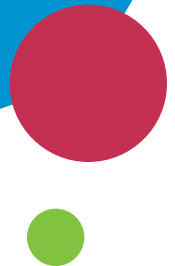


# SUSTAINABILITY

2022  
REPORT

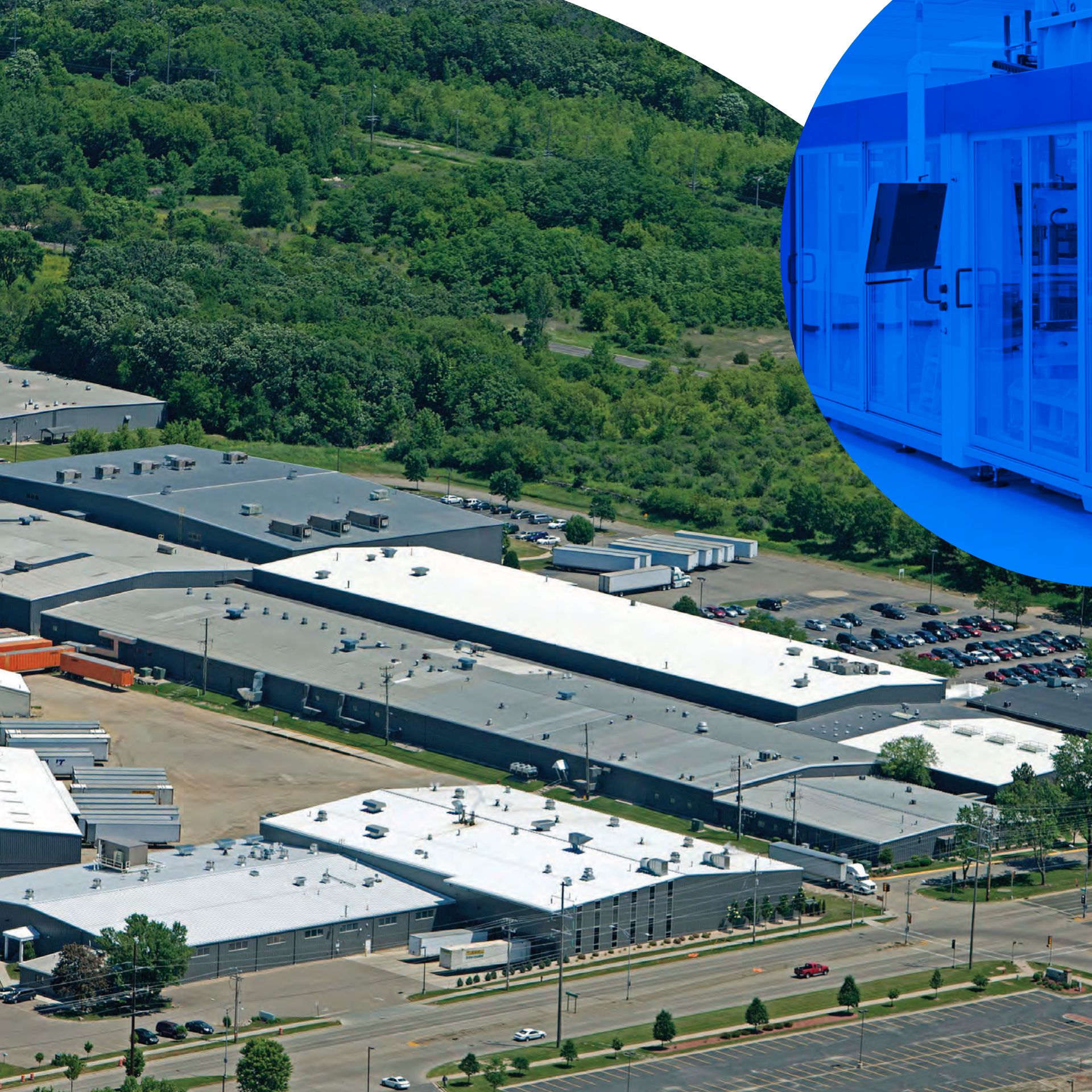




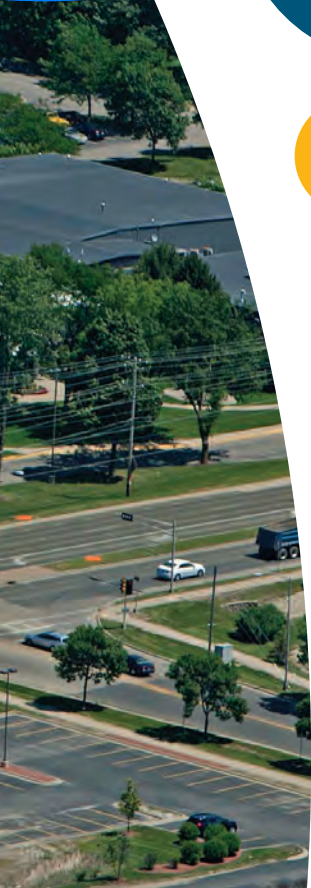


"Never doubt that a small group of thoughtful, committed citizens can change the world. Indeed, it is the only thing that ever has." – Margaret Mead









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## GUIDING STATEMENT

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Placon is committed to closing the loop through our zero net waste initiative, reclaiming and repurposing post-consumer recycled materials, and setting the industry standard for sustainable packaging. Contributing to the circular economy, Placon strives to create a culture of environmental responsibility for our team members, customers, and communities.







Manual bottle sorting  
at our recycling facility  
in Madison, WI





The Mohs Family, from left to right, Ellyn Mohs, Dan Mohs (Chairman and CEO), Nancy Mohs, Linda Granato, Tom Mohs (Founder)





## A FAMILY LEGACY

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Living sustainably is not just something we say, it is our company vision. We strive to be an industry leader in green initiatives and reducing our overall carbon footprint by implementing a variety of energy saving programs, water recycling, and working with local governments and municipalities. Our sustainability goals don't stop with just our facilities. We have been using recycled PET since the early 90's with key retail partners. In 2011, we took the next step toward creating a circular economy by building an onsite recycling center. To date, we've kept over 4 billion PET bottles from landfills. We close the loop and we're just getting started.

– Dan Mohs  
Chairman and CEO





## SUSTAINABILITY TIMELINE

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This is our first sustainability report, but by no means does that mean we are starting now. The Placon legacy is built on innovation and engineering new ways to make packaging. Since 1991, we set the standard in sustainable packaging, making the switch from PVC to PET. Each year we have been pushing the boundaries on what it means to create a circular economy.



**1991**

1st PET Retail Package with PCR content introduced in the US with Walmart.



**2002**

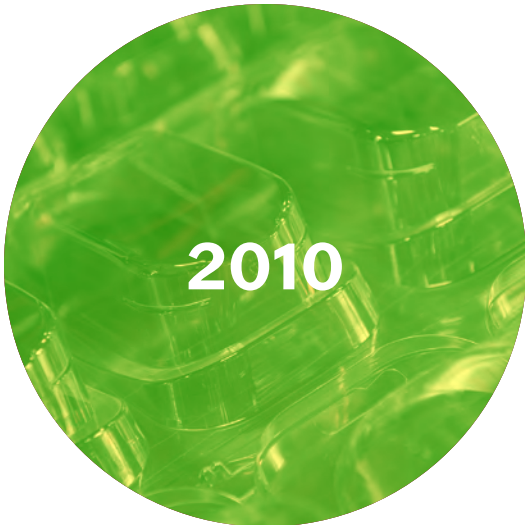
Begin in house extrusion of post consumer recycled content (PCR).  
Replace all PVC with recyclable PET.



**2008**

Commission EcoStar® Bottle recycling facility to produce PCR flake for extrusion of film.  
Placon introduced PCR content into all food containers.





2010

Led industry initiative to include thermoforms in recycling stream.  
  
Receive FDA approval for use of PCR for direct food contact.



2011

Debut of our recycling facility that reclaims PET bottles and thermoforms.



2020

OxyStar® 1st sustainable barrier material.



2021

Installed a sheet laminator and are investing in other barrier materials and technologies.  
  
Received SCS Global Services 3rd party certification on 75% post-consumer recycled PET sheet.



2022

Received SCS Global Services 3rd party certification on 100% post-consumer recycled PET sheet.



2023

See our goals for the future on page 35.

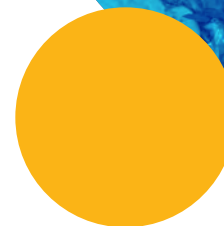


## ELIMINATING WASTE & POLLUTION

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“A circular economy works when waste and pollution are eliminated. Currently, our economy works in a take-make-waste system. We take raw materials from the Earth, we make products from them, and eventually we throw them away as waste. Much of this waste ends up in landfills or incinerators and is lost. This system cannot work in the long term because the resources on our planet are finite.”

– Ellen Macarthur Foundation















## SOLAR POWER

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The O'Brien Solar Fields consist of 20 MegaWatts of locally generated solar energy. It is currently the largest solar array in Dane County and is located less than a mile from Placon's headquarters. The field covers approximately 160 acres and consists of 60,000 solar panels, generating enough electricity to power the equivalent of 6,300 houses. Placon purchased 2.5 MW of locally generated, carbon-free energy from the O'Brien Solar Fields. The energy we receive from the solar arrays offset 3,752,567 kwh at all Placon Madison facilities. Additionally, our Plymouth, MN, facility uses solar power from panels atop its roof.



## ZERO NET WASTE INITIATIVE

The Plastics Industry Association (PLASTICS) Zero Net Waste (ZNW) program recognizes companies that take steps to drive toward zero net waste in manufacturing. Placon is committed to becoming a ZNW company and it starts at the facility level. Over the next few years, each facility will learn how to divert waste from landfills and focus on regenerating nature.

### REQUIREMENTS OF EACH FACILITY:

- Divert up to 90% of their total waste away from the landfill
- Engage employees in environmental efforts
- Avoid landfill costs and generate revenue by recycling



### TIMELINE OF FACILITY PLANS

Plymouth, MN – Done!

Elkhart, IN – 2023





West Springfield, MA – 2024

Madison/DeForest, WI – 2025

Wilson, NC - 2025

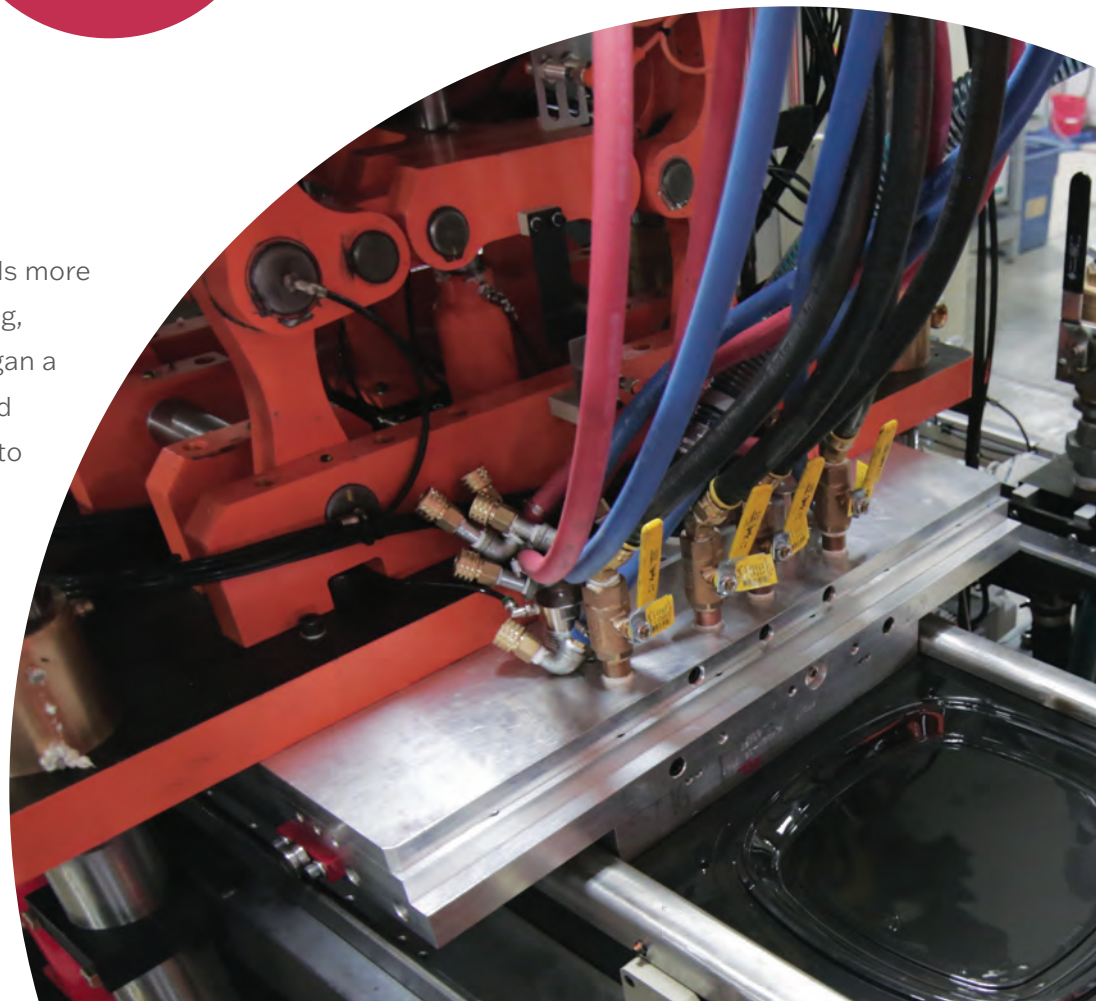




## FACILITY UPGRADES

Placon's headquarters takes part in the Wisconsin Focus on Energy Program. This program improves energy performance of daily operations. We are able to make informed decisions that not only reduce operational costs, but save wasted energy.

For example, significant upgrades to our facilities affords more energy efficient, including, but not limited to new lighting, cooling systems, and controlling air flow. In 2016 we began a compressed air study with positive results. Compressed air is critical to our manufacturing process as we strive to produce high-quality products. Impure air can cause equipment failure and poor air quality at large. Compressed air can be one of the highest energy expenditures in a typical facility and between 80% - 90% of the energy required to compress the air is wasted in the form of heat.







In 2017, we upgraded our variable frequency drives (VFD) to improve the control of our water to meet only the demand needed, reducing wasted energy by over-driving.



Most recently we began a partnership with Madison Gas & Electric that reduces our power during peak moments of the day and during extreme weather event.







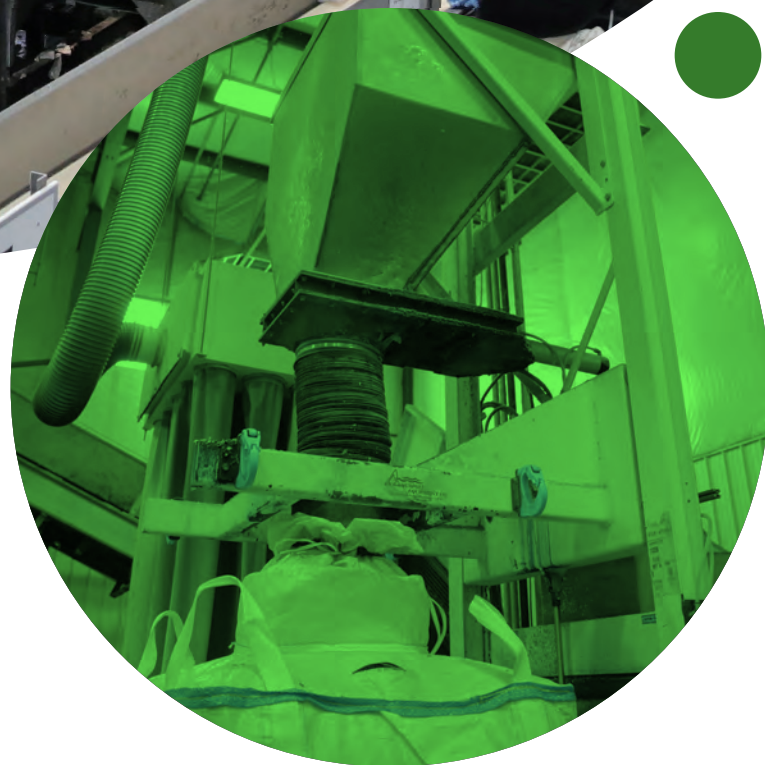


## CIRCULATING PRODUCTS & MATERIALS

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Circulating products and materials encourages keeping materials in use and maintained at their highest value. We believe in circular plastics; packaging designed for circularity and not landfill.






# ecostar®

## UPDATE

Our recycling center covers about 70,000 square feet located on the same campus as Placon's thermoforming headquarters. Placon uses all recycled content and extruded RPET material made at the facility internally across food, retail, and non-sterile medical PET packaging product lines.





Our recycling facility is 12 years old; and As our company is growing and demand for PCR has risen, We are preparing for a three-phase expansion with the ability to accept 100% locally-sourced bales. Currently, we work with multiple sources of PET bale suppliers, including certified ocean-bound plastic, domestically and internationally to obtain the highest flake yield.



## PHASE 1

2023 will bring us a new bottle sorter and flake sorter that will allow us to capture more PET bottles and thermoforms and increase our throughput by 21%.



## PHASE 2

Phase 2 optimizes our curbside-collected bales (from local MRFs). The ability to sort local bales better not only improves the recycling infrastructure in the Wisconsin communities we buy from, but also reduces the cost of post-consumer recycled PET sheet.



## PHASE 3

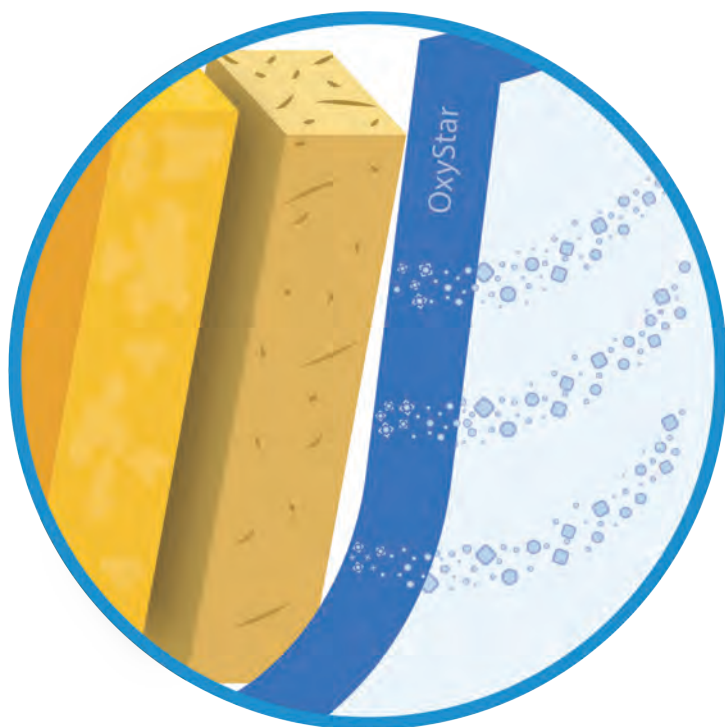
The final phase brings in an additional wash silo to reduce time lost during system startup and shutdown. The final increase in flake output from all three phases is over 15,000 lbs every 12 hours.





## RECYCLABLE BARRIER MATERIAL

When creating our custom food solutions, the main challenge is limiting the amount of direct oxygen contact to reduce food waste. Food waste is linked to greenhouse gas emissions, so producers have been finding ways to limit food waste as much as possible. As a result, EVOH is used in food packaging as a barrier material to limit oxygen contact and food waste. EVOH is great for reducing food waste but is very hard to recycle indicated by the number 7 recycling symbol. With 132,000 tons of EVOH produced annually, Placon took on the challenge of creating a barrier material that was both effective and recyclable. Introducing OxyStar: the first ever recyclable barrier material.



OxyStar barrier material utilizes a multilayer PET with an oxygen scavenging agent. PET has a naturally low oxygen transmission rate (OTR) and this construction slows down the flow of oxygen molecules through the package from the outside. Once the scavenger agent finds an oxygen molecule, it attaches to it and binds the oxygen within the sidewall of the package to keep your product fresh and lasting longer. OxyStar material has a desired use for meats, cheeses, foods with high vitamin C content and high fat content such as nuts and oils.





Creating a package that gives your products a better way to stay fresher for longer and increases product shelf life while making a sustainable impact is how we make simply, better packaging.



The distinct advantage of packaging made with OxyStar barrier material is that it carries a #1 resin identification symbol. As stated previously, other barrier materials such as EVOH cannot be recycled, creating a negative environmental impact. OxyStar products are compatible with PET recycling and reuse processes to support sustainability goals. With its ability to be recycled and reduce food waste, OxyStar is a sustainable barrier option that stands out from the rest.



## POST-CONSUMER RECYCLED MATERIAL CERTIFICATION

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Consumer packaging boasts words like “made from recycled material” or “recyclable,” but do we know what that means? When a product is recyclable, it means it can either be recycled through curbside pickup or at a recycling center. A recycled product is made from that recyclable material. However, not all recycled claims are equal! Two common types of recycling include Post-Consumer and Post-Industrial.







### POST-CONSUMER RECYCLED (PCR)

This material refers to packaging that we, as consumers, toss into our recycling bins, including soda bottles, cans, and boxes. Each type of material has its own process in which it is made into the new product. Utilizing already existing material equals less virgin material needed, which lowers greenhouse gas emissions. It is also cost-effective as money doesn't need to be used to make new material.



### POST-INDUSTRIAL RECYCLED (PIR)

This material is a little bit different in that never actually made it to the consumer. It is composed of left-over scraps from the manufacturing process. PIR has environmental benefits like PCR as less material ends up in landfills by being reused into new products. It is important to question claims that say “made with recycled plastic” or find products that are certified with PCR content.

### SCS GLOBAL SERVICES

Placon has certification through SCS Global Services, an organization recognized by the Association of Plastic Recyclers (APR) to evaluate products made from pre-consumer or post-consumer material diverted from the waste stream. Certification measures the percentage of recycled content for the purpose of making an accurate claim in the marketplace. In 2021 we received certification on our #1 plastic, food-grade PET sheet that is made with 75% post-consumer recycled PET. This means that 75% of any package made with this material comes from PET bottles. In 2022, we added a 100% post-consumer recycled PET sheet to our offering as well.



MINIMUM 75% RECYCLED CONTENT  
POST-CONSUMER



MINIMUM 100% RECYCLED CONTENT  
POST-CONSUMER





## REGENERATING NATURE & COMMUNITY ENGAGEMENT

As part of our Placon Cares program, we believe that by giving back to our communities, we make them stronger, healthier, and more vibrant and, in return, make our environment better to work and live in.



### COMMUNITY SUPPORT

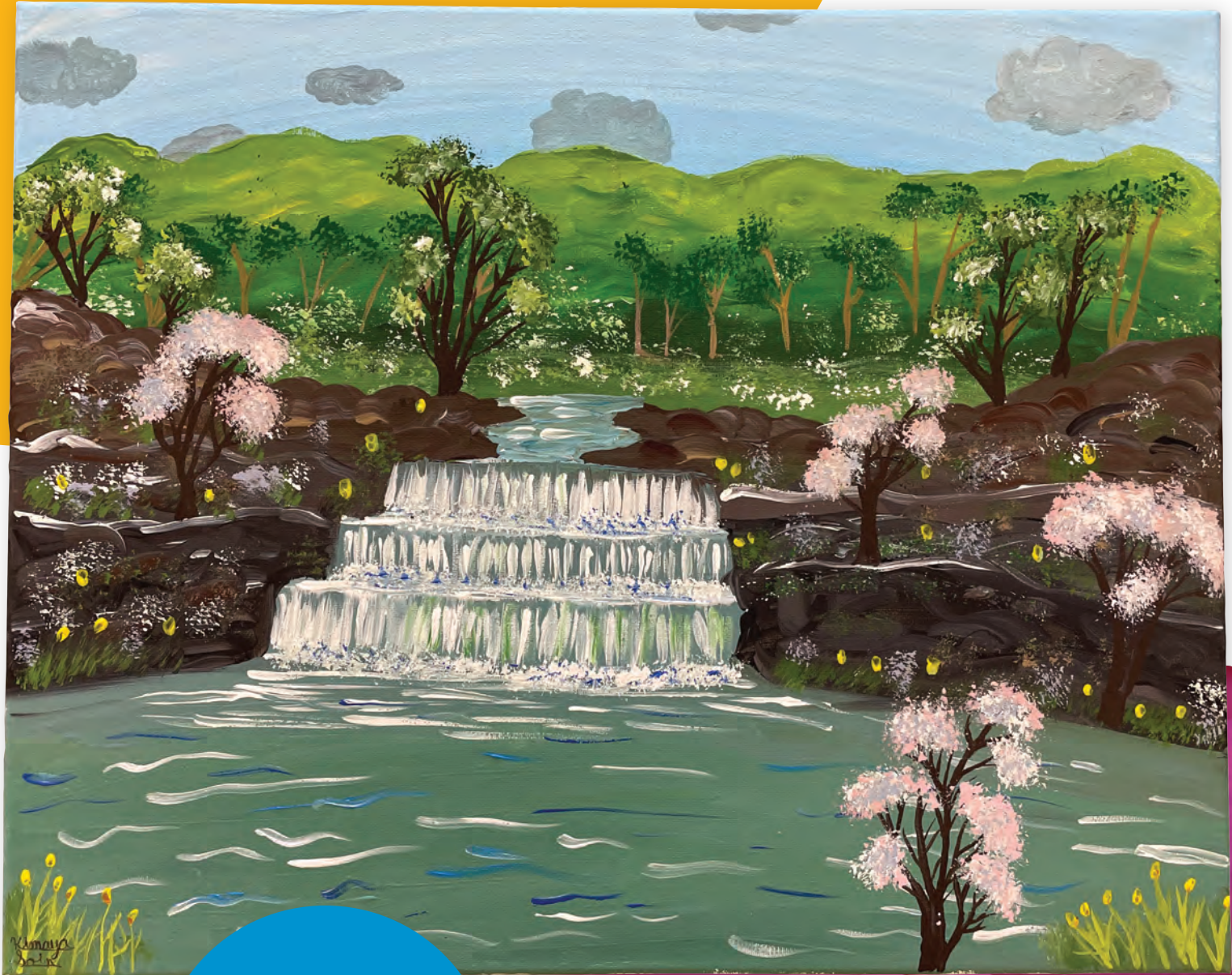
In 2022, Placon team members and corporate giving donated **\$45,642.51** to the United Way and thousands more to other local charities.



### REGENERATING NATURE

Placon partnered with OneTreePlanted to restore a forest! Through corporate donations, we planted **20,000** trees in 2022.





“Youth and children,  
as the next generations,  
have the right to a  
clean future.”

– Green Our World



## EDUCATION

This year, we worked with Velma Hamilton Middle School in Madison, WI, and asked the 6th, 7th, and 8th-grade students to illustrate what the world would look like if everyone took care of the environment. Each submission was unique and beautifully illustrated, and on behalf of Placon, we thank all students who submitted for sharing their vision with us. Honorable mentions are pictured, Katherine Mueller, 8th Grade; Annie Bai, 6th Grade; Lily Baetz, 8th Grade; Irene Miles, 8th Grade; Ella Monson, 8th Grade. The winner of the competition was 7th grader Kimaya Soin.











## AWARD FOR SUSTAINABLE DESIGN

Each year, Placon submits packaging designs to the Institute of Packaging Professionals to be candidates for the AmeriStar Awards. In 2022, we received an award for our tray design for Master Builders Solutions (MBS). MBS needed a solution for the activation powder in their construction adhesive kits. Inside a 2- or 5-gallon steel pail sits a sticky liquid and a bag to hold an activator. Initially, MBS set the pouch in the chemicals, which caused it to sink, get stuck, and even prematurely open and activate, which expired the mixture.

Dubbed Tray Pal, the design replaced a packaging application failing to keep liquid separate from activation pouches. The Tray Pal separated the activator from the sticky substance below, creating a positive customer experience. The Tray Pal is not only made with post-consumer recycled content and is recyclable but eliminates waste as the previous application was prone to premature activation, thus wasting the entire contents of the product.





**WORLDSTAR  
GLOBAL  
PACKAGING  
AWARDS**

## AWARD FOR SUSTAINABLE DESIGN

The WorldStar awards are an annual award given by the World Packaging Organization and are the pre-eminent international award in packaging. WorldStar illustrates the continuous advancement of packaging design and technology to create a standard of packaging excellence.

There are over 60 packaging award submissions and from those groups, the judges select three (3) per category to compete for gold, silver and bronze. These categories are President's Award, Sustainability Award, Marketing Award and Packaging that Saves Food Award. Placon was the only company among all submissions to win more than one Special Award.



### **PACLOCK® BI-FOLD CLAMSHELL**

The Bronze WorldStar Special Award – Marketing category was awarded to the PACLOCK Bi-Fold Clamshell. This package design allows PACLOCK to have 100% more space to hold graphic and product information within the package. More product information allows the end customer to read and learn about the product prior to purchase, which will increase point of sale by having more information at the fingertips of the customer.



### **HOMEFRESH® ENTRÉE**

Our very own stock food product, HomeFresh® Entrée was the winner of the Bronze WorldStar Special Award in the Packaging that Saves Food category. Designed to stack neatly, to avoid tipping over and causing a mess for the end user. It also features a leak resistant lid, vented or non-vented lid options and is microwavable. Simply microwave, wash and reuse. There is no better way to save food and make cleanup easier than with HomeFresh® Entrée containers.





## RESOURCE BLOG

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On July 5th, 2022, Placon released a new blog called Placonomics® focusing on topics in sustainable packaging. Placon is a pioneer in post-consumer recycled solutions and leads the way in helping companies create responsible packaging. Placonomics articles will educate and start conversations around the progress to a circular economy in packaging. Blog articles will release weekly with topics surrounding Greenwashing, Recycling, Plastic Regulations, Common Misconceptions, and more.







## ENVIRONMENTAL SAVINGS CALCULATOR RESOURCE

Since Placon is vertically integrated with an onsite recycling facility, we can calculate the average number of bottles used in our PET packaging for all of our customers. With the help of the EPA greenhouse gas data converter, we can communicate the environmental savings in a meaningful way.

**GREEN HOUSE  
GAS EMISSION  
SAVINGS**

**WATER  
BOTTLES  
SAVED**

**U.S.  
HOMES  
POWERED**

**CARS  
OFF THE  
ROAD**



## GOALS

### *ELIMINATING WASTE & POLLUTION*

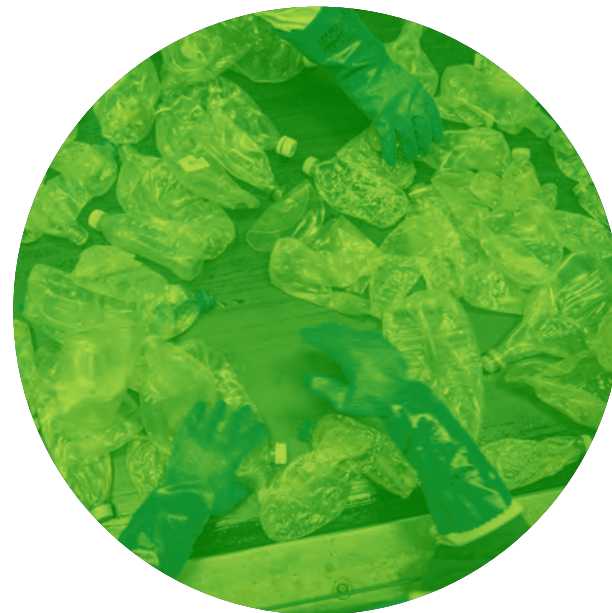
- All Placon thermoforming and injection molding facilities will be eligible for Zero Net Waste certification by the end of 2025
- Increase throughput of curbside collected, ocean-bound, and clear bales by a minimum of 20% in our recycling facility by 2025

### *CIRCULATING PRODUCTS & MATERIALS*

- Develop and launch 25% post-consumer recycled polypropylene offering by 2024
- Transition all PVC & PS stock food and retail products to PET by 2025

### *REGENERATE NATURE & COMMUNITY ENGAGEMENT*


- Engage with local schools and universities to promote recycling education opportunities through internships, awards, and programs










A photograph of a dense forest. Sunlight filters through the thick canopy of green leaves, creating bright, dappled light on a grassy clearing in the foreground. The trees are tall and their branches are covered in vibrant green foliage. The overall atmosphere is peaceful and serene.

"I am only one, but I am one. I cannot do everything, but I can do something. And I will not let what I cannot do interfere with what I can do."

– Edward Everett Hale





We believe in conserving  
resources, and in a world of scarce  
resources, anytime you can use  
something over again you're  
preserving that molecule and using  
it in its highest and best value.  
Everyone benefits from that.

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**Dan Mohs**  
Chairman & CEO

