



A circular economy champion

Editorial



Sébastien PETITHUGUENIN Director General Jean-Luc PETITHUGUENIN Paprec founder and CEO Mathieu PETITHUGUENIN Deputy Director General

A firm believer in the importance of recycling, I decided to form my own group in 1994 by taking over Paprec, a 40 employee SME based in La Courneuve (93). Our family-owned group now has more than 12,500 employees and, this year, will have a turnover of 2.5 billion euros. Almost 50,000 industrial customers and 6,000 local authorities put their trust in us.

The group's strong growth has confirmed my initial intuition : waste is now the raw material of the 21^{st} century. Recovering it in the form of material or energy helps to save natural resources and reduce CO_2 emissions, and this in turn is beneficial in terms of the decarbonisation of industry and the fight against climate change.

As one of the European leading circular economy company, we are involved in the three recovery loops. The **material recycling** loop is our core area of expertise, an area in which we are the leader in France. Then there is **energy recovery**, in which we have become a major player. The third loop is **organic recovery**, returning waste to earth. In this sector also, we are developing a state-of-the-art solution for which we have received an award from the European Commission.

Our growth model is based on the overriding objective of a greener planet, through a fundamental commitment to a more friendly society. Equal opportunities, diversity and secularism are part of our group's DNA.

The group is moving forward with confidence, both at home and abroad, and I shall be proud to pass it on to my children.

Jean-Luc PETITHUGUENIN Paprec founder and CEO



IT ALL STARTED WITH A VISION OF RECYCLING

The Paprec adventure began in 1994, at La Courneuve (North-East of Paris). Jean-Luc Petithuguenin, then a senior executive in the recycling and industrial cleaning sector with the Compagnie Générale des Eaux (now Veolia), took over Paprec, an SME specialising in the recycling of paper and cardboard. He transformed what was not much more than a craft business into an amazing industrial venture.

STRONG VALUES

Jean-Luc Petithuguenin put people at the heart of his managerial policy; the group is known and recognised for its commitment to diversity (age, education, origin, culture, etc.), secularism and the fight against all forms of discrimination in the workplace. In October 2016, the Paprec Group was awarded the Axa Global Award for Responsible Companies.

Jean-Luc Petithuguenin also won the EY Entrepreneur of the Year Award in 2012, and received the equivalent accolade at the BFM Business Awards in 2016. In 2020, he was named "Industrialist of the Year" by the editorial staff of the main french industrial magazine, *L'Usine Nouvelle*. In 25 years, Paprec has received a grand total of 35 awards.

IN LESS THAN 30 YEARS, A 30 % ANNUAL INCREASE IN TURNOVER AND MORE THAN 2.5 BILLION EUROS OF INDUSTRIAL INVESTMENT

The group is now the leading French waste recycler and one of the leading european companies for recycling. We are known for the quality of the new raw materials we produce and sell throughout the world. Always on the lookout for innovation opportunities, we can offer the best recycling options. To broaden its expertise and cover the entire country, the group is focusing as much on internal growth as on external expansion.

A TECHNOLOGICAL LEADER IN THE THREE WASTE RECOVERY LOOPS

Moving away from its original line of business, Paprec has expanded its offer and is now the leading player in the first waste recovery loop : "material recycling". Since 2018, Paprec has offered a new skill : energy recovery. And in 2021, we are confirming our expertise in this field with the simultaneous takeover of CNIM's O&M division and Tiru, formerly Dalkia Wastenergy. We are the third biggest energy recovery operator in France. Such is our commitment to our credo of industrial excellence, that our first steps in the third loop, organic recovery and returning waste to the earth, earned us the European Commission's sustainable development award. The group plans to develop its skills in this field very soon. Finally, Paprec is developing a disposal solution for non-recoverable final waste. The group is again France's third-biggest operator in this field.

A FAMILY-OWNED COMPANY SUPPORTED BY MAJOR INVESTORS

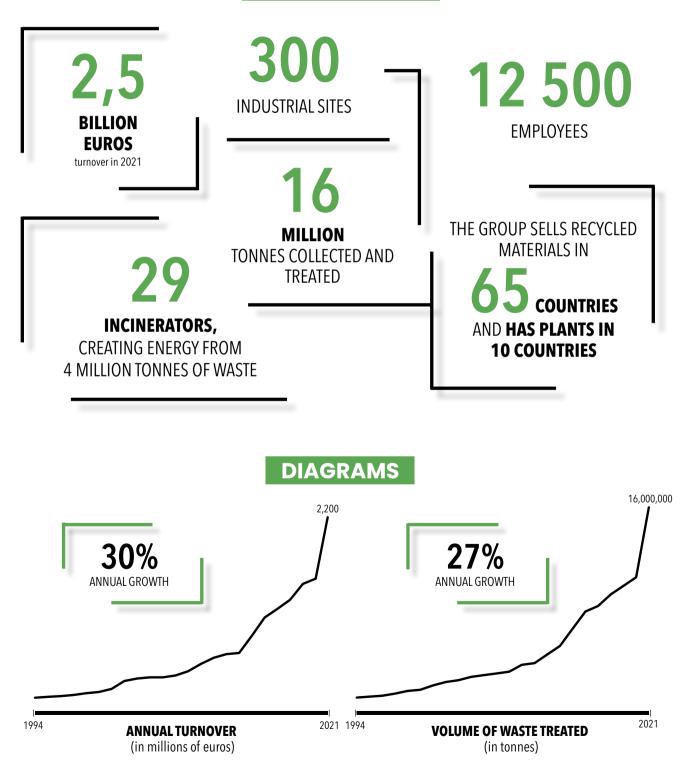
In 2017, as a means of financing its investment projects, Paprec raised a billion euros, 750 million of which were in the form of green bonds. The Petithuguenin family has a majority holding in the company, along with financial investors (including Arkéa) and the French public investment bank (BPI).

AN INTERNATIONAL VOCATION

We sell our recycled raw materials in 65 countries. Over the last ten years, Paprec has also been developing in Switzerland, where it has five plants. We are now in 10 countries, where we manage energy recovery plants or other waste agencies. We operate in Azerbaijan, Benin, France, India, Morocco, Poland, Spain, Switzerland, Togo and the UK.

Paprec, France's leading recycler

KEY STATISTICS



Paprec recycles and recovers all major types of waste



The group accelerates its international expansion

14 UNITS IN 10 COUNTRIES

A MILLION TONNES OF TREATED WASTE

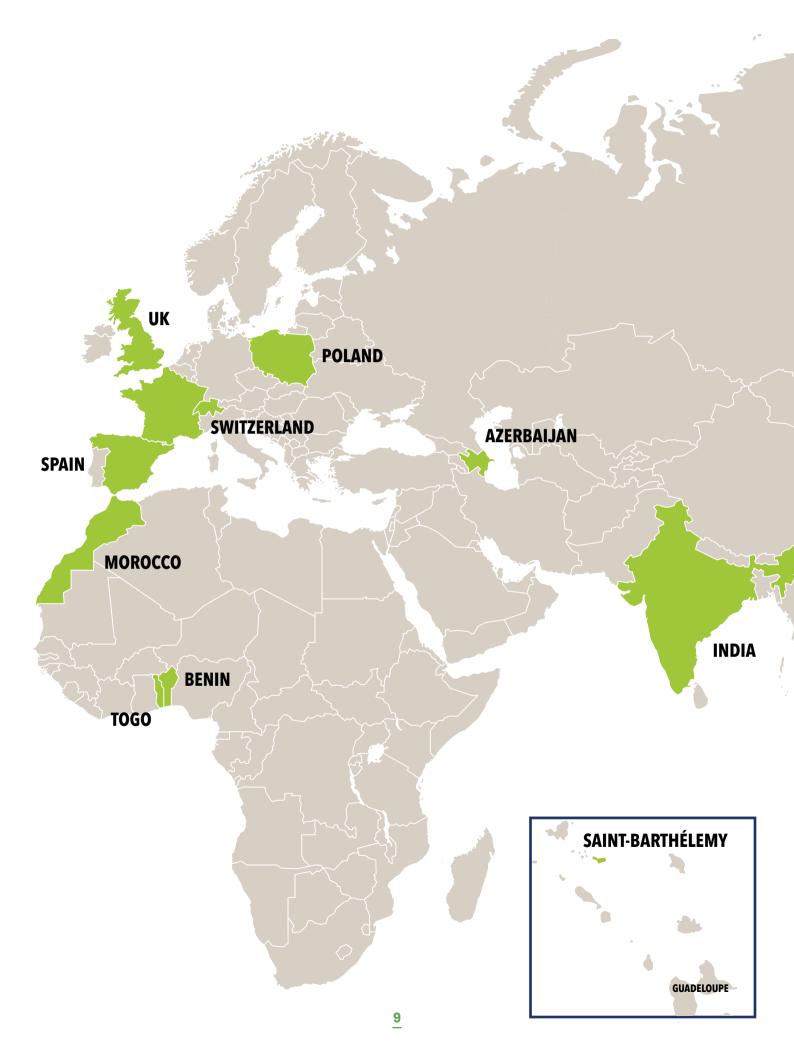
30 NEW PROJECTS OR CURRENT CONTRACTS











Paprec exports recycled raw materials to 65 countries

Our subsidiary FCR handles the sale of recycled raw materials for the whole Group. Every year, FCR sells almost 5 million tonnes of high quality products in 65 countries around the world.

After collection, the waste is transported to our various sites right across France. It is then sorted once again, and possibly treated, before being packed as appropriate.

After this, our subsidiary FCR takes over and sells this newly recovered material. Selling recycled raw materials was Paprec's original business, and it still remains an integral part of what we do. This task is managed by our specialist subsidiary FCR, which treats 4 main materials :

- Paper/cardboard
- Wood
- Plastic
- Scrap and other metals
- CSR



Paprec operates plants in 10 countries

In 2010, our group bought the family-owned company Lottner. It became Paprec Switzerland, and the group now has 6 plants in 5 cities : Basel, Lucerne, Geneva, Zurich and Oftringen. It is now the second biggest paper and cardboard recycling company in Switzerland and recovers 200,000 tonnes of waste every year. Our Swiss subsidiary also manages other types of waste, such as general industrial waste or scrap metal, and also handles the destruction of confidential documents. We also develop rapidly in Spain since 2021.

In 2021, with the acquisition of Tiru and CNIM O&M, two companies which are specialised in energy recovery, Paprec now operates 2 units in the French overseas territories (St Barthélémy), 2 energy recovery units in the United Kingdom, 1 in Poland and 1 in Azerbaijan. The Group now has two additional subsidiaries, in Morocco and India. Finally, the group operates two non-hazardous waste landfill sites in Benin and Togo.

In addition to the British plants and the Polish plants (in energy recovery and the creation of solid recovered fuel), Paprec Energies will manage the only waste energy recovery unit in the Azerbaijani capital, Baku. With a capacity of 500,000 tonnes, this plant plays a major role in the Caucasian country's waste reduction strategy.



A "MAJOR PROJECTS" DIVISION ON AN INTERNATIONAL SCALE

In the future, increasing amounts of waste – such as organic waste and biowaste – will be recovered and will no longer go to landfill sites. To treat this final waste, local authorities, both in France and other countries, are investing in major projects : energy recovery, methanisation and transformation into Solid Recovered Fuel (SRF). In response to this, Paprec has set up a "Major Projects" department. Among other things, the group is working with the city of Gdansk, in Poland, to develop a joint project to build an energy recovery and solid recovered fuel plant.



THE MATERIAL RECYCLING LOOP





Paprec, leader in recycling for industrial customers

Recycling is our main area of expertise. It is what makes the Paprec group special among environmental operators. Our abiding objective is to achieve the highest recycling rates technically possible – and economically viable – for our customers. We serve 50,000 industrial customers and almost 6,000 local authorities, providing them with tailored collection, sorting and recovery solutions. So we always strive for industrial excellence. We design all our specialist sorting plants using state-of-the-art technology. Incoming materials, even in bulk, are separated, so that new high quality raw materials are output, ready for re-use.



A TAILORED SERVICE

With almost 300 sites, we can manage our customers' waste locally. Through our Major Customers department, the group submits bids for national contracts and offers a delegated management service for entire industrial sites.

SERVICES OFFERED FOR COMPANIES

- Design and installation of storage equipment
- Waste collection
- Sorting and recovery
- Management of hazardous waste
- Delegated management of industrial sites
- or technical equipment
- Pick-up of materials



OPTIMUM RECOVERY OF CONSTRUCTION SITE WASTE

The energy transition law places an obligation on building site operators to recover 70 % of their site waste by 2030. Thanks to our network of sites and our special sorting machines for this particular type of waste, we can already offer recovery rates higher than the legal requirement.





A HIGHLY SOPHISTICATED WEEE OFFER

Paprec recycles waste electrical and electronic equipment on 8 specialist sites in France. All of these meet the strictest international standards. Paprec's WEEE sorting plant at Pont-Sainte-Maxence (60), which opened in 2018, has the latest innovations available for the optimum recycling of this particular type of waste.

AN OFFICE WASTE SERVICE

The law now requires that the five flows be sorted in the case of sites and branches employing more than 50 people. La Corbeille Bleue, La Corbeille Bleue Réseau and Le Petit Plus are group subsidiaries which provide these specialist services. The group offers considerable volume and collection flexibility with guaranteed recycling rates.





CONFIDENTIAL DESTRUCTION GUARANTEED

Confidentialys provides a confidential destruction service for both hardcopy and digital documents. This service can be delivered on the customer's premises, in mobile units, or in our own plants. It is carried out under very strict security and in compliance with stringent traceability standards.

Paprec, leader in the field of technical recycling for local authorities

We provide a comprehensive service for local authorities, from collection to disposal of final waste. Specifically, we are the leader in selective collection sorting. With around thirty selective collection plants, designed using state-of-the-art technology, we can respond to the double challenge of a shortage of sorting centres and the extension of sorting regulations, which enables the collection of all plastic packaging, not just bottles. So we anticipate that we will be material recycling a higher proportion of plastic packaging.



2019, is the first plant in France to use a sorting robot based on artificial intelligence. The Trivalo 92 plant, which became operational in mid-2021, has two of those robots. They both speed up the sorting rate and fine-tune the sorting process.

. . . .

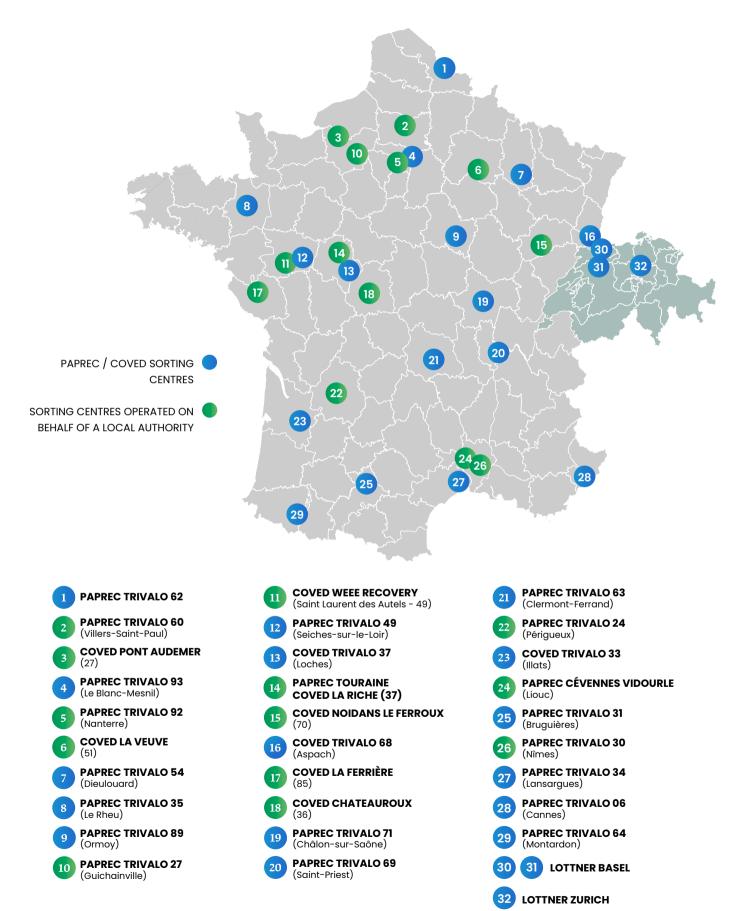
- Collection of refuse and household waste
- Sorting (household waste, bulky waste, selective collection)
- Delegated management of sorting centres

SERVICES FOR LOCAL AUTHORITIES

Cleaning

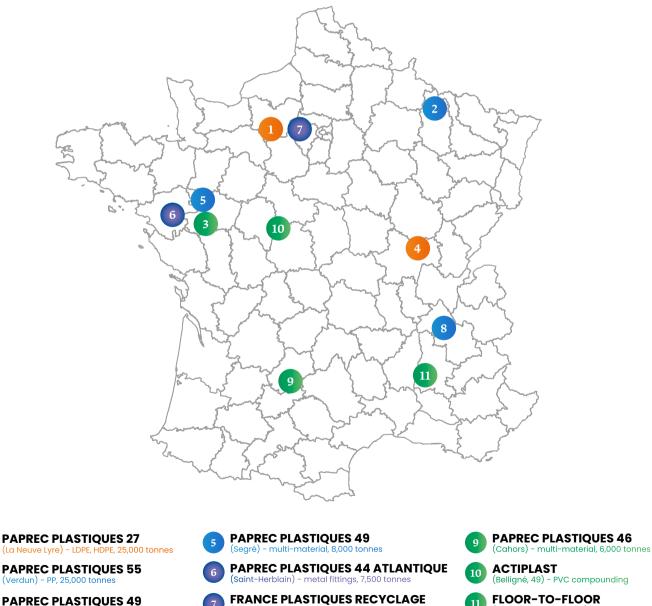
- Management of waste disposal
- sites
- Pick-up of materials
- Landfill disposal of final waste

PAPREC, THE LEADER IN SELECTIVE COLLECTION SORTING IN FRANCE AND SWITZERLAND



Focusing on partnerships to develop the circular economy

Recycled plastic materials replace virgin materials and, therefore, avoid the use of natural resources. Material recycling, which is at the top of the waste treatment hierarchy, reduces energy consumption and CO₂ emissions. As a major player in the circular economy, we are developing research and development partnerships with our customers to enable us to offer our expertise in closed loop recycling, i.e. returning the material to its original use.



(Limay) - PEI

PAPREC PLASTIQUES 38

lombe) - custom grinding, 12,000 tonnes

18

(Trémentines) - PVC, 25,000 ton

PAPREC PLASTIQUES 71

Chalon-sur-Saône) - HDPE, 25,000 tonnes

FLOOR-TO-FLOOR (Salaise-sur-Saône, 38) - PVC regeneration

PAPREC PLASTIQUES, A LEADING INNOVATOR

The group has developed 9 plants which are specialised in recycling various plastic resins. These exceptionally innovative plants regenerate sorted plastics from selective or industrial collection. The ground or granulate material obtained is of very high quality and is used instead of fossil based material for the manufacture of new items.



BOTTLE TO BOTTLE

The European SUP (Single Use Plastic) directive requires the use of 25 % recycled PET in bottles by 2025, and 30 % by 2030. Our Paris region plant, France Plastiques Recyclage, manufactures food-compatible PET from bottles obtained from selective collection. Several of our customers are even already offering 100 % recycled bottles, using recycled PET (R-PET) produced in our plant.





TECHNICAL FLOORING RESIDUE, RAW MATERIAL FOR THE PRODUCTION OF NEW FLOORS

The purpose of our partnerships is to offer our customers high-quality tailored solutions. A good exemple of this policy: Floor-to-Floor initiated with Gerflor, the European leader in technical flooring. Our Paprec Plastiques 49 plant, which is based in Trémentines, has worked with Gerflor to develop an industrial line to regenerate production or installation offcuts. This recycled PVC is then returned to the Gerflor flooring production process. A plant is now being built close to their production site near Lyon to increase regeneration capacity and reduce the environmental impact of transporting goods.

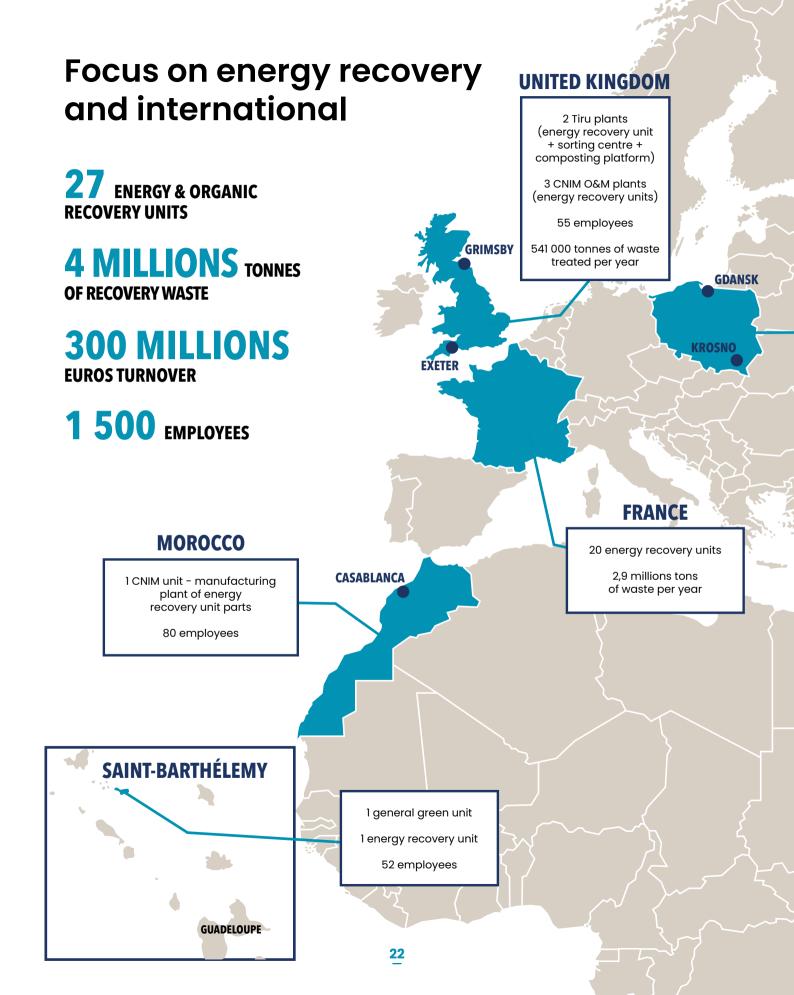


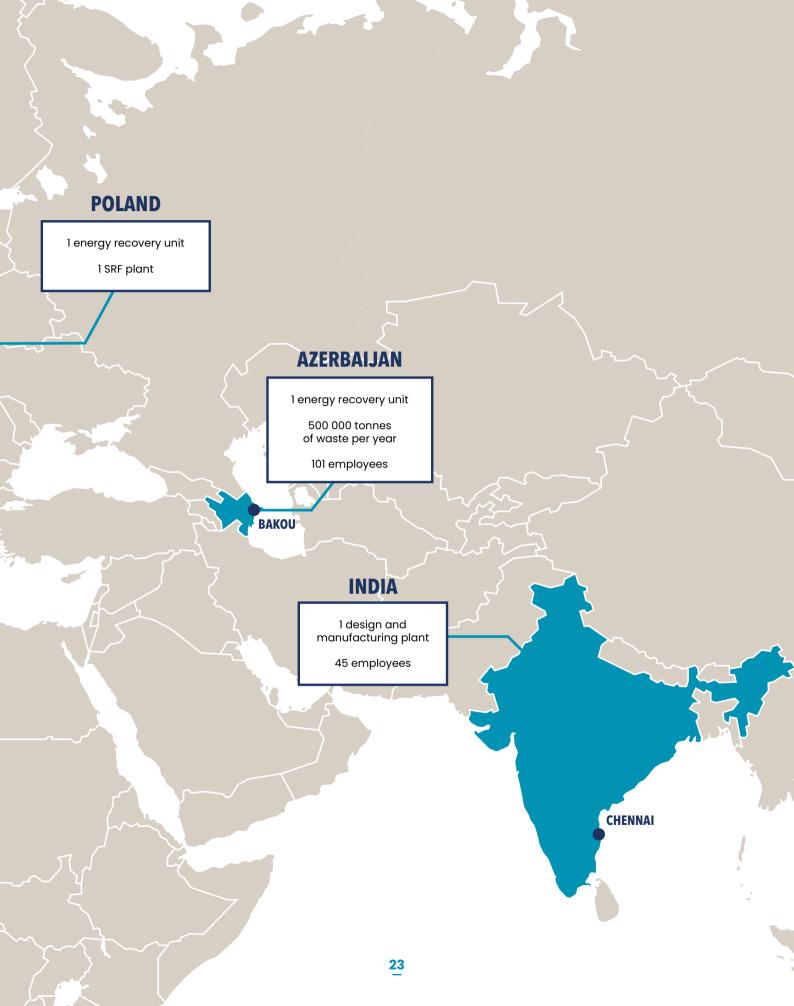
THE ENERGY RECOVERY LOOP



THE SYDETOM 66 TREATMENT AND ENERGY ENERGY RECOVERY UNIT, AT CALCE

C. M. Duralise





Paprec, a green energy provider

For certain types of waste, material recycling is sometimes technically impossible, or far too expensive. This waste can then be redirected to energy recovery activities. In 2021, the Group became the third biggest player in the energy recovery sector, with Paprec Energies Network (formerly Inova and CNIM Operations & Maintenance) and Tiru (formerly Dalkia Wastenergy). The creation of Paprec Energies brought together the divisions of Tiru (formerly Dalkia Wastenergy), CNIM O&M and Inova Operations. In April 2022, it was bolstered by the arrival of CNIM's engineering teams. The Group now has the expertise at its disposal to design and operate recovery facilities of all capacities.



USING SORTING REJECTS TO GENERATE ENERGY

Sorting rejects can be turned into excellent fuel. Ground into small particles, of a defined size and diameter, solid recovered fuel is used on industrial sites which use a lot of energy, mixed with traditional fuel. It, therefore, reduces the amount of fossil fuel used by cement factories, paper mills, blast furnaces, etc.





GAS OR ELECTRICITY FROM WASTE

In April 2017, a world first was achieved at the nonhazardous waste landfill site at Saint-Florentin, in the Yonne département. Engineers transformed the biogas generated by buried waste into mains gas which was fed back into the public gas system.















RETURNING WASTE TO EARTH





The group organises the return of waste to earth

The last loop in the circular economy : organic recovery or returning waste to earth. In France, by the end of 2023, all biowaste will have to be collected at source. This waste represents no less than a quarter of French household waste, and it still almost systematically goes to landfill. This segment is set to develop significantly, and Paprec, as always, is focusing on innovation and excellence.



Transforming biowaste into energy, compost and fertilizer

In France, the aim of the energy transition law of 2015 is to halve the amount of final waste by 2025, and also to gradually increase taxes on polluting activities.

AN EUROPEAN AWARD FOR PAPREC AGRO

Our Paprec Agro site in Saint-Paul-la-Roche, Dordogne, produces compost which is sold to local farmers. Alongside this, our engineers have developed an eco-farm for conducting experiments using the principles of agroforestry. 500 trees have been planted on a 4-acre plot. Plant cover and compost were added to recreate the earth's natural cycle, and no chemical inputs or water were added. The project won the European Commission's Sustainable Development Award.



To further recover this final waste, the group's non-hazardous waste landfill sites collect the biogas released and transform it into heat and electricity, which will then be fed into the electricity supply of nearby towns.



DEVELOPMENT OF METHANISATION

The Group will design a showcase plant, in the west suburb of Paris (in Gennevilliers). This plant will make it possible to convert biowaste from the Île-de-France region into green gas and fertilizer. The gas will be injected into the local network, while the fertilizer will be used by local farmers. Paprec has been developing this expertise for several years, particularly at the anaerobic digestion facility of Fresnoy-Folny (North France).

In the Capik methanisation plant, in Fresnoy-Folny (North France), we combine material recycling with energy recovery. Organic recycling transforms some of the biowaste into fertiliser approved by the National Agency for Food, Environmental and Occupational Health and Safety. So it can be used as fertiliser by farmers. The remainder is transformed into biogas, which generates electricity and heat.

Four guiding principles and a secularism and diversity charter



FIGHTING DISCRIMINATION

Equal opportunities for all, respect towards everyone regardless of their opinions, culture, education, age, etc. This is the group's DNA. Respect for the individual is at the heart of the group's managerial system, and diversity underpins Paprec's social performance.



ENCOURAGING TALENTs

Enabling everyone to fulfil their potential in their job, based on their ability, not on their qualifications. This is the group's aim. When recruiting, we look for personalities more than educational qualifications, and we then monitor their skills and careers on a regular basis.



FOCUSING ON TEAM SPIRIT

For the Paprec Group, team spirit and solidarity are vital to the company's success. This culture encourages participation in joint projects and facilitates collective decision-making.



AIMING FOR EXCELLENCE

All the group's employees share the same credo : to put their experience and expertise to use in group projects and serve customers' needs.

A CHARTER FOR DIVERSITY AND SECULARISM

In 2014, following a consultation with employees and an unanimous vote, the Paprec group added a charter for diversity and secularism to its company regulations. Based on a culture of mutual respect and understanding, the charter enshrines religious neutrality in the company and the rejection of discrimination.

FOR A GREENER PLANET AND A FRIENDLIER SOCIETY



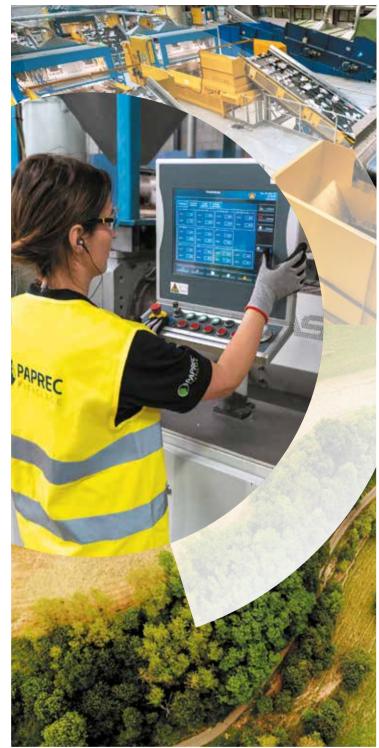
TODAY'S WASTE CREATES TOMORROW'S JOBS.

Recycling and recovery of waste into raw materials represent ideal solutions to the environmental challenges of the 21st century. This sector requires considerable investment in high-tech industrial equipment.

With 12,500 employees in 300 sites in 10 countries, Paprec has been at the heart of the circular economy for 25 years.

As leader in recycling, it plays an important role in the country's progress in this field. Paprec has expertise in all areas of the sector, from waste collection to recovery.

The company has created 2,000 skilled jobs over the past three years.





Jean-Luc Petithuguenin, CEO and Founder of the Paprec Group, was named Industrialist of the Year 2020 on 4 November.





7 rue du Docteur Lancereaux - 75008 Paris, FRANCE Tél. : +33 (0) 1 42 99 43 10 // Fax : +33 (0) 1 42 99 43 31 www.paprec.com