of the local community.

Country	Company name	Industry	
Brazil	Sindicato Nacional da Indústria do Rerrefino de Oleos Minerais	Entity representing the industrial sector	LEARN MORE

CHEMICAL

Maximization of natural resources - Re-refining of lubricating oil

SINDIRREFINO

Lubricating oils used by society are formulated from base oils—either virgin or re-refined—combined with chemical additives that enhance their characteristics and properties. The re-refining segment of the industry collects used oil after consumption from various sources, such as fuel stations, quick lube shops, and industries, reinserting this waste into a new life cycle by recovering petroleum base oil through successive cycles. The main challenge was to develop a routine for mobile collection services covering more than 4,454 municipalities across Brazil, as well as a technology that enables maximum recovery of the valuable components present in used lubricating oil. In 2023, 570 million liters were collected and reprocessed, in line with the recommendations of UNIDO, the United Nations Industrial Development Organization. The sector currently has the capacity to process 650 million liters per year, and is expected to reach 750 million liters per year by 2026, producing base oil that meets international technical specifications. According to a recent study, re-refining consumes 50–80% less energy compared to the production of virgin base oil. This is why European countries are increasing regulation of used oil and promoting re-refining activities.

Selected Cases
Textile

Country	Company name	Industry	
Brazil	Diklatex Industrial Textil S.A.	Manufacture of textile products	LEARN MORE

TEXTILE

Undertech - Extension of product life

Undertech is a Diklatex textile technology for menstrual panties, composed of three intelligent layers that absorb female fluids. The project aims to offer a reusable product, more affordable and sustainable, reducing solid waste compared to disposable absorbents. Launched at Febratex 2022, Undertech was promoted in the campaign #EstouJuntoContraaPobrezaMenstrual, in partnership with LYCRA® and Audaces, resulting in the donation of 673 absorbent panties. The technology makes 100% textile panties with more sustainable processes, reducing water consumption by up to 90% and 60% CO_2 emissions. During the action, 282 stories and 389 publications were shared. In addition, Diklatex and Latina Textil donated absorbent panties kits to their collaborators, packed with flaps, and gave talks on women's health, impacting 235 people.

DIKLA TEX

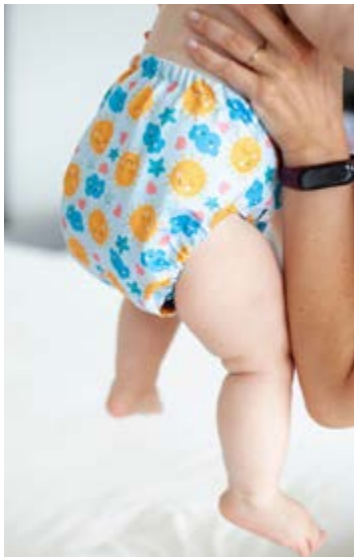
Press Office

Country	Company name	Industry	
Brazil	Fraldas Sul-Industria e Comercio Ltda.	Manufacturing of textile products	LEARN MORE

TEXTILE

Reducing the environmental impact of child care: An analysis of eco-innovation with eco-friendly diapers

Each baby uses an average of 7,000 disposable diapers, generating about 2 tons of waste in the environment. With the Eco-Friendly Diapers from Fraldas do Sul, this impact is drastically reduced: only 24 units are needed to replace the entire volume. In addition to sustainability, this represents savings of up to R$ 8,000, providing more comfort and health for the baby. Our commitment to the environment goes beyond that. Production waste is repurposed into pillows, which are then transformed into pet beds, ensuring zero waste disposal. These pet beds are donated to animal protection NGOs in Blumenau/SC, reinforcing our positive impact on both society and the planet.



Press Office

Country	Company name	Industry	
Brazil	AV Design Comercio Ltda.	Manufacture of various products	LEARN MORE

TEXTILE

Guta Pet: Circular Economy and Sustainability in the Pet Products sector with washable and durable carpets

The PET market generates tons of plastic waste due to the use of disposable carpets, which take up to 600 years to decompose. Guta Pet has created a sustainable solution: Washable hygienic carpets with anti-odor nanotechnology, replacing about 730 disposable units per product. So far, we have sold more than 1,045 carpets, avoiding the disposal of more than 762,850 disposables and reducing more than 38 tons of plastic in the environment. In addition to the environmental impact, our solution is scalable, economically feasible and replicable, promoting the circular economy in the pet sector.

Press Office

Country	Company name	Industry	
Brazil	Lunelli Comércio do Vestuário Ltda.	Manufacture of textile products	LEARN MORE

TEXTILE

Vila Flor

The creation of a brand that uses the surplus production of the textile industry is a strategy that aligns economic development with sustainability. Thus, the brand Vila Flor was born in 2016 with the purpose of using the surplus of Lunelli fabrics and fabrics, promoting a circular production. All products are developed with the aim of making the best use of the available materials, seeking to add greater value to the raw materials and ensuring the exclusivity of the parts. We offer affordable products, always seeking the balance between product and price. At Vila Flor, we work with the adult female audience (from slim to plus size) and the children's female (1 to 10 years). The deliveries are always assorted due to the short films of each color and print, which makes few pieces equal, bringing exclusivity to the brand. In 2024, the production of the brand Vila Flor reached 1,305,628 pieces.

Lunelli

Press Office

Country	Company name	Industry	
Brazil	Malwee Malhas Ltda.	Manufacturing of textile products	LEARN MORE

TEXTILE

Thread of the Future

An unprecedented fashion raw material in Brazil was developed using 70% post-consumer textile waste and 30% complementary fiber to strengthen its structure. Compared to conventional raw materials, this "yarn of the future" uses 30% less water and emits 44% less CO_2. It is made of 85% used clothing that would otherwise be discarded and 15% recycled polyester (sourced from PET bottles). Additionally, it is softened with recycled silicone from CHT, produced from cellphone cases and other items, further promoting the circular economy. As announced at COP27, in 2023 the "yarn of the future" became part of the product mix of Malwee and Malwee Kids brands. To raise awareness about circularity, in May 2022, Malwee launched the DES.A.FIO movement in downtown São Paulo, where the community exchanged used clothing for sweatshirts made with the "yarn of the future." A total of 1,500 pieces of the pioneering sweatshirt were distributed.

Selected Cases
Energy or Agricultural

Country	Company name	Industry	
Brazil	MWM - Tupy do Brazil Ltda.	Manufacture of various products	LEARN MORE

ENERGY OR AGRICULTURAL

Circular economy solution for the production of fertilizers, biomethane and clean electricity, using pig farm waste

Faced with the challenge of finding sustainable solutions for animal waste management and meeting the growing demand for renewable energy and fertilizers, MWN Tupy developed bioplants that treat animal waste, converting it into biomethane and organomineral fertilizers. This process uses biodigesters to transform waste into clean energy and sustainable agricultural products, closing the resource loop and minimizing environmental impacts. The bioplants have significantly reduced the volume of organic waste, generating renewable energy and high-quality fertilizers. This promotes agricultural sustainability, decreases dependence on non-renewable energy sources, and supports the circular economy by returning nutrients to the soil—boosting productivity and environmental responsibility..

Country	Company name	Industry	
Brazil	Energy Source Industria Comercio Importação Exportação S.A.	Chemical manufacturing	LEARN MORE

ENERGY OR AGRICULTURAL

Energy Source - Reverse Logistics, Repair, Reuse and Recycling of Lithium Batteries

Energy Source is the first company in the world to fully close the lifecycle of lithium-ion batteries (LIBs), operating across three key areas: repair, reuse, and recycling. LIBs are essential for the energy transition, but their increasing use generates hazardous waste and drives the extraction of critical metals such as cobalt (Co), lithium (Li), and nickel (Ni). In a sustainable way, we extend battery life, give batteries a second life in new applications, and ultimately recycle them using hydrometallurgy to recover these metals and return them to the market.

Our results speak for themselves:

- We have repaired more than 14 tons of batteries;
- We have reused over 10 MWh of energy;
- We have recycled more than 800 tons of batteries.

In doing so, we lead the way in circular economy and sustainable development.

energy source
TECNOLOGIA SUSTENTÁVEL

Press Office

Country	Company name	Industry
Brazil	Geo Energética AS	Electricity and gas

LEARN MORE

ENERGY OR AGRICULTURAL

Biomethane driving the automotive industry: The success of Geo bio gas&carbon and AESA

Geo bio gas&carbon pioneer in biogas development in Brazil, has joined AESA, a reference in the production of automotive parts, to boost sustainability in the metallurgical sector. The partnership aims to replace LPG with biomethane generated from agro-industrial waste, in the manufacture of automotive springs, significantly reducing GHG emissions by replacing biomethane generated from agro-industrial waste as a sustainable alternative to LPG and NG. In partnership with UTFPR, a study evaluated the environmental impact of change.

As a result of these projects, a 24% reduction in the carbon footprint was observed in 2023, with a target of 45% by 2027. Biomethane now represents 48% of the energy matrix of AESA. The Geo Electric Tamboara plant has expanded its production by 24 times, boosting local jobs and suppliers. AESA modernized its production line and trained 10 employees. In addition to sustainability, the company has strengthened its global competitiveness, attracting customers and environmental certifications. The project highlights biomethane as a viable solution for decarbonization of the industry.

Press Office

Country	Company name	Industry	
Brazil	Ambipar Environment Solutions - Soluções Ambientais	Collection, treatment and disposal of waste; recovery of materials	LEARN MORE

ENERGY OR AGRICULTURAL

ECOSOLO - Agronomic recovery of industrial waste from pulp and paper mills

The ECOSOLO project achieved significant results by promoting environmental sustainability, economic development and social inclusion. Through the reuse of industrial waste paper and pulp, the project increased agricultural productivity, with gains of up to 26% in the production of English potatoes, directly benefiting the income of local producers. It also contributed to reducing environmental impact by properly allocating waste that would be disposed of in landfills. In addition to economic and environmental results, the project generated educational benefits through partnerships with educational institutions and awareness actions on sustainable practices. Another highlight was the improvement in the quality of school meals, using food produced with ECOSOLO. The success of the project led to the expansion of its production to 3,000 tons/month, reinforcing its positive impact on the community and consolidating it as a reference in social responsibility and circular economy.

Country	Company name	Industry
Brazil	Nextracker Brazil Ltda.	Electricity and gas

LEARN MORE

ENERGY OR AGRICULTURAL

"Zero Waste" Circular Economy Ecosystem

The objective of this initiative was to reduce the environmental impact of the manufacturing process of Nextracker's Electronic Trackers (Trackers). For this, an intelligent and innovative solution was developed in partnership with Flex (www.flex.com), the company responsible for the manufacture of controllers. The initiative sought to address the problem of waste generation and extraction of raw material from nature.

Through this vision, practices and initiatives emerged that allowed the elimination of all the waste generated in our operation with Flex in Brazil and the Zero Waste certification in 2018. A reverse logistics structure was created for the collection, recycling and transformation of post-consumer electronic waste into raw material for new products.

Among the main results achieved, we highlight:
- Recovery of 28,000 ton of electronic waste
- 25% reduction in reverse logistics costs
- Zero Waste Certification
- 450 jobs generated
- Reduction of 1 and 2 scopes emissions by 41%
- Reduction of 44 thousand ton of CO_2 scope 3
- Certification of carbon credits

Press Office

Selected Cases
Packaging in General

Country	Company name	Industry	
Brazil	Associação Brazileira da Indústria do Plástico - ABIPLAST e Agência Brazileira de Desenvolvimento Industrial - ABDI	Representative entity of the industrial sector	LEARN MORE

PACKAGING IN GENERAL

Project Recircula Brasil – Plastic Circulates Like This

Recircula Brasil is an online platform that aims to promote the circular economy through the traceability and certification of products throughout its production chains. By means of electronic invoices of operations of purchase of inputs, transformation and sale of goods and the chain of these operations, users can obtain a mass balance of their operations, verified and accredited by a third party. This ensures the introduction of recycled plastic content into new products with the product source ballast.

The initiative, in addition to contributing to the fight against pollution by plastics, stimulates the reinsertion of materials in the production cycle through the valorization of recycled plastic content, and the reduction of greenhouse gas (GHG) emissions, integrating the supply chain and the digital maturity of the production chain. The platform has more than 38mil verified invoices and more than 18 thousand tons of mass verified so far.

abiplast
Associação Brasileira da Indústria do Plástico

ABDI
Agência Brasileira de Desenvolvimento Industrial

Press Office

Country	Company name	Industry	
Brazil	Carbongreen Tecnologia Ambiental Ltda.	Manufacture of rubber products and plastic material	LEARN MORE

PACKAGING IN GENERAL

Recycling Hub in the neighborhood of Ondina in Salvador – BA

In order to transform the reality of recycling in Salvador, CarbonGreen launches a Sustainability Hub in the neighborhood of Ondina. The pioneering project brings together waste pickers, cooperatives, public sector and private companies in an advanced selective collection station, promoting a more integrated, efficient and environmentally responsible model.

More than recycling, the initiative strengthens the entire production chain by investing in training and technical support, ensuring fair remuneration and appreciation of the activity. The project is a hub of social inclusion that places waste pickers at the center of change, recognizing them as protagonists and main beneficiaries of the initiative.

By acting as a bridge between governments and private initiative, CarbonGreen also drives public policies and industry-oriented business solutions. The result is a new vision for recycling: Organized, economically viable and truly beneficial to society and the environment.

CarbonGreen Tecnologia Ambiental

Press Office

Country	Company name	Industry	
Brazil	Eco Panplas Indústria e Comércio de Plásticos Ltda.	Manufacture of rubber products and plastic material	LEARN MORE

PACKAGING IN GENERAL

Eco Panplas - Dry recycling of contaminated plastic packaging

Eco Panplas has developed a disruptive, unprecedented and patented production technology in the world for the recycling of plastic lubricant oil packaging and other applications, without water use and without waste production.

Operating in Hortolandia-SP and recognized worldwide for the economic and socio-environmental value generated through 35 awards, including the UN Global Compact, IDB, FEMSA, WIPO, World Economic Forum, B Corps, Bloomberg, Fiesp, with 2 major differentials:

1. We recover the residual oil from the packaging that returns to the market, making the process become ecological, without waste generation.

2. Recycled resin 100% from lubricating oil packaging, ensuring the quality for the manufacture of a new oil packaging without the use of virgin material.

Every 500 tons of recycled plastic, we recover 17 liters of oil, preserve 17 billion liters of water and avoid 800 tons of $C0_2$ emissions.

ECO PANPLAS

Press Office

Country	Company name	Industry	
Brazil	Instituto Nacional de Processamento de Embalagens Vazias	Collection, treatment and disposal of waste; material recovery	LEARN MORE

PACKAGING IN GENERAL

National Institute for Empty Packaging Processing (inpEV)

inpEV, a nonprofit institute, was founded in 2002 to manage the reverse logistics and proper environmental disposal of post-consumer pesticide packaging. Today, it represents more than 195 manufacturing and/or registering companies in Brazil. The process complies with Law No. 14.785/23, which repealed Laws No. 7.802/89 and No. 9.974/00, and establishes a shared responsibility model. Of the volume received through over 416 collection units across Brazil and annual mobile collection operations, 97% is recycled and 3% is incinerated. Currently, 100% of rigid plastic containers are recycled and turned into new products, with 38 approved applications authorized by inpEV. The circular economy promoted by the Campo Limpo System, managed by inpEV, is developed in Brazil and globally pioneering. Each Ecoplástica® container produced avoids the emission of 1.24 kg of CO_2 equivalent. In its 15 years of operation, Campo Limpo Plásticos has manufactured over 100 million containers. According to inpEV's 2023 Sustainability Report, more than 754,000 tons of empty packaging have been properly disposed of since the institute's founding, contributing to a reduction of 1.05 million tons of CO_2 equivalent emissions..

Press Office

Country	Company name	Industry	
Brazil	Schütz Vasitex Industria de Embalagens	Manufacture of rubber and plastic products	LEARN MORE

PACKAGING IN GENERAL

SCHÜTZ VASITEX – Leadership in Circular Economy

SCHÜTZ VASITEX is a benchmark in the circular economy, promoting the reuse and recycling of industrial packaging. Its closed-loop system enables the collection, reconditioning, and reintegration of IBCs into the market through the SCHÜTZ TICKET SERVICE, preventing waste generation and reducing environmental impact. In 2023 alone, this initiative reduced CO_2 emissions by 31,000 tons—equivalent to planting 1.4 million trees. Innovation is also present in the Green Layer technology, which uses recycled plastic that does not come into contact with the filled product. With this commitment, the company has contributed to a reduction of 440,000 tons of CO_2 since 2000, reaffirming its leadership in sustainability.

Press Office

Selected Cases
Other Countries in Latin America

Country	Company name	Industry	
Peru	Biorrefinerías del Perú SAC	Preparation of leathers and manufacture of leather artifacts, travel articles and footwear	LEARN MORE

OTHER COUNTRIES IN LATIN AMERICA

Bioleatherlab

BioatherLab is a pioneering biotechnological initiative dedicated to the transformation of agro-industrial waste into innovative and sustainable bioleather. Our mission arises from the convergence of two critical challenges. Firstly, at the local level, we are committed to discovering the potential latent in Peru's agro-industrial waste, giving them a renewed purpose and avoiding their contribution to the growing problem of environmental pollution. Secondly, we are committed to leading a fundamental change in the fashion industry to more sustainable practices, aware of the significant impact it has on the environment on a global scale.

Our initial thrust is based on these two fundamental pillars, presenting an innovative solution that not only meets the demand for materials similar to conventional leather, but also drastically reduces the associated environmental impact.

BIOLEATHER LAB

Press Office

Country	Company name	Industry	
Colômbia	CAMACOL - Cámara Colombiana de la Construcción	Construction of buildings	LEARN MORE

OTHER COUNTRIES IN LATIN AMERICA

TECC: Circular Economy for Construction

The construction sector in Colombia faces the challenge of reducing its environmental impact and moving toward a more efficient and sustainable model. To respond to this need, Camacol developed the Circular Ruta with the support of the Swiss Embassy in Colombia, a pioneering platform in Latin America that accompanies companies in the sector in the practical implementation of the circular economy. The solution includes a robust methodology applied to six profiles (manufacturers, designers, builders, consultants, managers and RCC operators), based on 11 categories. Through self-diagnosis and a personalized roadmap, companies identify opportunities for improvement based on 59 indicators, access a toolbox and consult successful experiences. Currently, there are more than 100 registered companies that have started their journey toward the circular economy. Ruta Circular is today a national and international reference in sustainability applied to construction.

CAMACOL

Construyendo MÁS VERDE

Press Office

Country	Company name	Industry	
Peru	Cencosud Peru S.A. inscrito por Sociedade Nacional de Indústrias	Manufacture of various products	LEARN MORE

OTHER COUNTRIES IN LATIN AMERICA

Management and optimization of losses and waste reduction in the retail sector

Cencosud, through the implementation of a management cycle based on the circular economy, reduced the waste of food and waste in the processes. In 2019, 850 tons of food were discarded, generating a cost of 1.9 million dollars and issuing 33 tons of CO_2. In 2023 and 2024, the waste profile was studied in the Metro and Wong supermarkets, where it was identified that more than 60% of the waste was organic and many waste was being disposed of. Operational and technological solutions were designed, such as the settlement of products near the shelf life and the composting of non-consumable organic waste. This model was institutionalized in the business and replicated in other stores, as well as started a pilot for the sale of recyclable waste. Thus, it was possible to reduce the use of landfills, greenhouse gas emissions and economic impact, promoting responsible consumption and establishing partnerships for waste recovery.

Press Office

Country	Company name	Atividade	
Colômbia	Ecopetrol S.A.	Representative entity of the industrial sector	LEARN MORE

OTHER COUNTRIES IN LATIN AMERICA

Use of clarification solids - ECOPETROL S.A.

The main challenge of the initiative is to apply a circular economy approach to the management of the clarification solids of the Barrancabermeja Refinery. Due to the large amounts of solids that are projected to generate (2,100 tons/month) once the geotube technology is implemented in all the units of the refinery water plants. However, it is noteworthy that these solids, because THEY ARE NOT a dangerous material according to their physical-chemical characterization, offer a valuable opportunity for their valorization and reuse, in agricultural actions and in some civil adequacy activities. This approach not only mitigates the environmental impact, but also contributes to the circular sustainability of the process, promoting a more responsible and efficient management of natural resources.

Country	Company name	Industry	
Argentina	Iveco Group	Manufacture of motor vehicles, trailers and bodies	LEARN MORE

OTHER COUNTRIES IN LATIN AMERICA

Circular economy to produce truck parts

IVECO • GROUP

The IVECO Group is investing in the circular economy at its factory in Córdoba, Argentina, replacing the linear model with a model based on the “5Rs” (refuse, reduce, reuse, recycle, and recover). Through Isla Ecológica, it promotes recycling, composting, and reforestation, achieving environmental, economic, and social impact. Among its projects are: the axle end drainers, made with 30% reused metal waste (saving 8.2 million dollars); engine flywheels, created with 40 tons of scrap metal (saving 10 million dollars); and pedal boxes, made with 8 tons of recycled aluminum (saving 3.1 million dollars). The company aims to make all its products recyclable by 2026.

Country	Company name	Industry	
Paraguai	Maigotex	Manufacture of textile products	LEARN MORE

OTHER COUNTRIES IN LATIN AMERICA

Maigotex - Biomaterials Developer

At Maigotex, we face the challenge of offering sustainable alternatives to traditional materials in a country with plenty of wasted organic waste. We have developed an innovative bio-leather from mango waste, creating a formulation that not only takes advantage of agricultural surpluses, but also meets the requirements of flexibility, resistance and aesthetics for the fashion, footwear and furniture sectors. Our real innovation was to get this foundation to adapt to other agricultural waste, expanding the possibilities of scalability and industrial customization.

We take our proposal to the pilot production phase of 1x1 meter plates, applying principles of circular economy and Lean Manufacturing to minimize waste and optimize resources. We continue our search for regenerative solutions and are currently developing new applications, exploring hemp fiber as a sustainable material for future biomaterials lines.

Press Office

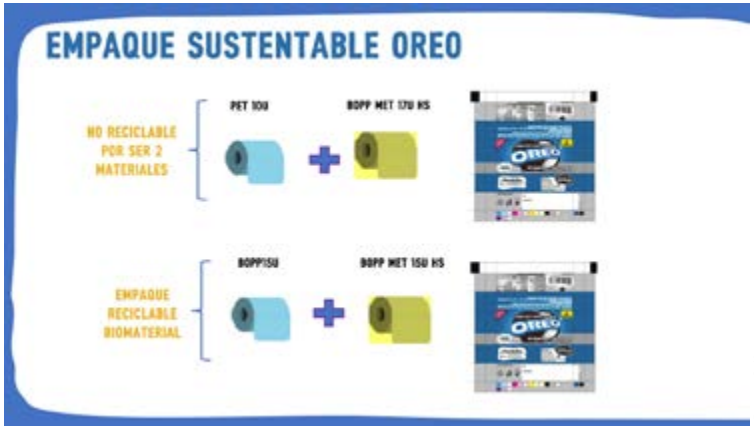
Country	Company name	Industry	
Peru	Mondelez Peru S.A. inscrito por Sociedade Nacional de Indústrias	Manufacture of food products	LEARN MORE

OTHER COUNTRIES IN LATIN AMERICA

Transformation for the circular economy in the Lima plant: Implementation of recyclable packaging with single raw material for cookie products

The Mondelez plant in Lima, committed to sustainability and the circular economy, has implemented an innovative process to manufacture recyclable single-material packaging for its cookies line. Previously, the packaging used a combination of materials that made it difficult to recycle. After evaluation and collaboration of the team, bioriented polypropylene (BOPP) was chosen as a unique material, making packaging easily recyclable, without affecting the quality or durability of the product. This project reinforces Mondelez's commitment to the environment and sets a precedent in the regional industry.

Mondelēz International



Press Office

Country	Company name	Industry	
Chile	Scancontrols Ingeniería Limitada	Entity representing the industrial sector	LEARN MORE

OTHER COUNTRIES IN LATIN AMERICA

Scancontrols and its contribution to the circular economy

The main focus of our workshop is the complete repair of valves and actuators; customers send us the equipment on a scheduled basis, after completing their annual cycle (the recommended cycle for maintenance of these equipment) or on an emergency basis. These equipment are subjected to a thorough diagnosis, which determines the type of repair to be applied. With the customer's approval, the equipment is fully repaired, thus extending its useful life. We have already repaired more than 25,000 pieces of equipment and have 0 "Non-Conformities". With this, we can endorse that our repairs restore the equipment to "new" quality and excellent condition for further use.

ScanControls
Flow Control Specialists

Press Office

NATIONAL CONFEDERATION OF INDUSTRY – CNI

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