



**SUSTAINABILITY  
MAGAZINE**

2020/2021

**COVESTRO CSR ENGAGEMENT IN EUROPE,  
MIDDLE EAST, AFRICA & LATIN AMERICA**

SUSTAINABILITY AND THE ENVIRONMENT

SOCIAL RESPONSIBILITY AND  
THE CIRCULAR ECONOMY

INVESTING IN EDUCATION

SOLUTIONS FOR  
LOW INCOME POPULATIONS



# »Introducing our new magazine!«

Covestro is a leading global producer of high-tech polymers, with around 30 production sites all around the world.

We create materials the world relies on every day. Our high-tech polymers are used in nearly every area of modern life and in a wide range of industries: automotive, construction, healthcare, cosmetics, energy, electronics, sports and leisure.

However, the reason for this magazine is that we want to demonstrate that we don't just produce materials. Alongside partners and customers we're taking big steps to tackle a fundamental challenge: The shift towards a circular economy. To achieve this bold goal we're innovating efficient ways to close energy and material cycles, pushing the boundaries of what is possible with polymers.

We are passionate about sustainability, which we have placed at the core of our mission to make the world a brighter place. Sustainability influences everything we do from the research our scientists do in the laboratory to the day-to-day work of our operations and the social purpose work in which our employees are engaged throughout the community.

In all this we are guided by and committed to the 17 United Nations Sustainable Development Goals, which you will hear more when reading this magazine.

We have created an insight into the part of our company which you may not always get a chance to discover, with articles that showcase many of the values talked about above.

**We hope you enjoy reading it!**



## A MESSAGE FROM OUR CHIEF SUSTAINABILITY OFFICER

I joined Covestro in July 2020 as its new Chief Sustainability Officer because I feel passionately about working for a company which sends clear messages about the importance of plastics as part of a sustainable and cleaner future. Plus, we are working hard to contribute towards the UN Sustainable Development Goals (SDGs). These inspire and drive us to create solutions for global challenges such as climate change, increased population and urbanisation.

Our vision is to fully align our company to the circular economy. It's absolutely vital we continue to play our role in enabling a circular economy for plastics, and that we and all stakeholders strive towards delivering on the SDGs to realise a sustainable future for us, and generations to come.

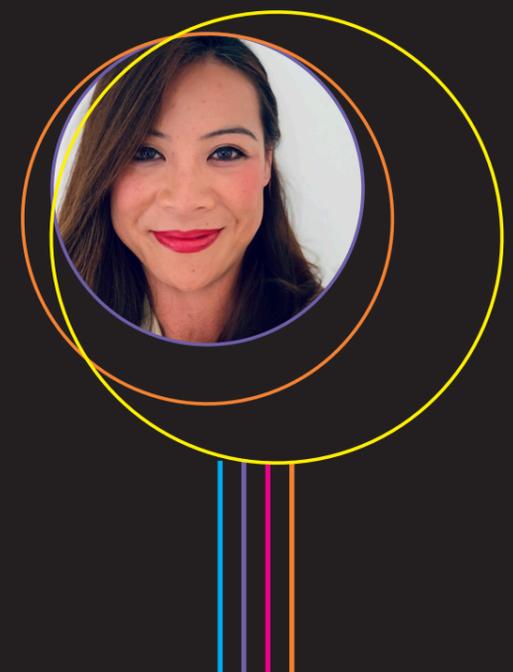
We all have to look at plastic not as a waste material, but as a valuable resource. You can read more about how we embed the SDGs into our business in this issue.

The purpose of our business is to deliver economic solutions to benefit society as a whole. And let's also congratulate our wonderful employees worldwide who have all stepped up due to the global pandemic.

I'm so proud to read about some of the wonderful social giving projects our countries throughout the region have been involved in, from distributing tens of thousands of goggles to frontline staff in hospitals and care homes to making sure some of the poorest communities have enough income to buy the necessities they need during the lockdown period.

I hope you enjoy reading about these initiatives too.

**Lynette Chung**



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# »SUSTAINABILITY AND THE ENVIRONMENT«



## SUSTAINABILITY:

### DRIVING INVOLVEMENT WITH OUR COMMUNITIES

At Covestro, sustainability is at the heart of our mission to make the world a brighter place. It permeates everything we do. Sustainability involves the actions of each employee; the way we conduct our projects, as well as issues of safety, compliance and business practice. It extends to how we act towards stakeholders and take responsibility for products and processes along the entire value chain. It drives the voluntary ways in which we engage with communities to help improve their lives.

Whether it's reducing plastics in the oceans, enabling access to quality STEM education for all students, fostering diversity and inclusion inside and outside the workplace, safeguarding the environment, bolstering the work of our nonprofit sector or ensuring the health and safety of our employees and our neighbours, our people and their bold thinking creates new solutions.

In all of this we are guided by the 17 United Nations Sustainable Development Goals, so we have set ourselves ambitious company goals to reach, taking into account social, environmental and economic aspects.

You'll see a lot of our sustainability activities highlighted here in this magazine. In this chapter, in particular, we focus on how we are helping to encourage bright young talent - both inside and outside the company - to make a difference to our planet.

You will see how the combined efforts of groups of people have resulted in practical initiatives which make a tangible improvement to the environment in which we live, as well as the environment inhabited by other species.

It is thanks to our really committed employees that we are able to carry out these activities at work and in the community.





**HUGH WELDON –  
EVOCCO.COM**



In 2018, European winner, Hugh Weldon, who lives in Ireland, created a new smartphone app through his company, Evocco, to help educate users on the environmental impact of the food they purchase.

Users simply take a photo of their food shopping receipt to receive instant information on the environmental impact of their purchases. The app allows them to track their impact over time, whilst offering personalised advice on how to reduce that impact the next time they shop.

It is a very exciting time for Evocco, which is currently launching Android and iOS versions of the app in Ireland and is preparing a sustainable consumption report.

Hugh explained: "The cash prize from Young Champions helped us to carry out testing and further research. Myself and Ahmad Mu'azzam, the company co-founder, have now taken on three more people.

The app is free to download, but alongside it we are developing systems which will help generate sustainable income into the future, such as integration software to let you integrate your payment card with the app, so you can get information you need even if you forget to collect your shopping receipt.

This opens the door to look at ways we can integrate our app with others, apply the technology and sell it into other areas, such as food delivery companies, or even the clothing industry.

There is a lot of consultative data being generated with food providers to help them understand the environmental impact of what they are selling, and as part of that we are interviewing consumers, so we will be able to package our findings into reports which we can sell on.

»UN Young Champions –  
Where are they now?  
**Hugh Weldon & Anna Luisa Beserra«**



**COVESTRO FINDS OUT WHAT TWO UN YOUNG CHAMPIONS OF THE EARTH ARE DOING SINCE THEIR SUCCESS IN THE COMPETITION**

Covestro is passionate about inspiring young people to help tackle some of the complex social and environmental challenges facing us at the moment.

Our three-year sponsorship of the UN Young Champions of the Earth programme from 2017-2019 enabled us to support an initiative which encouraged young people across the world to contribute to the UN Sustainable Development Goals that we support so strongly.

The programme encouraged 18-30-year-olds to create innovative ideas and solutions, which have a positive environmental impact on our planet. The best seven – one from each continent – were given funding to help develop their ideas. Here we speak to two previous champions, to see how they have progressed.



The new app helps people take control of their shopping's carbon footprint

## TURNING RAINWATER INTO DRINKING WATER – AQUALUZ

Anna Luisa Beserra



Latin America winner from 2019, Anna Luisa Beserra, who lives in Brazil, developed an interest in science and social sustainability at an early age, recognising the opportunities for helping people live better lives.

In 2019, she developed Aqualuz, the product which turned her into a UN Young Champion. Her UN-recognised rainwater harvesting system, which applies the principle of solar water disinfection, is the only technology in the world for cisterns which only needs sunlight to make rainwater suitable for consumption. The system, which disinfects water in just four to six hours, has a lifecycle of up to 20 years and its components can be recycled. At just US\$130.00 it has the potential to benefit over one million families in Brazil with existing cisterns.

Already, more than 387 units have been installed in five northeastern states of Brazil: Alagoas, Bahia – where Anna lives – Ceara, Pernambuco and Rio Grande do

Norte, and there is huge potential for it to help people from hot climates all around the world.

Anna Luisa says: “At first, people didn’t believe the sun can really treat water, but having won awards and with people having seen the media reports of how it made a difference – it helped generate more demand. We have established a brand in Brazil, with Aqualuz becoming a desired product for many Brazilian families.”

For more details of the system, follow this link:

<https://bit.ly/3fQkKGS>

This year Anna Luisa and her business partner, Leticia Nunes, have developed other technologies, two which tackle the problem of rural sanitation and another, Aquaplumi, to combat Covid-19. This technology, already on the market, comprises a pedal operated wash basin that uses rain or running water.

Anna Luisa has recognised the opportunities for helping people live better lives with improved water sanitation



## »World Environment Day – Planting new trees«

Trees are growing thick and strong thanks to the commitment of Covestro colleagues to celebrate World Environment Day, 2019.

Covestro Brazil colleagues were all invited to reveal the personal attitudes and actions they already practise, which relate to the Sustainable Development Goals, so that everyone could learn new ideas and promote more best practices. They set themselves a goal of sharing 200 ideas with each other, and in exchange, Covestro planted 200 native species of trees in a reserve area in Sao Paulo state, compensating for around 26 tones of carbon dioxide. Eventually the final total of ideas exceeded 2,500!

In Antwerp, Covestro CEO, Markus Steilemann, joined a group of colleagues to plant 20 trees for World Environment Day. His sycamore tree was planted near the central entrance gate to the site and was one of a row of trees planted by people from each department.

In Bratislava, 15 colleagues planted a group of trees in the city as part of the ‘Tree instead of a billboard’ initiative. They decided to focus on green space near a housing area as these kind of areas often lack trees.

Meanwhile, in Leverkusen, Germany, employees helped a local initiative for people with disabilities by getting their garden into shape.



Above: trees in the Brazilian reforestation project are now growing tall.



From top to bottom: Antwerp Bratislava Bratislava Leverkusen



# »Clean-Up Days: Put it in the bin!«

## COVESTRO VOLUNTEERS HELP COLLECT EIGHT TONNES OF WASTE

One of the best ways we can help our environment is to keep it clean and clear up waste throughout the year – or prevent it from happening in the first place! See how Covestro has been doing its bit to help.

Covestro colleagues were among **500 volunteers** who descended on an important nature area near the Port of Antwerp, to give it a clean-up. This is the eighth year in a row that people have helped to clean the Galgeschoor nature conservation area, in an initiative organised by Antwerp Port Authority and the nature conservation society, Natuurpunt.

The Galgeschoor is a tidal saltmarsh on the banks of the Scheldt estuary, which creates a unique habitat for many specially adapted plants, due to the variable salt content of the water as well as large numbers of migratory birds and waders.

However the tidal action also deposits large amounts of floating litter. This is collected and processed by a recycling company and sorted for re-use or incinerated to recover energy. This year the volunteers collected **eight tonnes of waste** from the site.



## SEARCHING THE STREETS FOR RUBBISH

In this year's annual Clean-Up Day in Switzerland, 25 colleagues from Covestro collected an amazing 80kg of rubbish from the streets of Fribourg.

Fribourg's annual Clean-Up Day, is part of the nationwide cleaning initiative organised by the **Swiss Competencies Center Against Littering (IGSU)**. Individuals, companies, schools and villages can sign up and participate over two set days to help clean the neighbourhood and contribute to a cleaner Switzerland.



Our sustainability team at Covestro joined in to collect litter and some of the items they found included a coffee machine, a bicycle, a chair, many face masks, empty bottles and plastic items.

## #TRASHTAG TIDIES OUR BEAUTIFUL WOODLAND

**Thirteen colleagues from the Covestro office in Bratislava went to the woods in an area close to the Danube river and in just three hours collected 85 bags of discarded rubbish.**

This was part of #trashtag a worldwide initiative which encourages people to go out litter picking and it has become a regular event for Covestro colleagues.

In a separate event, our colleagues took part in Bratislava National Trust organisation's 'Weekend of open parks and gardens', a regular event which encourages people to visit gardens and small parks in the city centre. We have supported this popular event on several

occasions, by helping with cleaning of the gardens and parks before the event, and volunteering during the weekend itself, including handing out water bottles.



## »Providing a home for nesting birds«



**Colleagues at the Antwerp site never miss an opportunity to create a better environment for wildlife around their site.**

At first glance this just looks like a small sand bank in front of a factory site – but it is in fact no ordinary bank. It was created by colleagues from Covestro's building and maintenance department, who excavated the mound of mountain sand into a straight wall, in the hope that it would become a possible nesting place for shore swallows.

This proved a great move, as a colony of Sand Martins arrived in April, recognised this as a resting place, and created holes in the sandy bank, where they made their nests.

Belgian nature conservation organisation, Natuurpunt, sent a specialist to take a careful look at the site, and found around 100 nests. The birds build their nests with straw and feathers at the end of the tunnels they dig, which can be up to 1.5 metres long, and will lay four to six eggs each. In winter they hibernate to central Africa.



## »Helping the bees in an urban environment with a bee hotel«



**World Environment Day provided another opportunity for employees at Antwerp site to make a greener environment for wildlife.**

This initiative, under the central theme of 'Time for Nature', had a special focus on the role nature plays in preserving our lives on earth, with biodiversity being an important part of this.

Biodiversity is always something we are keen to promote, so there was a buzz of expectation when the managing director, 'sustainability champions' and colleagues from the environmental department created a new feature near the entrance to their site.

In collaboration with, Natuurpunt, they created a large bee hotel, to accommodate many bees and other insects.

They also sowed a colourful flowerbed to help the bees and provide an attractive welcome to visitors.



# »SOCIAL RESPONSIBILITY AND THE CIRCULAR ECONOMY«

## BRINGING VALUE:

## SUPPORTING SOCIETY AND OUR PEOPLE

**As a global enterprise we are aware of our social responsibility and the importance of giving back to society, through taking responsible decisions and actions.**

We are using social engagement to reach the UN Sustainable Development Goals, which are aimed at creating greater justice, resilience and well-being for humans and the planet by 2030.

In this section we show how we create value but also protect the environment and support society's progress. Innovative products, technologies and ideas help contribute to sustainability, safety, comfort and wellbeing. Our partners and stakeholders have similar values and standards.

Operationally, many of our products have a clear benefit for people's wellbeing. For example the polycarbonates applied in safety; corrective or sports eye-wear; or rugged flexible polyurethane foams whose applications include shock-absorbing layers in safety helmets.

Putting these kind of products to good use in a social setting, for

example you will read in this chapter how we have donated thousands of goggles which have been

distributed to organisations in the UK, Spain and Italy, such as care homes, which need them as part of their PPE equipment.

But our social responsibility is also about our own employees, our stakeholders and partners.

Covestro therefore shapes the business relationships it has along its supply chain.

Suppliers are expected to act ethically and with integrity; to protect their workers' human rights and treat them fairly and respectfully in their own company. We ensure that people within our value chain or our own business are not coerced in any way and have good working conditions.

In these pages, 17-31, you will discover how we have helped organisations during the corona virus pandemic; how we have changed the way we do things in our own offices, involving employees in activities which proactively promote wellbeing, sustainability and the circular economy, thus strengthening the integrity of our own business and its people, as well as the societies in which we engage.

# THANK YOU!

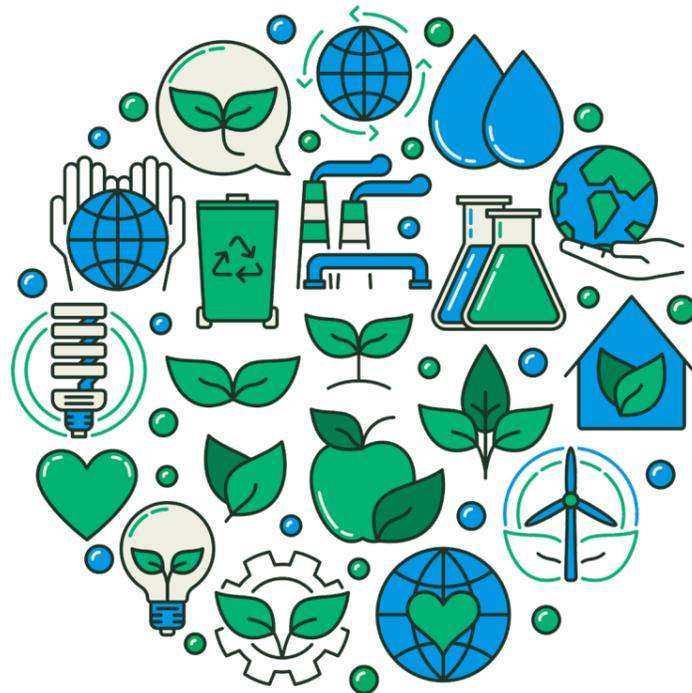
to COVESTRO for donating 10,000 goggles to MedSupplyDriveUK to support health and social care workers during COVID-19 \*



\*and a special thank you to Rachel for making this happen

## »The circular economy: making the most of precious resources«

**Produce, consume, dispose: we've become familiar with the way things have been done in the past. But this rather wasteful way of doing things is no longer compatible with the challenges facing the world today. To take on climate change and preserve our planet, we have to move away from a single-use mindset and find ways of putting our world's limited resources to good use, re-using what we already have.**



At Covestro we are all committed to the concept of making products that last for as long as possible. We apply this principle to the way our products are made and used. Both we and our customers and partners are constantly looking for new ways of recovering everything we can, and recycling it along the value chain. We see waste as a valuable resource – we treat it as a raw material, because it's too valuable to end up in the environment. It's also a way of being proactive and achieving climate neutrality where we reduce and offset carbon emissions.

It's also about our people. We have encouraged our employees to explore as many ways as possible of recycling items we use in our own offices, and to highlight sustainable processes that take place around our many sites. And they are involved in community projects which promote sustainability and the circular economy.

The shift to a circular economy, is helping make our planet a more sustainable, healthier, cleaner place to live. In accelerating this transition, the plastics industry has a prominent role to play, and can solve many of today's pressing issues.



## »Responding to the corona virus crisis«

The corona virus pandemic has changed the way we work. We have had to do things differently in order to stay safe, and that includes extending the protective measures for all our employees in every country. But we have also made it our goal to support our neighbours as best we can and to help people and organisations in countries where there is an urgent need.

Here, and on pages 20-21, you will see some of the ways we have been helping.

Covestro donated 1,000 FFP2 masks to the Westküstenklinikum Brunsbüttel – these are a grade of mask which reduces the wearer's exposure to airborne particles. They were needed at the clinic for doctors and the entire nursing staff.

Dr. Marc Voßkämper (Medical director Covestro Brunsbüttel), and Günter Jacobsen (deputy site manager Covestro Brunsbüttel) handed over the valuable goods to the Medical director of the Westcoast Clinic Brunsbüttel, Dr. Thomas Thomsen.

"We are very pleased about the support from Covestro. We were able to build up a good stock of protective material before the pandemic began. But the help from the neighbourhood creates additional security," says Dr. Thomas Thomsen, underlining in this context the good cooperation between Westküstenkliniken and Covestro over many years.



### Respirator masks given to clinic.

The masks are ready for distribution around the city. Handing them over are (from left to right) Dr. Marc Voßkämper (Medical director Covestro Brunsbüttel), Dr. Thomas Thomsen (Medical director WKK Brunsbüttel), Axel Schultz (Commercial director WKK Brunsbüttel) and Günter Jacobsen (Covestro Brunsbüttel)



## 3D PRINTERS PRODUCE FACE MASKS

In March, with the corona virus pandemic at its height, Dormagen resident, Lars Bognar, an engineer from Ford, came up with a good idea. He had to go on short time work as a result of the corona crisis and as he has experience of using 3D printers, he decided to create temporary masks using the printer.

Using his own printer he created a prototype mask, and with the support of the city of Dormagen, Covestro stepped in and donated €7,000 to enable the purchase of some 3D printers at short notice. It was an innovative idea at the right time.

The idea was launched very quickly in a specially created ChemLab in the centre of Dormagen, with help from the Rhein-Kreis Neuss district, Currenta, the management company and operator of Leverkusen's Chempark, and Covestro.

Since the project launch, the city of Dormagen has purchased more printers from its own funds, and hundreds of masks have been produced for the city's own employees in schools, kindergartens, libraries and administrative offices. It meant the city did not need to buy masks on the market that could be better used in the medical field.

District director of Rhein-Kreis Neuss, Dirk Brügge, said:

» The project shows that in the wake of the corona crisis, thanks to digitalisation we can react quickly to changing situations and market requirements and arrive at effective solutions. «

And in a double benefit, having done their job, the 40 3D printers were donated to secondary schools around Dormagen, giving a further boost to digitalisation in schools.

» I am delighted that Covestro is getting involved in our city and supporting our schools in particular," says Erik Lierenfeld, Mayor of Dormagen. "After the opening of the DINT Forum and the financing of the new atrium at the Kulturhalle by Covestro, the provision of the 3D printers is a further project to strengthen Dormagen as a business location. «

Bettina Mazurek, headmistress of Dormagen's secondary school, added:

» From now on, high-tech equipment will enable us to manufacture a wide range of products quickly and easily, thus giving our students a new dimension of learning. «



Mayor Erik Lierenfeld and Dr. Ute Müller-Eisen (head of North Rhine-Westphalia Policy Covestro, centre) at the handover of the first devices to the head of Dormagen Secondary School, Bettina Mazurek, right.

Source: City of Dormagen

## HELPING OUR HOSPITALS FIGHT THE PANDEMIC



Hospitals and healthcare centres around Spain have been able to purchase essential equipment during the Covid pandemic, following financial or in kind donations from Covestro.

The Hospital de Bellvitge, Barcelona, Hospital Joan XXIII, Tarragona and Hospital Santa Tecla, Tarragona, were able to buy essential materials, like the new shredder, which destroys cardboard bedpans, pictured here being used at Hospital Joan XXIII. One thousand surgical masks were donated to the Hospital Santa Tecla, Tarragona, to help keep doctors and nurses safe. And 10,000 polycarbonate medical goggles from China went to the Hospital de Bellvitge, Barcelona and the Hospital Joan XIII, Tarragona.

## FACE SHIELDS FOR DOCTORS IN BRATISLAVA



At the high peak of the Covid pandemic, colleagues at **Covestro's Bratislava** office supported the **#pomoznemocnici initiative** which was started in response to the urgent requirement for face covers

for doctors in hospitals. Covestro made a donation to the fund, which helped buy doctors the much needed face shields.



## COFFEE FOR THE HARD WORKING PEOPLE

With employees of Covestro all working from home, there was also an idea to donate coffee which was sitting unused in the office storage room during the mandatory home office period. After a little research some big packages of coffee were donated to the **National Institute**

in Bratislava, to help people working for long hours. The coffee was distributed to departments throughout the hospital.

ANYONE FOR COFFEE?



## HELPING A HOSPITAL THROUGH THE COVID CRISIS

In Italy, Covestro donated €20,000 to the Giovanni Paolo XXIII Hospital in Bergamo, which was one of the most severely affected hospitals during the peak of the corona virus pandemic.

Many Covestro colleagues made a voluntary contribution by allocating some of their working hours to fundraising, and a total of 470 hours' worth of their salaries was given to the hospital during April.

» We have very much appreciated the generous donation from Covestro as a tangible sign of willingness to participate in this collective effort to protect the health of the population at such a difficult time. «

Papa Giovanni XXIII Hospital

» WE WOULD LIKE TO TAKE THIS OPPORTUNITY TO THANK ALL OUR COVESTRO COLLEAGUES AROUND THE WORLD FOR THEIR PERSONAL COMMITMENT! «



## » Warm gesture for needy families around Antwerp«

Winter is often the most difficult time for families of low income, but help is at hand, thanks to a special appeal by Flemish radio and television, and the generosity of local people, including employees of Covestro.



The Christmas Charity Action encourages individuals and organisations to arrange a community action or event during 'Warmest Week', so they can raise money. All the events are posted on a website and there are live radio broadcasts, when people can tell others about their activities and the amount they collected.

Our colleagues collected 1,000 items and the company donated a cheque

of €1,000 to match the number of items collected, all of which were given to Mothers for Mothers, a non-profit organisation which helps around 500 needy families.

It is a collection and distribution service for food, clothing, bedding, other homeware products and toys, as well as providing other essential practical services.

Diane Geens, Stef De Wilde, Bram Van Daele, Camila Medina-Guzman and managing director Covestro in Antwerp, Georg Wagner, are pictured bringing donations, on behalf of the many Covestro colleagues, who were involved.



## » Playful colours«

Helping out in the community!

In Raca, a residential part of Bratislava, 10 volunteers from Covestro spent a morning cleaning and painting three children's playgrounds, which were in need of some attention. Helping to make the world a brighter place!

## »Sustainability interpretation boards at Covestro site«



### Sustainability in action: a different way of explaining an industrial site.

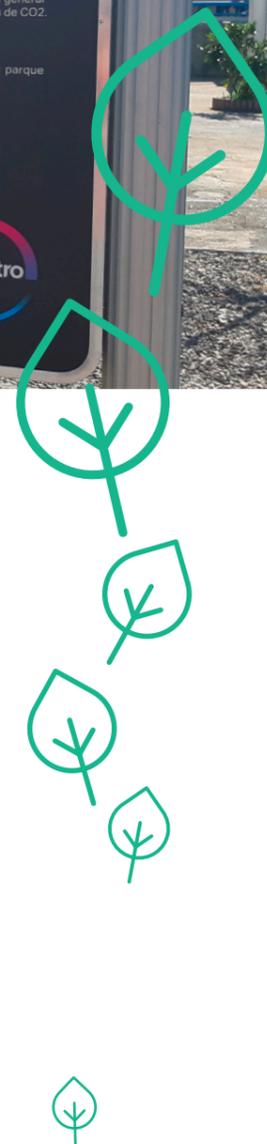
Both employees and visitors to Covestro's production site in Tarragona are discovering fascinating facts about the site's environmental footprint and sustainable processes, thanks to a new 'Sustainability Tour'.

Now instead of just seeing the processes which go on at the site, visitors are taken on a circuit which explains what each part of the site does, its social impact, the environmental footprint and the benefit for the benefit for ourselves.

Panels installed around the circuit explain the information, a book has also been published for the visits and different cards are used to explain our contribution to sustainability on social media.

Not only has the initiative been helpful and informative for visitors, it has also enabled employees to increase their knowledge of sustainability and see how their site contributes positively to it.

The idea was created by Covestro Spain's sustainability group.



## »Energy consumption reduction: what are we doing?«

As part of its corporate social responsibilities, Covestro is doing everything possible in all its sites to optimise and minimise the environmental impact of its production processes. Here are some examples from two of our sites. Energy efficiencies and reduced CO<sup>2</sup> in Italy.

We have used innovative technology to enable more sustainable processes. For example, at our chemical plant in Filago, between 2005 and 2019, we estimate that energy efficient processes and infrastructure have reduced CO<sup>2</sup> emissions by as much as 60 per cent.

The new headquarters building in Filago has been constructed with high performance materials, heat return management, insulation, heat pumps

and LED lighting. There is a photovoltaic system on the roof and new dust collectors. The operating times of fumes extraction hoods are carefully regulated. Elsewhere, street and building lamps are now powered by LED technology. There has been a revamping of the raw materials conveying system and the use of compressed air. Nitrogen use has been reduced in production processes.

By looking at every aspect of our operations and processes we are driving towards alignment with several of the UN SDGs: (7) Affordable and clean energy; (9) Industry, innovation and infrastructure; (12) Responsible consumption and production and (13) Climate action.



## Star performance by Antwerp site

Covestro Antwerp became the first chemical company in Flanders to be awarded the 'Lean and Green Star' from the Flemish Institute for Logistics, for energy efficiency in logistics activities. We earned the star after reducing CO<sup>2</sup> emissions and energy consumption in our logistics activities by 20 per cent within the past five years.

Some of the measures taken included increasing the amount of raw materials supplied by pipeline instead of by ship; adapting packaging formats of products so the load compartment of containers could be optimised; installing a new air compressor so polycarbonate granules can be 'blown' under lower pressure to our storage silos.

## Did you know?

- **Saving electricity usage of thousands of families**

Heat and power at the Antwerp cogeneration plant produces enough excess electricity to provide indirectly, 70,000 families with energy!

The plant produces both steam and electricity, but is extremely energy-efficient as the fuel used for the power generation is re-used to make steam. This also saves a lot of energy in the form of natural gas and CO<sup>2</sup> emissions.

The resulting steam is used in the facilities and the electricity generated is partially exported back to the grid to provide energy.

- **Recycling 70 percent of production plant waste**

Around 70 percent of the waste coming out of the Antwerp production plant is being reused or recycled. Just like having containers at home, we sort our waste too, and it goes into various different containers. We collect about 30 different materials – anything from paper and cardboard to wood, insulation materials, scrap, waste oil, glass, building rubble, lab waste, plastic waste, squeaky foam and so on. Any waste that cannot be given a second life is burned and the energy is recovered.

## »Sustainability & the circular economy starts in the office!«

**All of Covestro's sites and offices have taken a very close look at what they do to prevent waste and be more sustainable. This is all part of a concerted drive to promote a new and more sustainable consumption culture, and is driven by a commitment to goal 12 – Responsible Consumption and Production, from the UN SDGs.**

**All kinds of measures great and small have been taken to change the way we do things which, when taken together, make a great difference.**

**Here, and on page 28, are examples from two offices which have made simple but effective changes.**

### REUSE AND REDUCE!

If you pay a visit to our site in Brazil, you will see we have decided to do things differently when we make tea and coffee.

Three years ago nearly 12,000 plastic bottles were being used and discarded, but then a big change was introduced, and bottle usage started reducing rapidly. Now there are none: visitors are served their coffee in re-useable polycarbonate cups, while employees have an aluminium Covestro bottle to use daily.

Other sustainable actions have also been introduced: in one year, over 45 kilos of coffee capsules were recycled directly with the producer, Nestle. And under the Go4Brighter initiative, created voluntarily by employees, recyclable bags bearing

the Covestro logo were distributed to more than 2,000 colleagues from the São Paulo site, in order to **limit the use of plastic bags.**

In another part of the office our employees are supporting the 3M/Scotch Brite recycling programme with a selective collection point. This particular collection point is for dishwashing sponges, and is a partnership between 3M and Terracycle, a global leader in the recycling of hard-to-recycle products.

Brazil is the first location worldwide with this new recycling system, with São Paulo also adopting it.





### SMALL THINGS MATTER!

Working on the theory that every bit helps, employees at Covestro's office in Switzerland have also been making small changes to improve sustainability. Each employee has been given a glass water bottle and there is more focus on **minimising any plastics** which might simply end up being discarded.

All our colleagues are reminded to print double sided and to **reduce printing jobs** where possible. The number of printers is also likely to be reduced in future, after finding out how many trees all the printing corresponds to, and also to encourage people to think more carefully about whether they need to print items.

## » Keeping in touch with the community during Covid«



### SHARING IDEAS WITH THE BUSINESS COMMUNITY

The Tarragona site has used video conferencing technology to join the scheduled meeting with its Public Advisory Panel, during the Covid pandemic. This non-governmental panel is made up of influential people from organisations such as schools, universities, cultural and business associations and social entities, among others, from surrounding towns and cities. It enables participants to discuss big issues and to share missions

and actions, and communicate with the wider audience.

Covestro's communications director in Spain, Monica Costa Trachsel, said: "It was a good meeting as we were able to talk about the safety measures taken in the factory to maintain production and explain why our products have been essential in the fight against the virus, as well as talk about our social contribution in these times and how the situation has affected the business."



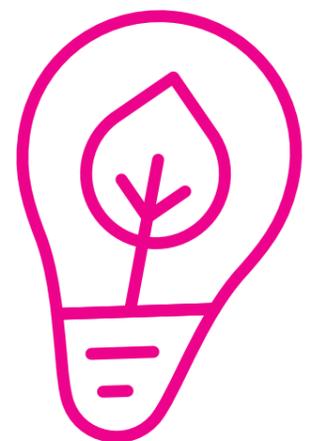
Covid-19 forced us to confine ourselves and change our habits and ways of working. But there are positives to come out of this – and particularly this has been a time when maintaining the relationship with our community has proved beneficial for all.

Covestro Spain has joined the business initiative #EstoNoTieneQueParar (#This doesn't have to stop), with the aim of sharing its experience and contribution in this health emergency and contributing to the country's economic recovery, supporting the work of the entire business community.

This initiative was started to raise awareness of the effort and work of companies and workers who have reinvented themselves or continue their activity during the health crisis, showing that the economy remains active and does not stop.

From Covestro's side, the company has shaped an economic model in which the main environmental challenges such as climate change and protection of biodiversity are fundamental pillars.

» We firmly believe that economic recovery will come hand in hand with investments that protect and create jobs and that promote the fight against climate change as the core of a new economic strategy for the present and future," explained Andrea Firenze, managing director of Covestro Spain.



# » Lockdown: global broadcasting, with tips from a teenager!«

**Communication between individuals and organisations has never been more important in the current environment. When things got tough in the peak of the first wave of the corona virus pandemic, we had to find different ways of doing the things we previously considered straightforward.**

Trying to maintain engagement with the community, sharing experiences and helping others has been a priority for Covestro. It has been made possible not just by learning how to make better use of technology, but also by changing our behaviour.

Covestro's head of External Communications, Niko Palosuo, is the man behind the company's concept of Home Office Talks, which took off after March, and is still growing.

After realising the reality of lockdown and social distancing, Niko was trying to figure out how he could help Covestro

continue its communications with the wider community. Being at home proved the best thing, as he witnessed his 14-year-old daughter's complete mastery of creating videos on You Tube and using different recording devices to do live streaming with ease. Forcing himself to learn quickly, he then borrowed her equipment for a few weeks.

In March he held his first live interview, with Covestro's Hanno Brümmer, global head of Production and Technology at the Polyurethanes Business Unit talking about the role of basic chemicals and value chain efficiency in exceptional times.

Niko launched into hot topics, discussing with global guests the pandemic, people's response to it and what we can all do to help.

The home office became a virtual studio, complete with desk, sofa and office shelving which, as Niko jokes, is all very easy to clean!

**Global broadcasting with Holly Lei, the president of Covestro China, and Professor Jian Zhu, director of Shanghai AUSELL Recycled Material Research Centre.**

High profile guests have included the German federal minister for environment Svenja Schulze, in a discussion with the CEO of Covestro, Markus Steilemann.

Niko says:

» It has worked well because we have guests of very high calibre, and we have valuable interaction and feedback from the audience, who number hundreds – sometimes thousands – each time we do a talk. We have found that streaming live on social media generates ten times more comments than on regular videos. I've now done a live broadcast simultaneously on five social media channels, and that works out at a potential audience of two billion. And some of them tune in on playback to see the talk later.

It's been great fun – I've certainly made classic mistakes along the way! Forgetting to turn the mic on; forgetting that after the sun goes down, the 'studio' then goes into darkness! But the benefits have been significant.

We've explored extremely interesting perspectives on the pandemic; supply chains in APAC; the Solar Impulse with Dr. Bertrand Piccard (solar plane pioneer), which resulted in our highest audience so far, and diversity and inclusion during pandemics. It has also helped our colleagues because I am now training more people to do live streaming.

I never imagined I would have been doing this a few months ago. I would say that in this respect, the pandemic has helped change communications for the better. We now have live interactive communications instead of just pushing out messages via e-mail or social media. It's astounding how quickly it's all evolved since March.

Follow this link to see some of the Home Office Talks on playback:

<https://bit.ly/2HYrPJe>

**Covestro CEO, Markus Steilemann in conversation with German federal minister for Environment, Svenja Schulze.**





## » INVESTING IN EDUCATION «

## FIRING THE CURIOSITY OF YOUNG PEOPLE

Covestro has learned that if we want a STEM (science, technology, engineering and maths) literate workforce which is diverse and inclusive, we need to invest in one.

We support quality STEM education for young school pupils right through to graduate education and into the workplace. Our goal is to ignite all students' interest in STEM subjects, especially those underrepresented in the fields. We want to keep them interested and prepare them for the innovation jobs of today and tomorrow.

Even at early stages we like to think we can encourage young people to be curious and courageous in their choices and give them the education and scope to make a difference in their world.

On pages 34–41 you will see many examples of how we are doing that: for example, we have staged special science days as part of a support programme for girls; held technology days in local communities, and competitions to encourage young people to solve problems.





# » Partnership with National Geographic«

## CIRCULAR ECONOMY COMPETITION INSPIRES NEXT GENERATION OF SCIENTISTS

With a sudden rise in home-schooling and parents seeking lockdown-friendly entertainment, Covestro teamed up with National Geographic Kids magazine to help educate youngsters on the Circular Economy.

The idea was simple: publish an inspirational and informative article and launch a creative competition to get young minds thinking.

For the first competition Covestro asked readers to design a poster about the circular economy and photograph it placed in their window. For the second, children entered an impressive range of homemade projects that were created with repaired, re-used or upcycled materials. We saw everything from highly practical birdfeeders made from bottles, to imaginative sock-stuffed toys!

The eco-conscious winning entries included old food tins transformed into gorgeous pen pots to give as a favour to children who come to your party, waste plastic milk bottles turned into stunning elephant toys and a unique new lease of life for a broken computer desktop converted into bedroom shelves - complete with custom LED lighting!

The top three entrants, Lucy (age eight), Keast (age seven) and Monty (age 14), scooped either an all-expenses paid family day out at the British Science Museum or (due to COVID-19 restrictions) £250 in toy shop vouchers. We also provided each with their very own Covestro lab coat and goggles to help inspire the next generation of scientists.

Our educational resources are still live on the National Geographic Kids UK, website and can be viewed at [www.natgeokids.com/uk](http://www.natgeokids.com/uk). Perhaps you have some children you can share them with or could host your own similar competition?

**ECO-FRIENDLY MATERIALS**  
In a circular economy, it's important to think about how we make things and the materials we use to make them. That's where Covestro come in. They're inventing new materials that reduce fossil fuel and reduce the amount of carbon dioxide (CO<sub>2</sub>) in the air!

**CHEMIST CHAT!**  
Dr. Persefoni Hilken tells us about Covestro's new environmentally-friendly plastic material...

Hi Persefoni! You're a scientist at a company called Covestro. First up, can you explain to our readers what your job involves?  
Well, I work as part of a team that's looking for new ways to develop environmentally-friendly plastic materials. Our main idea is to use carbon dioxide (CO<sub>2</sub>) in our production processes. This was our dream for many years and it's finally become reality! Why is using CO<sub>2</sub> such a good thing? Well, to produce plastic materials you normally need crude oil, which is a natural resource. But with our new technology we use CO<sub>2</sub> instead - which is normally considered a waste product. This reduces the amount of crude oil used in the production by up to 20%. So we preserve natural resources and waste into something useful. Great news! So what do you make from it?  
The new material that we've invented is called 'cardyon'. One of the many things it is used for is flexible foams, which are used in mattresses. It can also be used to make an adhesive which is in elastic sports floors. Are there other things it may be used for in the future?  
We're currently investigating using it for elastic textile fibres, which could be used to make colourful socks or medical textiles, like bandages. So how does this all relate to the circular economy?  
'Cardyon' contributes to the circular economy by taking what would have been an industrial waste gas, and turning it into a new and useful raw material. By doing this, we are recycling, reusing and remanufacturing to reduce input and waste!  
Cool! Waste plastic is still a big environmental problem. How can we change that in the future?  
The first thing we need to do is to avoid throwing plastic away - that is the worst thing for a circular economy. Next we need to find ways to make plastic products that last longer and we can use that for many things - like LED lightbulbs for example. They last up to 50 times longer than conventional bulbs. But we need to be able to recycle it too, right?  
Yes - that's one of the keys to the circular economy! We scientists at Covestro are working on ways to reuse plastic waste again, for example by converting used plastics back into their molecules. Why is science so important when thinking about the circular economy?  
As a scientist you have a good understanding of how the world works. And you can use that knowledge to do research and come up with new ideas. At Covestro, we have a lot of scientists who are constantly looking for new, creative solutions to make the world a brighter place. And scientific developments are very important for helping us to protect our environment. Would you recommend a career in chemistry and if so, why?  
Definitely! Working in chemistry is very exciting. No day is the same and you get to make a difference to people's lives. Plus, you meet people from all around the world who have completely different ideas but share the same passion for science and the environment. And finally, what advice would you give to NG Kids readers who want to be scientists?  
Make sure you ask questions, be curious and try to understand how things work. Science is really such a fascinating topic and it never gets boring!  
Thanks for chatting, Persefoni!

Covestro is working with the Alliance to End Plastic Waste and the EU Circular Plastics Alliance to find innovative ways to recycle plastic.

**WHO IS COVESTRO?**  
Covestro produces innovative plastic materials to make a better world a brighter world.



**COOL COVESTRO COMP!**  
Enter our new competition to scoop awesome prizes!

**THE CHALLENGE!**  
We want you to extend the life of an item in your house that you were thinking of throwing out! Choose something to repair, re-use or upcycle, and then send us a short explanation of what you've done to it, along with a few photos!

There are loads of ways we can get more use out of unwanted items. Check out some of these pics for inspiration, or get Googling!

Bring on the bottle cap art!

Maybe make a bag from old clothes!

Will you mend an old teddy?!

Could you craft a carton car?

The only limit is your imagination!

**WIN!**  
ENJOY A YUMMY FAMILY MEAL!  
CHECK OUT AN AWESOME SCIENCE EXHIBIT!  
WHAT WOULD YOU SPEND YOUR WINNING VOUCHER ON?

**NATIONAL GEOGRAPHIC KIDS**

**HOW TO ENTER!**  
Email your photos and an explanation of your upcycle or repair project (300 words max) to us at [kids@ngkids.co.uk](mailto:kids@ngkids.co.uk) with COVESTRO COMP in the subject line. Don't forget to include your full name, age and contact details. Good luck!

Entry deadline 5 April!

T&Cs: Each winner will receive entry to the science museum of their choice for themselves and their family (up to two adults and four children), a £150 National Geographic Explorer gift voucher, a £200 food voucher and up to £100 towards travel and accommodation. Covestro and National Geographic Kids are not responsible for any loss of items or damage to property. Winners may be required to take part in promotional activity relating to the competition. Covestro T&Cs can be found at [www.natgeokids.com/terms-conditions](http://www.natgeokids.com/terms-conditions)



Keast shows his finished party favour pen pots, made from old food tins covered with wallpaper and comic books

## »A wheely good idea for cleaning up pollution«

When trying to think of the answer to some of our day-to-day problems, it's always a good idea to ask the next generation of bright sparks for ideas.

Covestro does this every year through its significant support of the Design Innovation in Plastics (DIP) competition, held to try to find the products and designers of the future. University students all around the UK and Ireland are invited to design a brand new product made primarily from plastics, with due regard to sustainability and marketability.

This summer, responding to the theme of A Product for Urban Living, **Kristen Tapping**, from London South Bank University, blew the judges away with her **bicycle wheel pollution filter**, which is designed to filter the air as the bike moves forward, giving the cyclist a cleaner ride. The judges recognised the potential and relevance of this product, and praised Kristen for her "outstanding" research.

There was also praise for second placed student, Matthew Foord (Coventry University), who designed a stylish multi-use trolley, capable of being used as a suitcase, a shopping trolley or a laptop holder. Kristen and Matthew are both refining their products, which they hope to bring to market.



## »Talking up science in schools«

School students are being encouraged to talk about important science and environmental topics, thanks to a youth debating competition supported by Covestro in Italy.

In this competition, we invite school pupils from Dalmine Institute of Higher Education, G. Marconi, to take part, and contestants are invited to debate for and against a subject. In 2019 the theme was the Circular Economy and this year, with the event held virtually via video communication, the theme was 'Chemistry: enemy or friend?'

**Barbara Scannavini**



Barbara Scannavini, Covestro Corporate Communications, who organised the debate for the past two years, said:

»It's taken very seriously and we provide an industry level panel of judges to evaluate the debates and choose winners. For instance, last year, jury were invited from PlasticsEurope –

which holds a European level debating competition for high school students; Federchimica, the largest chemical company association in Italy; Confindustria, an industrial association, and Legambiente, the Italian Environmental Association.

At our event, children are divided into two teams, one for and one against, and they have to support their position convincingly, and are evaluated on a range of parameters, including how they construct their arguments and their conviction.«

The debating competition is one of many activities with the Institute of Dalmine in which we are involved, as it has been an ambassador for the school for many years. Activities such as site visits and study groups have been especially helpful for the school, which until a few years ago, had no chemical specialisation.

## WORKING WITH YOUNG PEOPLE IN VULNERABLE COMMUNITIES

**Covestro is supporting a project in Brazil which will give 14-17-year-olds in vulnerable communities the chance to learn about new technologies.**

**AREA21 is a network of labs** which has been created to develop 21st century competencies in new technologies. They provide innovative youth professional education courses, laboratories with all the right furniture and technology, including virtual reality headsets, 3D printers and tablets, to name a few, and the project also provides training for those who deliver the education.

**Covestro has donated to the project** and engaged with groups of students since 2018, helping AREA21 construct its education space, always within an institution – such as a school - located in an area of social vulnerability. It has also helped towards teacher training,

and developed projects relevant to local companies.

Here we picture a group of students from Ana Rosa Institute at Covestro's Brazilian headquarters in São Paulo, where they explored the world of polymer materials, learned about the company's approach to sustainability and innovation, and had a virtual reality experience of the future of mobility. Later, a group of our employees also volunteered to be part of the students' annual graduation event, forming the 'grand jury' responsible for reviewing the students' projects.



## ITALIAN SCHOOL PUPILS SEE BIG INDUSTRY AT COVESTRO'S SITE.

**In Covestro's Filago production plant, Italy, there is also a programme for welcoming young people under 18 to show them how industry works.**

The school pupils visit warehouses and a laboratory where they see creation of powders and liquids and other production processes. Barbara Scannavini, Covestro Corporate Communications, said: "It's really important to invest in young people to help generate their interest in science."

**» We hope that in the future we will be able to continue these visits to our site, which have been temporarily halted because of Covid-19.«**

Italy: students visit the site at Filago



## »Welcome to the wonderful world of polyurethane«

**During the annual Science Day in Belgium, events are held all around the country on a scientific theme.**

Adopting the theme **'Discover the wonderful world of polyurethanes'**

Covestro uses the day to open people's eyes to lots of fascinating facts: for instance, how many of them know that the mattress they sleep on is made from polyurethane foam or that their house is kept warm by polyurethane insulation boards? Very few people know where it has been produced and what the properties and chemical reaction is, when it is being manufactured.

At the Science Day, children were given a taster of how it works when they were

shown how to make their own colourful polyurethane cupcakes, while their parents were given some insights about polyurethane products in their daily lives and about innovations from Covestro, such as cardyon®, the innovative raw material made with up to 20 per cent carbon dioxide.

Ann de Bie, head of Communications, Belgium, said: "We have been participating for more than five years already in Belgium's biggest science event, Dag van de Wetenschap (Science Day), and found it a great way of bringing science and STEM closer to the general public – particularly young people, whose minds are as curious as our mission."



## »Greenhouse donation to environmental group«

**Children from different schools in Tarragona are learning how to grow plants and flowers, thanks to the donation of a new greenhouse from Covestro.**

Covestro has worked with Madre Terra, a not-for-profit organisation dedicated to the promotion of the environment, to enable the donation to happen. Madre Terra works on education projects which help to teach children about environmental matters.

The greenhouse is made of polycarbonate and will allow the children to grow native plants and flowers. It is situated in an educational space that the organisation has next to the Francoli river in Tarragona.



# »SOLUTIONS FOR LOW INCOME POPULATIONS«



## INCLUSIVE BUSINESS: BRINGING INNOVATION TO UNDERSERVED MARKETS

Covestro's Inclusive Business initiative sees us developing affordable solutions for low income populations using our technologies and products.

We work with governmental and non-governmental organisations all around the world on projects which will help improve lives, focusing on important areas such as affordable housing, a secure food supply, as well as water and sanitary facilities.

In line with the UN Sustainable Development Goals (SDGs), Covestro aims to improve the lives of ten million people in underserved, developing and emerging countries by 2025.

By last year we reached more than 650,000 people with Inclusive Business solutions. Typically, the kind of people benefiting from these projects include farmers and their families, schoolchildren or the people employed for the installation of the technology. Examples include affordable housing and sanitation facilities, where we provide PIR based wall and roof panels, and the same materials go into making cold storage houses.

You will see an example in this magazine of our long term relationship with Tshwane University of Technology (TUT) where we are supporting the study of various drying methods for fruit and vegetables, using solar dryers. With the solar dryer domes capable of reducing processing time of some foodstuffs by up to 70 per cent, it potentially saves significant food losses.

This kind of activity is completely compatible with SDG2, which pledges to end hunger, achieve food security, improve nutrition and promote sustainable agriculture – and it is a step towards enabling local production of solar dryers in Africa.



# » Helping hospitals on the frontline of the pandemic «



Delivery of mattresses to Mandera County's Ahmed Ali, left, by Bobmil Industries managing director, Milan Shah, with Covestro country representative Naomi Thiru.

Frontline facilities battling the corona virus in Kenya received a boost after Covestro helped with the donation of hundreds of mattresses.

Covestro worked with its customer, Bobmil Industries, providing raw materials to make **230 mattresses** which have been given to hospitals and healthcare facilities across Kenya.

The mattresses, which come with hygienic, washable covers, will continue to be used long after the pandemic has ended, to improve the capacity of Kenya's healthcare system.

Covestro was proud to receive a certificate of appreciation from the Ministry of Health in Kenya.

Receiving the donations, the director of Special Programmes at the Health ministry, Dr Kepha Ombacho, thanked the private sector for showing solidarity with the government in Kenya as it battles the spread of the virus.

He said the mattresses were being sent to quarantine centres in various border points which had been identified as hotspots. "These donations will go a long way in boosting our response to this pandemic," he added.



Parabola Domes: reducing the risk of spoilage and contamination

# » Supporting farming education in underserved regions «

Covestro is empowering local communities in underserved regions of Africa and South Africa to embark on crop science programmes, thanks to its partnership with a university in Johannesburg.

Financial support provided by Covestro, through the Tshwane University of Technology (TUT) is helping a PhD student with a study programme focusing on alternative drying solutions of produce using solar dryers. Faith Seke is spending three years on her study programme, which will include modules such as how to create fruit juices from solar dried fruit powders.

Solar dryers and drying of fruits and vegetables has proved to be a useful technological advancement for underserved local communities in Africa, so once the current situation with the Covid 19 pandemic has improved, a new parabolic polycarbonate solar dryer, partially donated by Covestro, will be set up in Limpopo.

The dome-shaped greenhouse style dryers use multi-wall sheets from

polycarbonate which create air filled chambers between the sheet layers, increasing the temperature even when it is colder outside, making them ideal for drying fruit and vegetables.

Continuing the theme of education, two training workshops, each attended by 35 farmers, were held in Vhenda, Limpopo Province, South Africa, focusing on topics such as effective pricing strategies and financial management for local famers, as well as corporate governance and related issues.

In total, Covestro's contribution has benefited at least one PhD student, 175 local farmer family members and in future, 150 farmers and 750 family members.

The senior development officer at TUT University Advancement and Partnerships office, Samson Nkosi, said:

» Our journey of empowering communities continues and Covestro's support gives us all the vital impetus we need in this journey. «





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