

# **SUSTAINABILITY REPORT 2020**



# Contents

- 5. About Camfil
- 9. Why we care
- 11. UN Sustainable Development Goals
- 13. Sustainability and Camfil's vision, Interview with our CEO
- 17. How Camfil's filtration solution benefit people, processes and the environment
- 24. How Air Pollution Control at Camfil promotes clean air and health
- 30. Molecular Contamination Control contributes towards sustainability
- 43. 10 years of Camfil's Tech Centre in Sweden
- 46. Coronavirus pandemic and Camfil's virus contamination control
- 48. Reduced waste generation in packaging
- 51. Maintaining safe and health workplaces
- 60. Anti-corruption and business ethics
- 66. 5-year financial summary

**4**2020 at a glance

Year filled with challenges, change and innovation

**33**Sustainability targets and KPIs

Targets that drive innovation towards sustainable improvement in manufacturing and operations

36

**Product Sustainability** 

Environmental impact and life cycle assessment of our products

56

Human rights in our business and beyond

Our commitment goes beyond policies and procedures as we support and comply with UN Global Compact's principles



# Camfil is a world-leading manufacturer of premium air filtration solutions that provide clean air combined with energy efficiency.

As the pandemic took hold around the world in 2020, people started to think again about the spaces we live in and the air we breathe. Because of Camfil's expertise in filtration of harmful airborne particles, our track record as a responsible company, and the trust we had built up with governments and stakeholders worldwide, we swiftly rose to the challenges brought on by this crisis. We protected the health of our employees and broader communities while supporting customers, many of whom provide essential functions. We ensured continued production and deliveries while developing customer offerings. And we maintained our investment in promising technologies.

In this report, we invite you to learn more about the actions we took and their impact from an environmental and a social sustainability perspective – and how we intend to help build and sustain a future that envisions clean air as a human right.

**Achieved further quality and CSR certification** as Camfil Middle East receives ISO 9001:2015 quality management certification and an In-Country Value certification for diversifying local economy and promoting equal opportunities.

Continued investment in R&D with the startup of planned Tech Centre expansion in Trosa, Sweden.

**Invested in the business and secured customer deliveries** with the construction of a new manufacturing facility in Arkansas, USA, following tornado damage.

**Launched a new service**, PowerEye, to help customers predict, analyse and improve gas turbine engine availability, filter replacement points, and capacity forecasting.

**Reaffirmed engagement in equal opportunity** issues by celebrating European Diversity Month to raise awareness of the benefits of workplace diversity and inclusion.

**Strong commitment to gender equality recognized** as several more Camfil units achieve Level 2 GEEIS, a global certification in workplace diversity.

**Stepped up our environmental commitment** by launching Clean Air Week at Camfil, in response to the UN International Clean Air day.

**Assured workforce health** with a global survey addressing remote work and safety concerns in light of the ongoing pandemic.

**Acquired Airepure**, a leading Australian provider of air filtration and airborne containment solutions that shares our principles of enhancing life through high air quality.

**Provided swift disaster recovery response** to tornado damage at a US production facility, successfully protecting the health and safety of our people and operations.

**Began construction of state-of-the-art facility** in China to meet growing demand and address the impact of poor air quality in the APAC region.

**Continued our corporate social responsibility work** with the global CamfilCairing week, where employees run sustainability activities and help to better local communities.

**Expanded leading position in the Nordics** through acquisition of Resema, an ISO-certified, AAA-rated company in Sweden providing air filters and accessories.

**Joined the fight against Covid-19** by producing and supplying FFP2-standard masks to front-line workers in the Stockholm region.

Won the Grand Indoor Climate Prize for Megalam EnerGuard, a game-changing HEPA filter for cleanrooms that meets demands for filter robustness, efficiency, reduced energy consumption, and less waste due to a longer filter life.

# This is Camfil

– who we are, what we do,why we care



55+

Years of Clean Air Solutions. Camfil AB was founded in Trosa, Sweden, 1963 by Gösta Larson



9200

Million SEK net sales



HQ in Stockholm, Sweden





R&D centres









## **Core Values**

### RELIABILITY

We are reliable because we know the market; we are honest and truthful. Our people, products and processes must always meet, or exceed, agreed results.

## COMMITMENT

We are committed to always striving for the best possible solutions, and we are at the forefront of technological and environmental developments in our fields of expertise.

## **CUSTOMER SATISFACTION**

We put our customers first. We focus on identifying customer needs and creating long-lasting customer value.

## **TEAMWORK**

Working together makes us stronger and increases employee satisfaction both locally and globally.

## **LOCAL PRESENCE**

Local understanding and presence in local markets builds customer relations and satisfaction.

# Meet Camfil

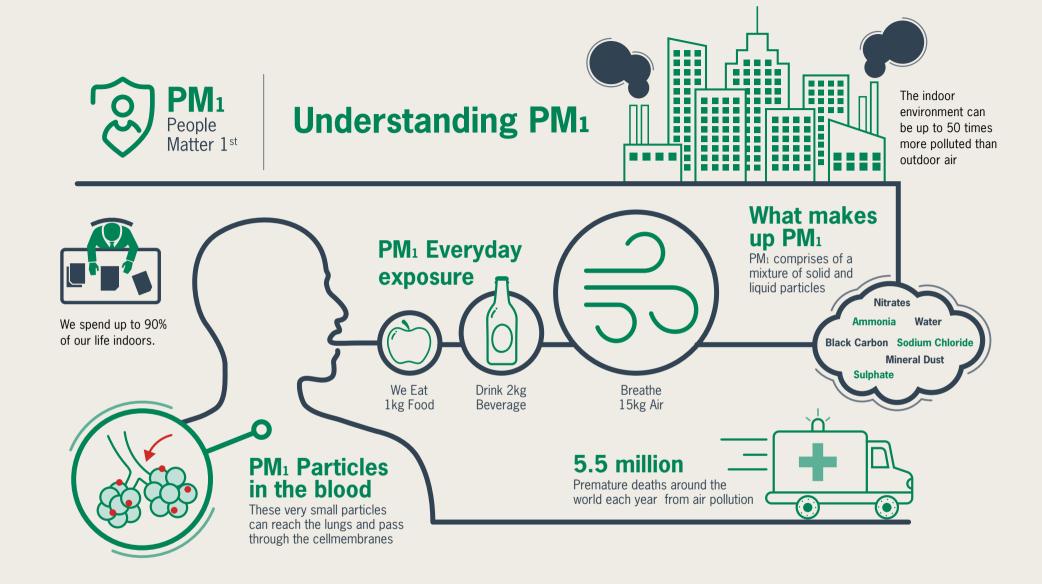
With roots stretching back many decades, Camfil operates in an industry that claims a fairly long history all the way back to the Industrial Revolution. At the same time, the air purification industry has seen incredible advances in technology, and is constantly evolving as technology finds new ways to clean microscopic pollutants that were once thought to be inescapable.

Camfil wants to demonstrate leadership as a world-leading provider of high-quality clean air solutions that benefit human health, improve worker productivity, and keep machinery up and running. The company is on an important, inspiring modern day mission. It's one that addresses contemporary issues people almost everywhere can read about nearly every day, issues that interest them and deeply affect them: human health, saving energy, sustainability, environmental regulations, workplace safety, and corporate social responsibility.

# Why we care ...

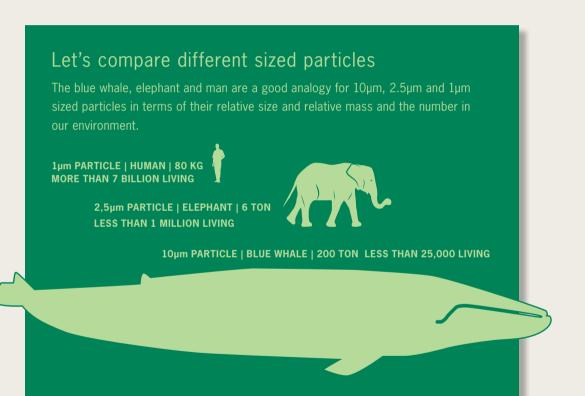
## Making indoor air safer to breathe

Many people aren't aware that the air they breathe indoors can be more polluted than the air outdoors. Camfil advocates educating people about the potential harms of poor indoor air quality. Here are some facts about the air we breathe and why it matters.



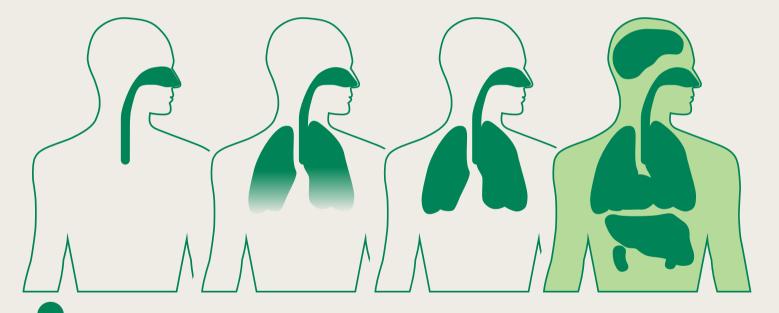
This means that indoor air quality can substantially influence our health

# ... about size



## Why particulate matter matters

Just like people themselves, particulate matter ("PM") comes in different shapes and sizes. The smaller the PM diameter, the greater the risk of PM getting deep into the lungs and bloodstream. Here's how particles and gases penetrate the human body.



Size ~10µm - Coarse particles that reaches the respiratory ducts and can cause decreased lung function.

Size ~2.5µm – Fine particles that can penetrate the lungs and cause decreased lung function, skin and eye problems etc.

Size ~1μm – Inhaleable particles can enter the blood stream and lead to tumours, cardiovascular diseases, dementia etc.

Size ~0.1μm – Ultrafine particles, small enough to pass through the alveoli cell membrane into the blood stream.

# **UN Global Compact**

The UN Global Compact was established to encourage businesses around the world to embed responsibility into their activities. Camfil is a member of the Compact and supports its ten principles and four overarching areas – human rights, labour, the environment and anti-corruption. In fact, our own defined vision is to help make clean air a human right.

We comply with and promote these principles throughout the company, and we report on their progress in this sustainability report. This year, as every year, we updated and submitted a Communication on Progress (COP) to the Compact website as a record of our ongoing commitment. Other examples of this commitment include the following policies and guidelines:

**CODE OF CONDUCT FOR BUSINESS PARTNERS** 

CODE OF CONDUCT FOR EMPLOYEES (CAMFILCAIRING CODE)

**OWNER'S DIRECTIVE** 

HEALTH AND SAFETY HANDBOOK

IT SECURITY AND DATA PRIVACY POLICIES

WHISTLEBLOWING POLICY

TRADE COMPLIANCE POLICIES



# **UN Sustainable Development Goals**

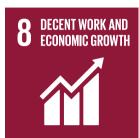
The UN's 17 sustainable development goals (SDGs) and related targets aim to fight inequality, end extreme poverty and protect the world we live in. To achieve the SDGs, businesses must make significant efforts. They must adopt a sustainability mindset, anchoring sustainability in company strategies, core business activities and employee behaviours.

CAMFIL SUPPORTS ALL 17 SDGS BUT HAS IDENTIFIED FOUR GOALS WHERE IT CAN MAKE THE MOST IMPACTFUL CONTRIBUTION.









# SUSTAINABLE CITIES 10 REDUCED NEGULALITIES













We provide satisfactory working conditions for more than 4,800 employees at 31 manufacturing sites backed by strong human resource management and local employee care and health programmes. This global workforce steadily helps us to

increase our annual sales and earnings to contribute to economic growth in more than 30 countries.

We need to continue this work and also ensure that our partners. suppliers and distributors also help contribute to this goal. We do so by strengthening the requirements for the companies we work with to ensure they also provide decent working conditions. In addition to this, we support their growth by doing more business together to ensure economic growth.



The environmental impact of Camfil's production plants is being continuously reduced each year through in-house improvement measures and green initiatives to conserve energy, water and reduce landfill waste. This work will

never be complete, and we will continue to improve our own operations and, in addition, work on minimizing the environmental impact of our products during their lifetime. There are also SDGs where Camfil can contribute positively with our knowledge and expertise.

#### WHERE WE CAN POSITIVELY IMPACT VALUE CHAINS AND SOCIETY AT LARGE



For the best indoor air quality to promote good health and well-being, Camfil offers high-efficiency air filters to remove harmful particles and contaminants in ventilation air, as well as air pollution control systems that collect

dust, mist and fumes in manufacturing for safer work environments.

This is an area where our ambition to always provide better filtration for both particles and gases can help to give people a better life. Once again, it is an ongoing effort where we continue to mix smaller incremental changes with step changes.



Camfil's air filters and clean air solutions are the most energyefficient on the market and create more sustainable buildings in cities around the world.

# Mark Simmons, CEO of Camfil, explains Camfil's sustainability engagement and vision in the following interview.

#### WHAT ARE YOUR REFLECTIONS ON 2020?

2020 was all about finding a new normal and continuity, followed by our need to change and adapt. Sustainability has always been an essential part of our process and it must be met by transforming the life cycle of the product, from manufacturing to waste to logistics and operations. Our business model gives us new opportunities to develop and design solutions that ensure safety, efficiency, and sustainability. The actionable projects started by Camfil generate value for our customers and the community by saving energy and reducing environmental impact during our product life cycle. I am humbled to say that all the work we have done in readjusting to the market situation has intensified our work to adapt Camfil for the future. the future we want to leave behind for the next generation. Looking ahead, we should drive the market with energy-saving solutions that contribute positively to the environment.

### HOW DO CAMFIL'S PRODUCTS PROMOTE SUSTAINABILITY?

Our research and product development team made a breakthrough in HEPA filtration with Megalam EnerGuard, which is transforming the air quality in the cleanroom segment. Thanks to its performance and technology, the product also won the Grand Indoor Climate Prize in Sweden for its advanced premium HEPA filtration for cleanrooms. The filter is sustainable, saves money during operations, and consumes less energy compared to other traditional filters in the market. The new ultramodern, robust, and

reliable media also provides safer handling with minimal risk of damage during transport and installation, and thus a longer lifetime and less waste generation.

Another significant service launched by Camfil Power System to improve the output performance is PowerEye, an advanced predictive analytics tool. It helps you understand the impact that environmental conditions, changing weather patterns, and filter status have on the performance of your gas turbines. The calculated data can help your gas turbine business with filter life predictions and change recommendations that will save money and most importantly reduce environmental impact.

#### DID CAMFIL TAKE ANY INITIATIVES SPECIFIC TO THE CORONAVIRUS PANDEMIC?

Our team managed a swift supply chain effort to meet the growing demand for air filtration solutions in the healthcare and pharmaceutical community due to the airborne virus. Air is life and, in these times, indoor air quality is the highest priority and we need zero compromise.

Our team in Thailand worked closely with local hospitals to equip ambulances with negative pressure space and air cleaners to make the transport safe for both patients and healthcare workers. In Sweden, we started producing and supplying FFP2-standard respiratory protection to front-line workers in the Stockholm region. In Spain, more than 100,000 Valencian students and teachers are now protected against harmful viruses thanks to our City M air purifiers. Also, we work with many bio-safety laboratories

around the world classified as Level 4 (highest risk). All Camfil regions involved have put their best foot forward to help healthcare and front-line workers with their air filtration needs in

these challenging times.

### WHAT ABOUT CAMFIL'S COMMITMENT TO THE UN SUSTAINABLE **DEVELOPMENT GOALS?**

Although we are all facing huge challenges in these times, Camfil is committed to work towards achieving the UN SDGs in the 2030 Agenda. We are continuing our corporate social responsibility with CamfilCairing week celebrated globally among all employees where we run sustainable activities and help to better local communities. For good health and well-being at Camfil, we conducted global surveys addressing remote working and safety. This is crucial to us, as I believe in teamwork that's built on trust and collaboration. We also actively campaigned for the UN International Clean Air Day by spreading the word via all our digital channels about our initiatives, responsibility, and commitment to the environment.

Our strong commitment to gender equality hit another milestone, and we achieved Level 2 GEEIS (Gender Equality European & International Standard) certification for gender equality and diversity. Our headquarters team along with other European teams celebrated European Diversity month and worked on a plan to enable the development of a common culture in gender equality and diversity in the workplace. I am proud of Team Camfil for their dedication and passion for sustainable development. The list can go on, as Camfil Middle East also received an In-Country Value certification for diversifying the local economy and promoting equal opportunities.

#### HOW IS CAMFIL INVESTING IN THE FUTURE?

During the year, the situation allowed us to strengthen our core, the aftermarket, and come out of the challenges more resilient and cohesive. I am proud to share that we have successfully acquired Australia's leading air filtration company, Airepure, and Nordic ISO-certified air filtration company, Resema. We are expanding globally with new manufacturing sites, R&D centres, and SEK 9.2 billion in annual sales globally. We had a setback in March due to tornado damage at our US production facility for the Air Pollution Control division, but we managed to recover with a swift disaster recovery response. We are now investing and securing customer deliveries with the construction of this facility with state-of-the-art equipment and designs. Our legendary Tech Center in Trosa, Sweden, is also in the expansion phase, reaching new horizons in research and development.

Camfil Group is expanding fast and a new facility in China is under construction. This advanced facility will be one of our largest in the world and will meet the growing demand for Camfil's air filtrations solutions to safeguard and protect the people, processes, and the environment from the impact of poor air quality in the Asia Pacific region.

1 have every reason to believe that Camfil is leading the clean air industry forward as we deliver the expertise and solutions our customers and partners around the world need. I will continue to support the UN Global Compact principles in the areas of human rights, equal opportunity, and well-being, along with the reduced and positive environmental impact of our products."

# Owner's Directive guides and shapes our company

Camfil's Owner's Directive is a key strategy document which demonstrates the owners' shared vision, unity and clarity of ambition around the company's values and direction.

# **Key guiding principles**



"Clean Air – A Human Right?"

This vision is intimately linked to issues of sustainability and human rights. Our vision embodies our role as champions in the fight against indoor air pollution and elevates the issue of clean air as a basic human right. It aligns with UN sustainable development goal 3 (Good health and well-being) and goal 13 (Climate action).



"Sustainability"

Our core tenet is that sustainability is not something we do – it should be who we are. We were the first company in our industry to produce a voluntary sustainability report 10 years ago. Today, we continue to set new KPIs and goals for environmental, social and economic sustainability that will positively impact our workforce, our customers and other stakeholders.



"Innovation Leader"

We are not just a manufacturer of clean-air products.

We are an expert in the field of air quality and continuously innovate to produce air filters that are more efficient and use less energy. Because we manufacture in-house, we can better uphold our strict quality standards as well as gain the flexibility to adapt to changing market and customer requirements.



"Cool Heads,
Passionate Hearts & Clean Hands"

Another important aspect is the way Camfil does business. We operate to the highest standards and have many policies in place governing our behaviour internally and towards the customer. The products we sell to our customers are the same ones we trust and use ourselves. And we want it to be clear to everyone in the company that they must step away from a deal if they feel it might be in conflict with Camfil's values.



FILTRATION SOLUTIONS (HVAC)



AIR POLLUTION CONTROL



POWER SYSTEMS



MOLECULAR CONTAMINATION CONTROL





Camfil's filter offering constitutes the majority of our business. We offer a huge range of high-quality, energy-efficient and rigorously tested solutions that clean the indoor air for nearly any filtration or containment need. Whatever the product, the end product is clean air – free from harmful pollutants, dust, dirt, allergens, radiation, molecular gases and, in some cases, even life-threatening viruses.

Camfil's promise to our customer is the right air filtration for the application with the lowest total cost of ownership, both for the customer and the environment.

# How Camfil filtration solutions benefit people, processes and the environment

Our filters benefit customers and the wider society by improving people's health and performance, protecting critical manufacturing processes, boosting productivity and safeguarding the environment. They are proven to be some of the most energy-efficient air filters on the market today, so they also help building owners reduce their energy consumption and carbon footprint. And through this, they help to lower the significant operational costs associated with customers' HVAC systems.

We generally categorize our filtration solutions into three main benefits: **comfort, clean process, and containment**. Our "comfort" air filters are found in heating, ventilation and air-conditioning (HVAC) systems in places like offices, schools, commercial buildings, government buildings, homes, hospitals and airports. These products deliver clean air that protects people by improving the indoor air quality (IAQ), protecting the HVAC system from contamination, and helping the building owners reduce their energy consumption and carbon footprint.

In cleanroom processes, our efficient particulate air (EPA), high-efficiency particulate air (HEPA) and ultra-low particulate air (ULPA) filters protect sensitive advanced manufacturing processes, prevent microbiological contamination in research labs, and eliminate infectious airborne contaminants in the healthcare sector. In heavily regulated industries with strict quality requirements, at manufacturing plants that produce pharmaceuticals, food, or for critical laboratory services, our filters protect the people involved in the processes and ensure the integrity of what is being produced to reduce both human and financial risks.

In the healthcare industry, they meet the most demanding needs and safety standards to contain and serve as the main barrier against highly hazardous biological agents and microorganisms. Camfil has provided top-level biosafety laboratories with air filter systems and filter housing to prevent the release and spread of microorganisms that cause life-threatening diseases like the coronavirus, Ebola, SARS, polio and more.



# New filter products and tools

WINNER

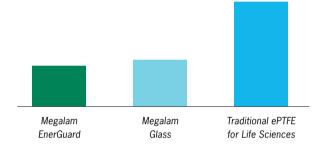
2020

2020 saw the successful worldwide launch of Megalam® EnerGuard™, a step-change breakthrough in HEPA filtration technology for cleanrooms. It efficiently separates particles from ventilation air, maintains a lower pressure drop, and delivers higher energy savings than traditional fiberglass filters.

Certified for life science use, EnerGuard meets the strictest requirements for safety, traceability and control.

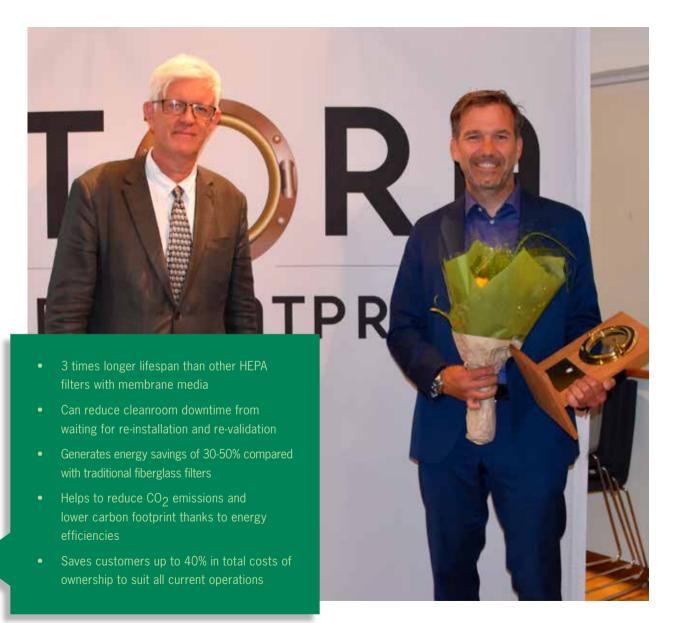
## TOTAL COST OF OWNERSHIP OVER 10 YEARS OF SERVICE LIFE IN COMPARISON

Based on 100 filter installations



# EnerGuard wins 2020 Grand Indoor Climate prize

In June, this advanced HEPA filter took home first place in the Grand Indoor Climate Prize awards. EnerGuard won the prize for its innovation, high filter efficiency, and a combination of the best features of traditional fiberglass and membrane filters. The prize also recognizes Camfil's commitment to producing outstanding products with a superior sustainability profile that meet today's demands for efficiency, reduced energy consumption and less product waste. Here's how.



# Air Image Sensors – a smart sensor system for air quality monitoring, analysis and reporting

Air Image, Camfil's intelligent sensor system for air cleaners, enables customers to easily monitor and control their indoor air quality and energy consumption. Users simply connect their Camfil air cleaners to the sensor. Air Image then measures PM1, PM2.5, humidity (RH), and room temperature and provides readings in real time to help users monitor, track, report on and improve the air quality in their buildings.

It can adjust the operational levels of each air cleaner based on the measured concentration of particles and gases indoors, helping to save energy. The sensor also produces an "air image" in the form of detailed air-quality reports that are easily accessible online, on any device, via a dedicated page at airimage.camfil.com. The data can also be displayed on TV screens in critical areas. Hotels, gyms, restaurants, office buildings, warehouses, and production facilities are examples of industries successfully using the Air Image sensor to ensure high indoor air quality.

The Air Image even sends filter changeout reminders when HEPA filters are due for replacement.



### **BENEFITS OF AIR IMAGE SENSOR:**

- Syncs with Camfil air cleaners to get realtime data on each filter instance anywhere in the world
- Measures and compares against WHO guidelines to ensure buildings comply with thresholds
- Reporting tool allows full visibility to management and auditors
- Reduces energy costs through smart operations
- Improves the operational lifetime of filters

STRONGER, LIGHTER, GREENER Absolute V The smart energy hero Absolute VE is 41% lighter than the average comparable metal filter. 2020 also saw the launch of Absolute V Less weight translates to less disposal fees high-airflow HEPA filters, a victory for sensiand improved sustainability. Although they are tive processes. This new range offers some of the lightweight, they offer superior strength and stability. most energy-efficient filters on the market. Lightweight, With an improved filter media and advanced dynamic robust and easy to handle, they provide the best protecdesign, Absolute V features the lowest environmental tion with minimal total cost of ownership when installed footprint product in its category: a 23% energy savings in air handling units or in-line HEPA housings.

compared with the market average of comparable filters, at half the weight. A true smart-energy hero.



# Megalam EnerGuard safeguards critical operations in the life sciences

When a major biopharmaceutical company began to experience problems with leaky filters in its R&D lab, it turned to Camfil's award-winning EnerGuard<sup>™</sup> filters for help. The result? Purpose-built filters with close to 100% efficiency, zero installation failures, minimal unplanned filter changes – and significant savings in time and energy.

#### WHEN TIME, MONEY AND SAFETY ARE ON THE LINE

Camfil's client, a global manufacturer of injectable pharmaceuticals, filtered the air supply in its lab with ceiling-mounted HEPA filters made of industry-standard glass fibre filter media. Even with strict controls in place to limit damage to the sensitive environment in each filter area, they began to encounter filter failures due to leaks in the media. What followed was the ingress of unfiltered air in the critical spaces, filter replacement downtime and expenses, and time-consuming, expensive protocols around documentation and certification.

#### FROM INDUSTRY STANDARD TO INDUSTRY LEADING

Despite new inspection and installation procedures to combat the problem, random filter failure persisted. The cause was not always clear, but was likely from damage to the glass fibre media during routine room and equipment cleaning. With each damaged filter, huge amounts of time and money were wasted – and the integrity of the company's research projects threatened.

That's when the client decided to switch to the recently launched Megalam EnerGuard HEPA panel filters, developed using a new polymer fibre media technology and a particulate depth-loading capability for longer service life. Not a single one of the 45 units shipped was damaged during delivery or installation thanks to the filters' robustness. The filters are specifically designed to be oilaerosol tolerant for life science applications, and are individually tested and certified to a minimum efficiency of 99.995%.

"The robustness of these filters saved so much money due to zero installation failures and unplanned filter changes that the energy savings versus glass would just be icing on the cake."





# Protecting the health of teachers and students

Children spend hundreds of hours a year indoors in classrooms, with the goal of learning and developing. But schools are especially prone to having poor indoor air quality, and opening the windows simply isn't enough to solve the problem. Air purifiers equipped with HEPA filters are proven to lower the risk of infection in classrooms, opening a real window of opportunity to safeguard teacher and student health.

### AIR FILTERS A CRITICAL TOOL FOR RISK REDUC-TION STRATEGIES IN FIGHT AGAINST COVID-19

The regional Department of Education, Culture and Sports in Valencia, Spain, understood their weighty responsibility and took swift action. Together with experts and researchers from the Institute of Environmental Assessment and Water Research and the MESURA Association, they published a guide for Spanish schools on classroom ventilation.

The guide is based on the latest research from the scientific community on how the SARS-CoV-2 virus that causes Covid-19 spreads. It concludes that the infection risk is reduced by decreasing emissions and exposure to airborne particles, or aerosols, which are likely to contain the virus. Besides measures like face masks, physical distancing and improved ventilation, installing air purifiers with HEPA filters can help eliminate or reduce the concentration of these dangerous airborne virus particles.

## CITY M PURIFIERS IN SCHOOLS PASS THE TEST WITH FLYING COLOURS

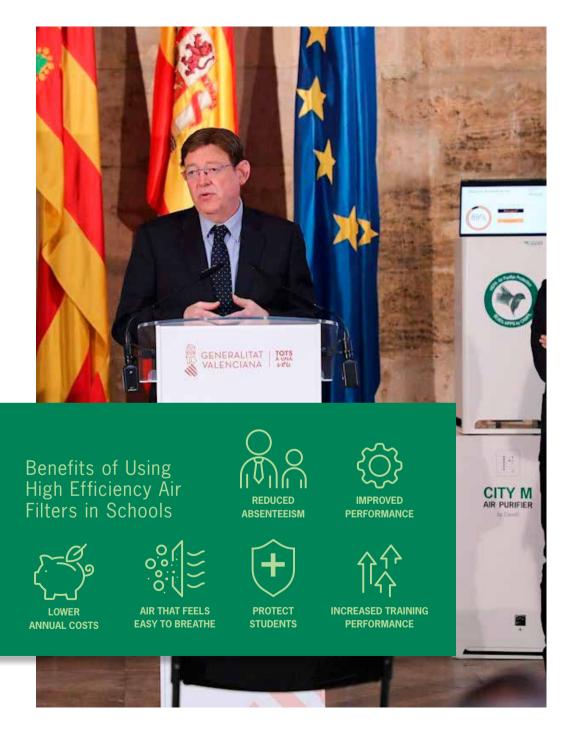
The regional education department had Camfil conduct an indoor air quality study at the La Patacona secondary school in Valencia. They used Camfil's City M air purifiers equipped with HEPA H14 filters and observed the air quality in a 50-square-metre classroom with 20 students. An acceptable level of indoor air quality for this scenario is normally 20 micrograms or less – but with Camfil's product in operation, the concentration of PM2.5 particles dropped to below 3 micrograms.

Today, more than 100,000 Valencian students and teachers are being protected against biological agents like SARS-CoV-2 thanks to our City M air purifiers. They are widely recognised as the best HEPA H14 filters available, providing the largest filter surface area on the market for this type of purifier and a market-leading low-pressure drop. This, together with the use of high-power premium fans, provides

long filter life, less waste, low maintenance costs, low noise levels at maximum flow rate, and very low energy consumption.

With a filtration efficiency of 99.95%, the City M's EN1822-certified filters outperformed other technologies when Valencia awarded this contract to Camfil – a grade that's hard to beat when it comes to protecting the health of our teachers and schoolchildren.





# Camfil celebrates Clean Air Week

The 2030 Agenda for UN Sustainable Development outlines a road map to achieve the future we want to build. We have marked the week starting 6th September 2020 as Camfil Clean Air Awareness Week. We shared important information about the importance of clean air and the impact of both indoor and outdoor air contaminants on our health.

While outside air can be hard to control, there are things we can all do to improve the air around us when we're inside - in our homes and workplaces. We also shared useful insights about the everyday choices we make in designing the future we want. From buying sustainable products to recycling.

# SIMPLE ACTIONS TO #CLEANAIRINDOORS

Turn off electric appliances/lights when not in use

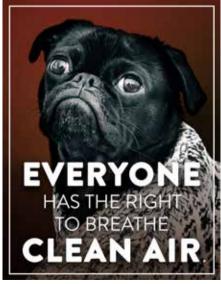
Use efficient and clean sources of energy Consume food produced in a sustainable way

Ensure you have good ventilation and air filtration system recommended for your area Avoid using air fresheners or scented products as they produce hazardous particles in the air

Cut down on solid waste, disposable items & single use plastic











Camfil Air Pollution Control (APC) develops and produces dust, fume and mist collectors for industrial exhaust-air cleaning. These extraction systems are used across a wide range of applications and industries, including metalworking, pharmaceutical, automotive, food and beverage, and mining. Many manufacturing processes create dust, fume or mist that can harm workers' health and cause machinery to be less productive.

# How solutions from Camfil Air Pollution Control promote cleaner, healthier work environments

We help our customers go green by improving indoor air quality, helping them comply with safety and environmental regulations, and preventing high levels of pollutants from being exhausted to the outdoor environment. Our systems themselves are based on the latest filter technologies that combine the highest cleaning efficiencies, long operation and low energy cost.





#### OTHER SUSTAINABILITY-RELATED BENEFITS INCLUDE:

- Helping to prevent health problems caused by dust, fume and mist particles, fire and explosions
- Preventing safety risks such as falling and visibility problems caused by so-called nuisance dusts and mist in the workspace
- Reducing worker discomfort from allergens found in processes and protecting valuable equipment from contamination
- Enabling companies to comply with local and national air-quality requirements both inside and outside the factory

# Air Pollution Control flagship product

Camfil's Gold Series X-Flo industrial dust collector is a best-in-class dust collection system that manages all kinds of toxic and combustible dusts and fumes, including fine, fibrous and heavy dust loads. It processes dust with maximum air flow and dust processing power while delivering energy efficiency during use. The air that comes out of a Gold Series collector has been tested and proven to exceed the air quality required in most hospital rooms.

The Gold Series uses our patented Gold Cone™ filter cartridge to deliver clean air and long service life while using the smallest floor space of any dust collector currently available. It allows facilities to

reduce the number of filters they need to use and replace.

The innovative cone shape of the media expands the usable area of the filter, enabling a reduction in the number of filters by at least one-third.





# Partnering in leading-edge technology for critical cleanroom applications

G-CON Manufacturing, a mobile cleanroom provider, and Camfil recently teamed up to combine their leading-edge technologies to meet the needs of a well-known pharmaceutical customer.



G-CON provided PODs, unique prefabricated cleanrooms that are readily deployable, mobile, and scalable and thus ideal for multi-product sites and rigorous containment needs. And Camfil provided its Gold Series Camtain GSC2, a cartridge dust and fume collector that combines enhanced performance with ease of service while cleaning the work environment of irritating dust and fumes.

#### HOW TWO TOP TEAMS BROUGHT THEIR A GAME

G-CON customers want turnkey solutions. For G-CON, this often requires working with other equipment and system manufacturers. They immediately recognised the need for collaboration with a high-quality dust collector manufacturer.

So, design teams from both G-CON and Camfil worked together to design the Camtain® into the POD for customer approval. For this project, multiple PODs were combined to produce a manufacturing facility for an oral solid dosage form where dust control and mitigation is essential.

## CAMFIL'S PRODUCTS FIGHT POTENT PHARMACEUTICAL DUST IN HIGH-RISK ENVIRONMENTS

As with other pharmaceutical applications, there are two areas of concern when handling pharmaceutical dusts – the potent, toxic, or allergenic properties of the compound exposed to personnel and its explosion properties.

The first issue involves understanding the material's toxicological properties, reviewing the occupational exposure limit, and evaluating the risk of exposure



to determine proper control methods. Some level of isolation and containment is usually needed because pharmaceutical dust is extremely potent while it is being captured in a non-production area and cannot be released into the surrounding environment.

The second concern involves the potential of explosion and resulting fires. Control measures might be needed depending on the physical characteristics of the dust relating to various factors.

#### A NEW DIRECTION FOR PHARMA MANUFACTURING

The processing equipment for this particular POD needed a dust collection system that would also meet specified height limitations and floor space. In the end, Camfil's dust and fume collector made the best choice.

The technologies and collaboration represent a new direction for pharmaceutical manufacturing. Instead of using product-dedicated buildings that are expensive and inflexible, these POD facilities can be built more affordably and much more quickly. The benefits include lower cost of growth, on-demand scalability, fast-track construction, affordability, predictable cost and timeline, and the ability to repurpose the PODs once the production process reaches the end of its lifecycle.

This project is an excellent example of how working with Camfil helped integrate multiple leading-edge technologies into a single custom offering.



Camfil Power Systems (PS) provides filtration and acoustical solutions for turbomachinery including gas turbines, generators, industrial air compressors and diesel engines. Turbomachinery technology has evolved tremendously over the past decades. But this progress has also made turbomachinery more susceptible to fine particulates that cause fouling and corrosion, leading to more rapid degradation of performance. At the same time, stricter emission regulations are requiring newer, more efficient technologies on the filtration side that are adapted to changing environmental conditions.

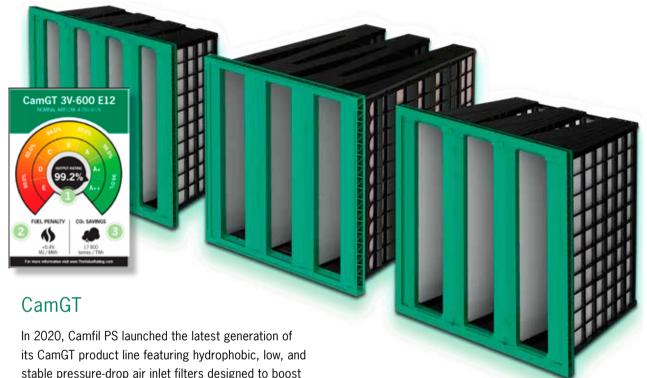
Power systems solutions optimise engine performance, extend equipment component life and increase uptime by removing particles that could degrade the turbomachinery due to erosion, fouling and corrosion. They are manufactured to the highest standards and are equipped with proprietary Camfil filters to ensure that customers operate their assets reliably and efficiently.

## The Value Rating

Power Systems introduced The Value Rating classification system to simplify the filter selection process for gas turbine operators in the power generation and oil and gas industries. This simple, intuitive online calculator helps users easily evaluate the efficiency and quality of primary air inlet filters.

The Value Rating shows the impact a final filter will have on a gas turbine's performance in terms of power output, fuel consumption, and carbon emission. It makes the complex decision of selecting a filter for gas turbine simple. It requires four simple inputs - filter efficiency, airflow, initial pressure drop, and filter pressure drop after 250 grams of dust loading - with the click of a button. Based on an international standard and the latest published data from gas turbine manufacturers, the tool provides a performance comparison in seconds. With this actionable data, operators can then compare and make the best filter selection for their gas turbines.





stable pressure-drop air inlet filters designed to boost turbomachinery performance.

With a global installed base of tens of thousands of filters, CamGT filters are engineered to excel under extreme conditions like in offshore or coastal environments, where turbomachinery must fight high humidity, salt-laden air, heavy pollution or fine particulates. They are designed for EPA efficiency to boost power by virtually eliminating degradation while maintaining a low and stable pressure drop. They boost uptime by eliminating maintenance requirements

for filters and engine parts. And they boost profits by significantly reducing operating expenses. The new features will increase equipment availability, reduce corrosion risk, improve fuel efficiency and reduce carbon footprint per MWh produced.

CamGT's filter frames are manufactured using recycled plastic frames to further reduce their carbon footprint. During the manufacturing process, less plastic and foamed glue are used to reduce the use of petrochemicals.

## **PowerEve**

PowerEye, the industry's first predictive analytics service for air inlet filters and gas turbines, delivers key insights on turbine performance, increases engine availability, optimizes filter change-outs, and improves capacity forecasting. Equipped with intelligence from PowerEye, operators can address potential issues that would have otherwise resulted in downtime and equipment failure.



With years of field-testing experience on a variety of filter types. Camfil has developed algorithms to predict how different filters and atmospheric conditions will react and affect the performance of gas turbines and other turbomachinery equipment. These quantified insights drive higher power output and reduce operational expenses – and ultimately improve fuel efficiency and thus reduce carbon emissions.



# CamGT filters improve availability, reliability and efficiency at cogeneration power plant

A cogeneration plant operating 368 MW gas turbines in Singapore suffered from availability, reliability, and efficiency issues. To improve the situation, Camfil performed on-site and Life Cycle Cost analyses and recommended the CamGT filters for the challenging site conditions.

#### CHALLENGING SITE CONDITIONS

In the case of this power plant, many of the contaminants were coming from nearby power producers and refineries, as well as Mother Nature herself. Every summer, a large-scale haze caused by forest fires in Indonesia reaches Singapore. The plant also operates in salt-laden air, and year-round humidity ranges from 70 to 90%. PM2.5 ranges are 130% greater than the national average.

These challenging conditions were causing heavy fouling, which is a form of gas turbine degradation, required the plant to offline water wash their engine every two months. Final filter pressure drop was significantly high and

### **FOULING**

Particles that builds up on blades and guide vanes resulting in reduced compressor efficiency. Most fouling is recoverable but some is permanent.

unstable, causing the plant to derate their engines, and corrosion was detected in both the cold and hot sections of the gas turbines which can be detrimental to the life of the gas turbine. From a sustainability standpoint, an inefficient system would require more fuel being burnt and higher CO<sub>2</sub> emissions per megawatt hour.

## HARSH CONTAMINANTS AND TOUGH ENVIRONMENTS NO MATCH FOR CAMGT FILTERS

The operator finally turned to Camfil to improve their degradation issues, eliminate unwanted downtime, extend the final filter life, and stabilise pressure drop. Camfil performed a LCC analysis, which showed that the plant could save about 1.56 million US dollars every three years for each gas turbine by installing a two-stage static system using a combination of bag filters and compact final filters.

**The result?** The CamGT filters eliminated 6 offline washers per year, improved compressor efficiency, and boosted power output.





Molecular Contamination Control (MCC) products remove molecules, gases and vapours from the air that cannot be captured using ordinary particle filters. Molecules are typically 100 to 1,000 times smaller than the most penetrating particles that pass through HEPA and ULPA filters.

Chemicals present in gas form in the atmosphere either outdoor or inside buildings include polyaromatic hydrocarbons, volatile organic compounds (VOC), benzene, isocyanates and siloxanes, to name just a few. They all require molecular filtration to protect people, processes or machinery, or simply to remove odours. Many of these chemicals are airborne and can mix to form a dangerous cocktail with unknown health impacts.

## **CORROSION CONTROL:**

Protect sensitive electrical process control systems from acidic gases in petrochemical, pulp and paper, metal refining, printed circuit board manufacturing, data centres and wastewater treatment facilities. Corrosion control is also important for protecting artefacts in museums and storage facilities.

### **INDOOR AIR QUALITY:**

Protect people staying inside buildings like airports, offices, hospitals or laboratories.

How Camfil's molecular contamination solutions contribute to sustainability

## **EXHAUST:**

Protect people and the environment from odours and toxins emitted in exhaust air streams from industrial or power generation facilities.

#### MICROELECTRONICS:

Enhance yield in semiconductor wafer manufacturing, flat panel displays, hard disk drives and equipment. Protect processes from outdoor and process chemicals present at trace levels in the air.

# CAMFIL REDUCES USE OF DANGEROUS CHEMICALS AND MOVES THE MARKET TOWARDS ENVIRONMENTALLY FRIENDLY SOLUTIONS

Camfil's molecular filters work through adsorption, in which molecules stick to materials with extremely high surface areas. CamPure is part of our range of loose adsorbent filter media. It is certified by UL, a third-party certification company, and is rigorously tested to recognized flammability standards and tested in accordance with ISO 10121-1.

A highly proven method for corrosion control uses alumina-based adsorbents that use chemical impregnation with a compound called permanganate (MnO4). Camfil offers these media through the CamPure 4 and CamPure 8 brands.

Permanganate has an advantage over other chemicals typically used to filter acidic gases responsible for corrosion – its strong oxidizing property – which enables effective control of other classes of contaminants, such as formaldehyde or very odorous mercaptans. However, neither mercaptans nor formaldehyde are present in the air for most applications. Many of Camfil's customers keep replacing media containing permanganate for historical reasons without questioning if it is really the best solution to their current corrosion problems.

## A HYBRID SOLUTION FOR CORROSION CONTROL WITH MINIMISED ENVIRONMENTAL THREATS

Permanganate is classified as a toxic hazard to aquatic life due to the manganese (Mn) atom in the molecule's structure. It is therefore expensive to treat as a waste and requires specific transport procedures and precautions to avoid spillage.

As a result, Camfil now recommends hybrid adsorbents for our customers. These combine activated carbon, activated alumina and environmentally-friendly chemical impregnations when permanganate is not absolutely needed to treat the air. Our hybrid media include CamPure 15 and CamPure 32.

CamPure 15 has proved successful in applications like the removal of hydrogen sulphide (H2S) or sulphur dioxide (SO2) in pulp and paper mills or oil and gas facilities.

CamPure 32 is suitable for biogas and biomethane production, where H2S is the main contaminant. Sometimes CamPure media will be combined with separate virgin-activated carbon filters when volatile organic compounds must also be controlled.

We still see plenty of room to convert permanganate media to more environmentally friendly grades, and we are pursuing this transition in the global marketplace.



# Protecting against the release of harmful sulphur compounds during sustainable energy generation

Around the world, biogas produced from biomass is showing promise as a sustainable alternative energy source. Bioenergy generation from livestock and agricultural residues can improve some so-called regulating services in agricultural ecosystems while helping to achieve renewable energy targets.

But this type of sustainable energy generation also poses some problems: the retention of hydrogen sulphide, or H2S, in biogas has negative consequences on human health and on equipment durability. This compound can have potentially fatal and corrosive effects when biogas containing H2S is inhaled or employed as a boiler biofuel.

## CAMFIL CONTAMINATION CONTROL FOR HEALTHY FARMS, EQUIPMENT AND SUSTAINABLE ENERGY

One farm association in the northwest of France, "GAEC de la Pepiniere", was using biomass feedstocks (agricultural residues) in the form of solid and liquid manure as well as wheat, corn and catch crop residues to produce biogas. They convert the biogas into heat, which is used on the farm, and electricity, which is sold and fed into the local power grid.

Since the biogas was contaminated with large amounts of H2S, it posed a corrosion risk to the gas engine and required removal. Engine corrosion leads to unwanted downtime, maintenance and reduced process efficiency.

That's when Camfil's CamPure solution came to the rescue.

## CAMPURE 32 A HIGH-QUALITY, COST-EFFECTIVE MEDIA FOR BIOGAS DESULPHURISATION

CamPure 32 is a specific molecular filtration media that delivers a very high H2S adsorption capacity in environments with low oxygen content. Certified under the UL 900 standard for air filters, its low flammability properties make it a safer media than carbon alone, a key consideration in applications like biogas production, where ignition of adsorbent media beds poses a real risk

For GAEC de la Pepiniere, our product provided a winning combination of excellent H2S adsorption rate, best value for money, longer product lifetime, fewer filter replacements and low dust content during product unloading – all while contributing to the farm's sustainability goals.



# Our sustainability targets and KPIs

SUSTAINABILITY AREA	GOAL	TARGET 2021	RESULTS 2019	RESULTS 2020	STATUS	UN SDG	RISK	GOVERNANCE
PRODUCT SUSTAINABILITY & INNOVATION	Minimized energy use for our customers	<b>5% increase</b> of Eurovent energy classification sales of A and A+ filters per year.	A+/A New classifications introduced in 2019.	20% increase	Acquisition of Resema in Sweden has a positive impact.	11 scheduli	Increased energy consumption for end user, which leads to increased CO <sub>2</sub> emissions.	Products are certified by Eurovent. Train and inform sales force and customers in Life Cycle Cost tool.
PRODUCTION SUSTAINABILITY - ENVIRONMENT	Reduced energy consumption Increased material utilisation and reduced waste	2% reduced energy consumption annually in relation to production volume.	NO change in energy consumption in relation to production volume during 2019.	<b>7% reduction</b> in energy consumtion in relation to production volume	Numbers for 2020 impacted by product mix and external production Yield system has not been implemented in one country which changed ERP system in 2020.	3 seemen 11 menorum  A 12 menorum  12 menorum  CO	Increased CO <sub>2</sub> emissions, unnecessary use of natural resources for the world and extra cost for the company.	Camfil's global operational scorecard is used and followed up upon.
		<b>ONE</b> factory per year implemented with yield system.	FIVE production units are implemented with yield system today.	<b>FOUR</b> production units with yield system.				
		1% reduced waste annually in relation to production volume.	11% increase of waste in relation to production volume.	3% increase in waste in relation to production volume.				
HUMAN RIGHTS	Be an equal opportunity employer	<b>100%</b> of major Camfil production companies should be GEEIS certified by the end of 2022.	<b>56%</b> 9 companies	<b>69%</b> 13 companies	Continuous education and certification	8 manur Simulation of the Control of	More difficult to attract and retain employees.	Owner's Directive and Global Diversity and Equal Opportunities policy (DEOP).  Implemented locally and available in 15 languages.
LABOUR	Safe and healthy workplaces	2.5% Sick leave 2.5 OSHA rate Number of incidents: 50	3.0% Sick leave 3.3 OSHA rate Number of incidents: 70	3.4% Sick leave 3.7 OSHA rate Number of accidents: 89	Sick leave increased because of Covid pandemic.  Some countries require Camfil to report Covid illness as work related. Otherwise the numbers are in line with 2019.	3 seconds	Increased risk for occupational safety and health incidents or injuries.	Global Health & Safety Handbook is implemented locally and available in many languages. Camfil's global operational scorecard measures the number of recordable Occupational Safety and Health (OSHA) injuries monthly.
33								

## Our sustainability targets and KPIs

SUSTAINABILITY AREA	GOAL	TARGET 2021	RESULTS 2019	RESULTS 2020	STATUS	UN SDG	RISK	GOVERNANCE
ANTI-CORRUPTION	Zero tolerance for bribery and corruption	100 % of senior management and sales managers working with listed countries should have participated in trade compliance training.	88%	95%	Continous training.	16 rest. contr.	Loss of reputation and heavy economic impact.	Owner's Directive and Trade compliance policy and Code of Conduct in our CamfilCairing code.  Whistleblowing process with 3rd party partner to ensure anonymity. Implemented and available in 15 languages.
ETHICAL CULTURE	High level of ethical and sustainable business practice	Completion of Code of Conduct e-learning. (100% of employees)	Not reported	Not reported	New Code of Conduct for Employees will be implemented in 2021.	3 seems 0 seems and	Loss of reputation and trust, brand damage and difficult to recruit and retain employees.	Camfil's Code of Conduct sets the standard for how we run our business by translating our vision and values into everyday behaviours. It describes our shared company culture worldwide and guides our everyday interactions with stakeholders, both internal and external.
SUSTAINABLE BUSINESS	Ensure that all direct material group suppliers and all local business critical suppliers work according to our Code of Conduct for Business Partners	100 % of group suppliers and business critical and top local suppliers covering 80% of spend value have signed the Code of Conduct.	Not reported	Not reported	New Code of Conduct for Business Partners will be implemented in 2021.	8 minutes 12 minutes Community 12 minutes Community 13 minutes Community 14 minutes Community	Supplier non-compliant with laws and regulations.	Part of Camfil's New Global Supplier Qualification and Evaluation Process for direct material spend with group direct material suppliers.
SUSTAINABLE LOGISTICS	Reduce transport environmental footprint Environmental requirements specified in all tenders and part of carrier selection process	Review 80% of inbound FTL flows in Europe during 2021. Start conversion of full truckloads flows from road to intermodal/rail.  Tender specification created and used for all group tenders.	Not reported	Not reported	Implementing new logistics requirements to decrease our logistics environmental footprint.	7 simulari 12 simulari 13 simulari 13 simulari 14 simulari 15 simulari 16 simulari 17 simulari 18 sim	Increased CO <sub>2</sub> emissions, unnecessary use of natural resources for the world and extra cost for the company.	Logistics requirements and Code of Conduct for Business Partners.
INFORMATION SECURITY & DATA PROTECTION	Increased awareness of IT security	Completion of IT security training by all office workers.	Not reported	86%	Training of IT users in safe ways of working.	16 rest. com unitation ************************************	An untrained or negligent workforce could lead to data breaches, business interruptions or financial losses.	Information Security Policy, Information Security Guidelines.



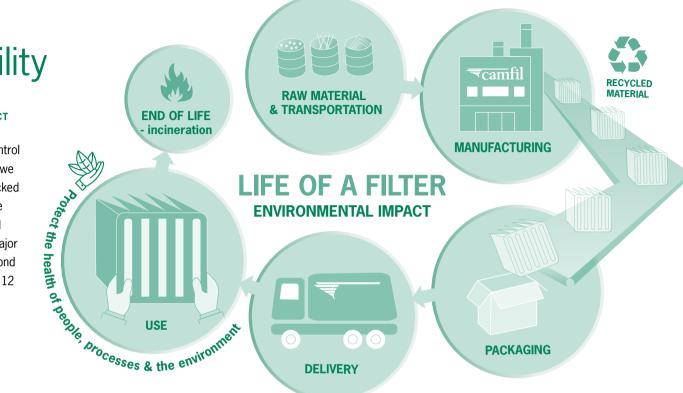
# Product sustainability

### CAMFIL DRIVES SUSTAINABILITY WORK FORWARD WITH LIFE CYCLE ASSESSMENT AND ENVIRONMENTAL PRODUCT DECLARATIONS

Camfil believes that our filtration and contamination control solutions can make a real difference to the planet. But we also believe that any environmental claims must be backed up by transparent, independent analysis. This is why we develop environmental product declarations (EPDs) and conduct life cycle assessments (LCAs). These play a major role in our efforts to reduce our carbon footprint, respond to customer interest in sustainability, and achieve SDG 12 for sustainable consumption and production.

"Camfil is committed to developing its products and services with the utmost responsibility. To do this, we must first and foremost understand how we are affecting the environment today. Even though we conducted our first LCA back in the 1990s, with the help of the Swedish Environmental Research Institute we have gained deeper insights and tools to take our sustainability efforts forward,"

says Åsa Lidström, VP Sustainability & Quality, Northern Europe, Camfil.



### **DEVELOPED AND APPROVED BY ENVIRONMENTAL EXPERTS**

We commission an independent research institute, the IVL Swedish Environmental Research Institute, to help produce EPDs and conduct LCAs for some of our key bag filters. The EPDs have been reviewed and approved by a third-party auditor.

#### **ENVIRONMENTAL PRODUCT DECLARATIONS**

An EPD created according to the EPD standard makes it possible to compare the performance of different products from an environmental perspective over their life cycles and to calculate the environmental

impact of Camfil's finished products. The EPDs present information including emissions that affect the climate, acidification, the ozone layer and more, as well as resource consumption.

In the EPDs, we use actual values from our suppliers to understand the environmental impact when the material is processed, from raw material until it is shipped to us. In addition to the mandatory product stage, we chose to include transport to the customer and energy consumption during operation. However, the data reported in the eBVD and BASTA only cover the product stage.

## LIFE CYCLE ASSESSMENT FOR RESPONSIBLE CONSUMPTION AND PRODUCTION

By conducting a life cycle assessment (LCA), we can assess a product's environmental impact and understand how resource-intensive the different production phases are. Thanks to LCA, which reviews the entire process and its flows including the impact of materials and waste, Camfil operations can become more circular and sustainable.

Our use of LCA is directly linked to the UN's sustainable development goal 12, responsible consumption and production, which calls for actions to improve resource efficiency, reduce waste, and mainstream sustainability practices. Camfil is committed to reducing such impacts. Each year, we have been improving on production and consumption impacts through our management systems, sustainability targets, green initiatives, and best available technologies.

#### **HOW WE GET BETTER**

These tools give us a standardized way to tell the life cycle story of our product impact and promote transparency. This way, our customers can compare the environmental performance of our products with other alternatives. They also provide clarity on which products and which areas of the production processes we need to work on to lower our total carbon footprint. We actively seek opportunities to increase cooperation with stakeholders outside the company to find new approaches, materials and logistics flows that can contribute to a reduced carbon footprint.

# 12 RESPONSIBLE CONSUMPTION AND PRODUCTION



# SDG 12 calls for actions to improve resource efficiency, reduce waste and mainstream sustainability practices.

One of its sub-targets is to ensure that people everywhere have the relevant information and awareness for sustainable development and lifestyles. As with most manufacturing companies, Camfil's own operations generate emissions that have negative impacts in relation to SDG 12.

Camfil is committed to reducing such impacts. Each year, we have been improving on production and consumption impacts through our management systems, sustainability targets, green initiatives and Best Available Technologies. We educate consumers about energy efficiency and provide information by clearly displaying Eurovent's energy efficiency label on the product packaging of our comfort filters. We also offer filter schools, testing labs and learning experiences at various Camfil academies and universities worldwide to raise awareness of air quality issues.

# Leading sustainable product development

Energy efficiency, environment, productivity and health are the four cornerstones of customer value in all product development at Camfil. We develop all new products from this foundation, knowing that we have a huge responsibility to our customers to meet their need for efficient, reliable and sustainable products.

Camfil operates six state-of-the-art R&D centres which are equipped for testing and developing our products. The core focus of our development teams is improving the filtration material and its composition to offer customers a reliable combination of high filtration efficiency, low energy consumption and longest possible service life.

In terms of the global warming potential of our products, typically 80-90% of the total impact is generated in the product use phase. Simply put, this involves the energy used to push air through a filter. It has an effect on both the carbon footprint for our customers as well as the cost of energy consumption. So, one of our primary tasks when developing a new product is to keep the environmental impact and energy consumption to a minimum. In order to address the last 10-20% of our products' environmental impact, we always approach each new product development from two perspectives: the customer perspective and the product life cycle perspective.

The life cycle perspective is especially helpful when identifying the potential to further reduce the product's environmental footprint in areas besides the



obvious use phase. Early in the manufacturing phase, we typically evaluate the choice of raw materials, manufacturing methods, and effects of transportation and logistics. Also during the manufacturing phase, we evaluate our internal processes in terms of energy use, complimentary raw materials, ergonomics and work environment, internal waste treatment, and recycling.

Further along in the chain we look at transport distances, optimal locations for production, volume and weight efficiencies in packaging, and mode of transport to customers and local warehouses. In the use phase, most effort goes into minimising the overall energy consumption and ensuring the health and safety of maintenance staff, who often handle the used

contaminated air filters. Finally, in the end of life we focus on minimising general waste whenever possible and ensuring that it can be easily separated into recyclable or reusable fractions.

To optimise our sustainability efforts and to use resources where they make the most difference, we apply state-of-the art life cycle assessment (LCA) simulation tools. The modelling tool translates the environmental impact into comparable unit equivalents, the most important measure being CO<sub>2</sub>-equivalents.

To conduct the simulations and gather input data, we involve our suppliers of raw material and components, energy, water, and logistics as well as our own manufacturing unit and our own customers to understand how they use our products.

### CAMFIL AN INDUSTRY-FIRST IN ENVIRONMENTAL PRODUCT DECLARATIONS FOR AIR FILTERS

Camfil took a major step in its efforts to disclose product environmental impact by developing and releasing environmental product declarations (EPDs) for our largest product group in the Nordic region, bag filters. Over time, we aim to roll out EPDs covering more product groups and regions during 2021.

Read more about our EPDs on page 36.

## Minimizing energy use for our customers

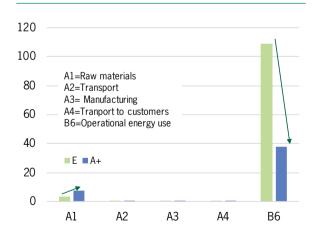
As demands to reduce CO<sub>2</sub> emissions get tougher, energy prices increase, and people are more aware of the effects of bad air on their health, the energy consumption of air filters in ventilation systems has drawn much attention. According to LCA, the use phase is most important for filters environmental impact. If you change one Hi-Flo ePM1-filter with energy class E to one with energy class A+, you will decrease the total kg CO<sub>2</sub> eq emission by 60%.

This is why everyone shall use filters with better energy rate and also the reason why this goal is so important to us.

Today, all ePM1, ePM2,5 and ePM10 air filters in full size and family sizes can be graded from A+ to E. Grade A+ indicates the lowest energy consumption and E the highest. The classification, based on ISO 16890, gives people a better understanding of a filter's annual energy consumption, initial efficiency and minimum efficiency.

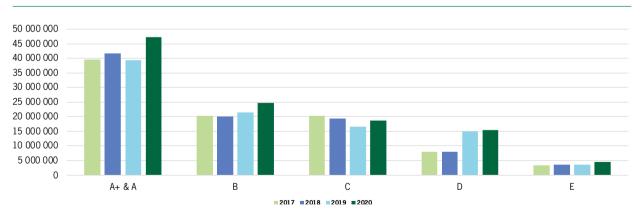
Eurovent's updated system helps consumers find the right air filter with the lowest energy usage combined with the highest indoor air quality. Using the right air filter not only helps our customers maintain healthy indoor air quality, but also helps to save energy and money. Camfil clearly displays the Eurovent ratings on its product packages. In the U.S., Camfil's premium filters carry a 5-star rating.

#### LCA - HI-FLO XL

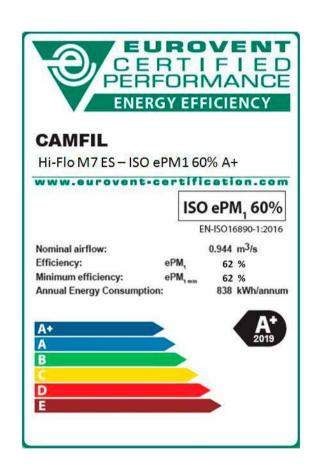


Comparison of  $CO_2$  eq emission between two filters with different energy classifications.

#### SALES PER EUROVENT ENERGY CLASSIFICATION EUR



The numbers relate to the countries that are included in Eurovent only, not all countries where Camfil has a business office. Because Eurovent has changed the classification criteria for all energy rated filters, the numbers are not 100% comparable from 2018 to 2019.





# **Production Sustainability**

#### REDUCING ENERGY CONSUMPTION

Waste and energy reduction measures are a key aspect of Camfil's strategic three-year plan. We continuously track our energy consumption. Because Camfil is growing, we decided to list comparisons of our production cost (cost of goods sold). This of course depends on raw material prices and product mix, but for Camfil as a group, we believe it gives a good enough indication of our work in this area.

#### INCREASING MATERIAL UTILISATION AND REDUCING WASTE

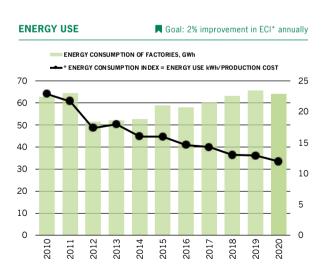
Waste reduction at the company is a key aspect of Camfil's strategic three-year plan.

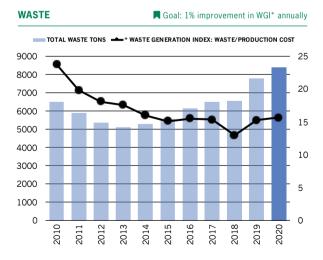
The manufacture of filters is one of Camfil's biggest direct environmental impacts. Reducing waste from this process is therefore crucial. Producing filter media that is not used in the finished filter products amounts to the unnecessary use of natural resources, energy and transport. We began to measure material utilisation in Sweden several years ago and in conjunction with this we developed a production yield system.

We want to implement yield systems in our major production units so that we can capture measurement data that will allow us to identify and analyse where in the process the filter media scrap arises. We use our production yield

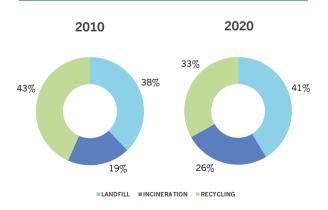
system to plan and minimise set-up times that can lead to filter media scrap. Measurements allow us to sharpen our focus so that we can make improvements.

The increase in the waste index this year is related to the expansion in Crystal Lake. It has also led to an increase in waste to the landfill.









# Helping to develop industry standards

Camfil actively participates on standards committees to ensure that a good balance is achieved between filtration efficiency and energy efficiency in general ventilation systems. Industry standards and governmental regulations preserve this balance and help drive the development of innovative solutions that simultaneously increase both these elements in order to safeguard people's health and conserve energy.

For most people, "air quality" is very abstract. It is difficult to accurately measure, and even harder to touch and feel. This makes it tricky for customers to choose the right product for their needs, and even more difficult to know whether the product is doing the job promised.

This is why industrial standards have become so important in the filtration industry. The standards make it possible to compare products in a fair way and judge if they fit the application. For particle filtration, such standards for this purpose have long been a given. It has become such an integrated part of the business that we sometimes forget how difficult life would be without a standardized test method and classification of the product. But for another product category – molecular filters – this has not been equally obvious.

#### MEASURING MOLECULAR-SIZE PARTICLES A CHALLENGE

For molecular filters, it was not until 2013 and 2014 that standardized ISO test methods became available, and still there is no classification system. But change is coming. A classification system for the specific use

of general filtration of intake air for buildings is underway and could be available as early as 2022.

The reason for the former absence of a molecular standard lies in the difficulty of measurement. Simply put, whereas particle efficiency requires one test aerosol and one particle detector to calculate filtration performance, molecular filters require one gas source and one detector per contamination. The difficulties do not stop here. One gas in combination with another can affect overall performance, and environmental conditions like temperature and humidity strongly affect the test results.

#### WHY WE NEED MOLECULAR FILTRATION PRODUCTS

However, there is a strong need for molecular filtration products, even for the general filtration of buildings found in large cities or heavily polluted areas. The need for the upcoming classification

ISO/CD 10121-3 is based on gas removal from a comfort perspective (odours) and a health perspective (ozone, VOCs, NOx, etc.). Due to the complexity of molecular contamination, the need to easily compare product performance and quality is possibly even greater than for particle filters.

## NEW STANDARD FOR MOLECULAR FILTERS WILL HELP CLEAR THE AIR

The previous parts of the standard, ISO 10121-1 and ISO 10121-2, provide a standardized test setup for testing of molecular media and of entire molecular filters. They make it possible to benchmark different products and compare between laboratories.

This also opened up the opportunity for a classification of the products. However, applying these standards requires the ability to interpret the data and sometimes select test substances and concentrations. This might seem complex for customers of general ventilation air filters. The beauty of

part 3 of the standard is that it selects all parameters except rated air flow, and it provides a classification system that helps customers choose the right product without being an expert and without understanding all the technical details around the test method.

Now the new molecular filter classification system ISO 10121-3 is underway and is, at the time of writing, in a draft version under review by ISO. If accepted, the standard can be ready for use as early as the first half of 2022.

# 3 GOOD HEALTH AND WELL-BEING



# SDG 3 calls for actions to address determinants of health such as air pollution.

Camfil's products and the entire line of business revolve around helping our customers ensure healthy lives and promoting well-being for all ages. We do this by producing the highest efficiency air filters that remove harmful particles and contaminants in ventilated air and by providing air-pollution control systems that collect dust, mist and fumes for safer work environments. Whether for residential, commercial or industrial use, our products protect people, equipment, processes and the air we all breathe.

# Pioneering Camfil Tech Center turns 10

In 2020 Camfil celebrated a milestone in our history, the 10th anniversary of the founding of our pioneering Tech Center located in Trosa, near Stockholm.

This ultra-modern centre serves as the hub of a global research and development organisation at the forefront of efforts to analyse indoor air and to test the performance of different filters. The centre opened in 2010, but Camfil built Europe's first test rig for HEPA filters way back in 1967.



As one of the world's largest research centres for clean indoor air and filtration technology, it testifies to Camfil's commitment to substantial R&D investment and a focus on innovation to bring best-in-class products with a strong sustainability profile to market.

#### **ISO-COMPLIANT LABS**

Camfil continually invests in its research and technological development, design and testing facility in Trosa, which follows ISO quality management processes. The Tech Center has five laboratories – a HVAC particle lab, a HEPA lab, a molecular lab, an indoor air quality lab and a gas turbine lab – all fitted with the latest equipment. Our HVAC particle lab can carry out tests in accordance with the international standard ISO 16890 and ASHRAE 52.2 for the U.S and our molecular filtration laboratories are fully compliant with ISO 10121.

#### **COLLABORATION WITH INDUSTRY AND RESEARCH PARTNERS**

Working with our industry partners, research institutes and universities, Camfil's researchers and engineers focus on the development of innovative technologies that continuously advance the performance and capabilities of our solutions.

# TWO FILTRATION PRODUCTS TESTED AND LAUNCHED Camfil proved that it remains at the forefront of technology with the launch of two filtration products, the brainchildren of the Tech Center. Compact filters CamGT 4V-300 and CamGT 3V-440 for turbomachinery filtration, and Cam-Flo ES, a sturdy bag filter with a high dust-holding capacity and mechanical strength. All help to increase safety, improve productivity and reduce energy consumption.



## Chemicals

To prevent damage to people and the environment, we must comply with applicable laws and regulations regarding chemicals and hazardous substances. Even though Camfil manufactures and supplies goods and not chemicals in particular, we believe it is our duty to know which substances are included in the products we offer to the market.

#### **REACHING OUT TO SUPPLIERS WITH REACH**

REACH stands for Registration, Evaluation, Authorisation and Restriction of Chemicals. It is an EU regulation whose purpose is to improve the protection of human health and the environment through the identification of chemical substances. It applies to all suppliers within and outside Europe who sell, import or manufacture chemicals or products that contain certain chemicals.

At Camfil, we have asked our raw material suppliers to give us information on relevant chemicals in their products. This makes it possible for us to provide customers with more detailed information about the chemicals used in our products.

## ISO certifications

The purpose of obtaining ISO certification is to ensure continual improvement of processes and procedures so that we can provide better products and services and, as a result, have more satisfied stakeholders. This is anyhow in our Camfil DNA.

The ISO standards support us in these efforts and makes our success measurable on a global standardized scale in all our factories worldwide.

Today's ISO standards differ from what they were only a few years ago. They now enable certification to multiple standards. We can use simple language, images, illustrations and videos instead of a stockpile of written documents. Camfil's intranet is part of our management system, where we share local and global manuals, training material and other key documents.

The current standards provide scope for developing one's corporate culture and values, something that represents one of Camfil's major strengths.

We are proud to state that all of our production units are as a minimum requirement at least ISO 9001:2015 certified. Several factories have additional ISO certifications like ISO 50001, 14001, 45001. Our factories producing equipment for the nuclear industry are on top certified to different nuclear and welding standards.



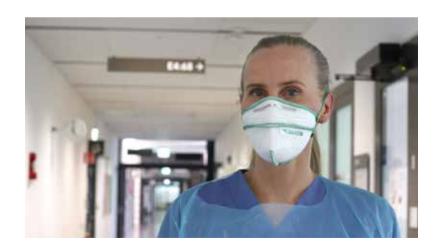
#### CAMPROTECT

# The corona pandemic – an unforgettable year

#### **RESHAPING THE WORLD IN 2020**

The entire world changed in early 2020. With an unsparing attack, the coronavirus outbreak swooped down upon humankind, leaving every one of us vulnerable and forever changing our lives. In addition to its impact on our health, it impacted global production, supply chains, climate change, workplaces, travel, and more.

Camfil is committed to maintaining the highest standards to ensure the safety of our customers, partners, and employees in all functions during this unprecedented time. Our clean air filtration solutions are essential to hospitals, pharmaceutical manufacturers, healthcare providers, and many other critical businesses that are supporting their communities in the fight against the Covid-19 pandemic around the world.



#### CAMFIL JOINS THE FIGHT AGAINST COVID-19 WITH RESPIRATORY PROTECTION

In response to the coronavirus pandemic, Camfil brought decades of expertise in air filtration to the front lines. We started to design and develop FFP2-compliant respiratory protection masks in our Tech Center in Trosa, Sweden, to support the community and critical care staff.

The initiative started with face mask testing for Karolinska University Hospital and Region Stockholm to meet the required safety standards. Product development in the filter industry usually takes several months or even years. But in less than five weeks, production was set up and a new product was launched: CamProtect respiratory protection masks. With CamProtect, Camfil has proven its expertise in air filtration, product development and testing, and its unwavering commitment to people's health and well-being. For Camfil, People Matter 1st.









High-efficiency air cleaners are crucial to pandemic prevention scheme at meat processing giant

In meat processing facilities, air quality is often a forgotten ingredient. Because of temperature and humidity requirements, along with production processes, meat processing plants are highly susceptible to the spread of airborne viruses and microbes. In fact, airborne viruses can survive longer in the air than in other types of facilities.

The Tönnies Group, a global meat processing company with over 16,000 employees, was using convection coolers to cool the circulating air and return it to the room for reuse. Although such air recirculation can reduce energy consumption, it can also spread pathogens – in areas with poor ventilation, they can remain in the air for up to 3 hours. When the coronavirus pandemic hit, Tönnies knew it needed to act fast to improve production room conditions and protect its workforce.

## HYGIENE AND AIR FILTRATION KEY TO PROTECTING EMPLOYEES, PROCESSES AND PRODUCTS

Camfil came up with a solution that helped Tönnies clean the air, protect the health of its employees, and optimise the low energy consumption initiatives already in place. Highefficiency air particulate cleaners from the CC 6000 and CC 2000 range, fitted with ProSafe HEPA H14 filters, were introduced to

filter out the virus particles including the coronavirus. They were mounted at an elevated position on walls and ceilings so that they could get an optimal airflow through the production rooms without interfering with operations.

After installation, on-site tests were conducted by professional hygienists and physicians. The results were striking: shortly after the cleaners were installed, the particles were reduced by more than 50%.

So along with protective face masks, physical distancing,

and other good hygiene practices, Camfil air cleaners prove their vital role in the essential services food operators provide every day.





# Transport and Logistics

Within transport, Camfil recognises the key role packaging plays in protecting products, improving resource efficiency and reducing waste. To lessen the environmental impact in this area, Camfil has partnered with a provider of "right-size" packaging solutions called Packsize®. With this new packaging machine at a few of our production sites, we can now build cartons that make a perfect fit for whatever is inside.

In Reinfeld, Germany, and at two of our facilities in the United States, Packsize is optimising the packages we use to ship our filters and other products. It partly eliminates the need to buy and store pre-made boxes and drives down the costs of our packaging operations. And critically, with right-sized packages we don't need to unnecessarily ship void fill (the filler material in packages) or air – a huge sustainability benefit.

#### THE VALUE OF JUST THE RIGHT FIT

The average order size in cleanroom production lines is 10 filters or less. So every day, we end up producing various odd sizes of cartons. But now, instead of producing manually-cut cartons out of differently sized cartons, we can create exact-sized liners and cartons. This also enhances the unboxing experience when the customer unpacks our filters. It even frees up pallet locations in the warehouse used by slow-moving odd-sized cartons.

Although Camfil continues to purchase pre-made cartons for high-runner products because it is more economical, we will continue to evaluate opportunities to use Packsize whenever appropriate.



#### **ENVIRONMENTAL GAINS WITH PACKSIZE:**

- Substantial reduction in box size
- Less void fill used, optimised cube utilisation
- Less corrugated cardboard used
- Reduces overall carbon footprint
- Reduces transport costs







# Resource-saving production and packaging at Camfil Germany

Camfil GmBH in Reinfeld, Germany, saw some positive changes on its EcoPleat production line. Both the type of plastic used to manufacture the filter frames and the packaging method was changed for the better.

Now, ABS polymer materials are used instead of polystyrene profiles. With the new frame material, only the cut-outs need to be punched out. The material is thermoformed and then folded around the filter package as a complete strip. This results in fewer punching scraps, which can also be recycled.

When an EcoPleat filter order is ready to be packed, the filters are routed through the Packsize smart packaging solution. The new packaging machine individually adapts the outer packaging to the size of the filters. This saves on costly warehousing of many different pack sizes (space requirements, item management). All in all, we avoid wasted filler materials and air inside the packages, and reduce unnecessary transport at our own premises and out to the customer.





- Cost savings thanks to reduced freight volume of about 30 truckloads per year
- Less plastic waste
- Less packaging cardboard used





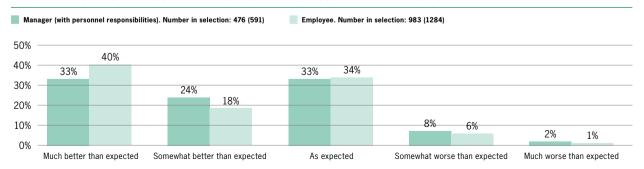
# Maintaining safe and healthy workplaces

The safety and health of all our employees remains one of Camfil's top priority. To achieve this, we continue to support each other and to closely follow local guidelines and mandatory regulations. Due to the Covid-19 pandemic, many of our offices remained mostly unstaffed during much of 2020, and the work shifts at the production facilities were adapted to the new circumstances.

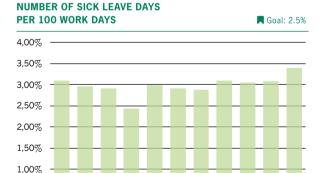
Many of our employees have been working from home. Before the pandemic, 11% of our employees worked from home but that figure rose to 43% during the pandemic. The pandemic has changed the way we view working from home. Working remotely has functioned, as expected or much better, both for managers (90%) and employees (91%). But regardless of where our employees work, their commitment and dedication are the reasons why we can still fulfil our commitments to our customers.

To assure workforce well-being, we sent out an online survey in June asking our employees to evaluate Camfil's response to the pandemic. The overall result was very positive. 89% of respondents feel that we as a company care out about our employees. Many commented that the company acted swiftly and professionally, and our weekly intranet updates and our global webinars were much appreciated.

#### THE EXPERIENCE HAS BEEN POSITIVE. EMPLOYEES ARE MORE POSITIVE THAN MANAGERS



Camfil uses a global operational scorecard to measure the number of recordable occupational safety and health (OSHA) injuries. This is one of the company's key performance indicators and is defined as an injury that usually requires professional medical attention. It is measured monthly, while lost workdays are measured annually.



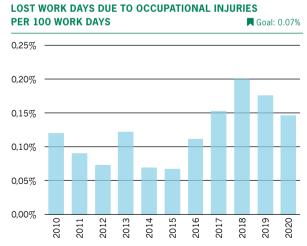
2014

2017

0.50%

0.00%







## Rapid response to Covid-19 in China

At the onset of Covid-19 in China, Camfil China moved swiftly and determinedly to protect employee health, secure operations, and continue responding to demand for Camfil's products in order to support the critical needs of society. The pandemic ushered in a new age of worry, stress and major changes to our professional and personal lives. Yet – despite this difficulty – we came together to show the strengths of the people and culture of Camfil.

#### **ESTABLISHING THE CORONAVIRUS TASK FORCE**

Without delay, and during the Spring Festival holidays, Camfil China management formed a crisis response task force. This team supported our workforce in China to quickly implement extensive precautions to prevent the spread of the virus.

#### STEPS TAKEN INCLUDED:

- Defined responsibilities and goals
- Created detailed action plans
- Created daily tracking records
- Stepped up internal and external communications

#### RECOVERING OPERATIONS AND RETURNING TO WORK

As a team, Camfil China demonstrated ownership, professionalism and creativity ahead of the audit and approval processes needed to resume operations. More than an astounding 200 pages were prepared. On 14 February 2020, after an all-day audit by five government bureaus, Camfil got the green light to resume its business and operations.

#### SOME OF THE ACTIONS WE TOOK:

- Conducted employee training via WeChat and posters, plus one-on-one communication with each of our 300 employees in China
- Established physical distancing and enhanced disinfection protocols, during, to and from work
- Within just 5 days, provided PPE (Personal Protective Equipment) and masks at a safety stock level of 3 months
- Closely monitored and reported employees' temperatures, health and location data
- Restricted or cancelled in-person meetings and travel
- Sponsored food and lodging for our factory workers
- Kept records of all actions taken



#### MEETING OUR RESPONSIBILITY TO CUSTOMERS

Camfil was recognised by the State Council of China as the key strategic supplier of air filtration equipment for capturing coronavirus particles. Our products are currently used at hospitals and cleanrooms for Covid-19 vaccine manufacture. Camfil is proud to be doing its part, not just by promoting clean air as a human right, but by saving lives around the world during the pandemic.







# Camfil USA addresses Environment, Health and Safety issues and compliance

#### **IMPROVED OSHA REPORTING ACCURACY**

In 2020 Camfil USA noted several recordable incidents at its facilities in Crystal Lake, IL, and Riverdale, NJ. Since these facilities lack on-site medical staff, any injury that might be recordable is treated as such even if it is a minor first aid case. The employee is typically sent to outside medical facilities for evaluation and treatment by a qualified medical practitioner.

To address this issue, Camfil USA signed an agreement in October 2020 with a third-party medical triage service. This service allows Camfil to contact a registered nurse to assess and make recommendations for treatment upon initial report of injury for minor injury cases. Using this service reduces risk for Camfil and should result in fewer incidents that could have been treated as first aid being listed as recordable incidents.

#### SAFETY TRAINING AND MEETINGS DISRUPTED BY COVID-19

A significant contributor to the injuries at the Riverdale facility is the amount of material and product on hand to meet current customer demand. Unfortunately, Covid-19 negatively impacted recurrent training at this facility. No safety training took place and no safety committee meetings were held since February 2020. A number of the accidents incurred that year were related to cutting devices and material handling. These specific areas receive annual training to help make employees aware of the dangers and how to avoid injuries.

#### ADDITIONAL STEPS FOR MOVING FORWARD

Additional capacity and shifts at the Crystal Lake facility are expected to help alleviate constraints on capacity and volume demand in Riverdale.

A new EHS (Environment, Health and Safety) Compliance portal is also being reviewed to improve safety training, safety audits and communication surrounding injuries. Currently, safety audits, training, injury reporting, and root cause investigation are conducted locally and are not coordinated across the Americas.



By implementing the EHS Compliance system, management will be notified real time of injuries and monitoring for near misses, safety audits and training can be managed visually via a dashboard for each location. The additional data and real-time reporting allow for targeted training and actions to further reduce injuries and to develop a stronger safety culture. Implementation is expected at end of Q1 2021.

# CamfilCairing

# - How we communicate about sustainability internally

Camfil engages employees in local sustainability and corporate social responsibility actions through a programme called CamfilCairing. The name is built around Camfil, our environment, caring and the air we breathe. This global, group-wide programme integrates sustainability initiatives and good corporate citizenship into our business strategy.

As part of the programme, each year Camfil companies host a Cairing Week during which we place a special focus on community outreach events and internal improvement measures related to our business of promoting health and well-being through clean air. From beach clean-ups to resource efficiency programmes to raising health awareness, our people engage, educate and inspire.





#### **SLOVAKIA BIKE TO WORK MONTH**

52 employees in Levice, Slovakia, took part in a Bike to Work project. This simple and fun health-promoting project made a great impact: the office saved 3 tons of CO<sub>2</sub> compared to traveling by car. Good for people, good for the environment.



#### **USA. JONESBORO BLOOD DRIVE**

Camfil APC in Jonesboro, USA, finally wrapped up its last event from Camfil Cairing Week 2020. Due to Covid-19 and a devastating tornado that hit the area, the unit's American Red Cross Blood Drive was delayed. However, the office managed to finish with 29 donations in total.



#### THANKSGIVING FOOD DRIVE IN NEW JERSEY

Camfil USA's plant in Riverdale, NJ, conducted a successful food drive for a local community food bank during this major US holiday. The thoughtfulness and generosity of Camfil employees helped many local families in need celebrate Thanksgiving.

#### **2020 PHOTO CONTEST**

Camfil was thrilled to receive so many submissions for the CamfilCairing photo competition, "People Matter 1st – the spirit of Camfil". The contest was open for contributions from 9 March to 30 April, and even though we were busy battling the corona crisis, we received a total of 83 submissions.



#### 1st prize, Jury's choice

"I can touch the sky" by Lucia Frtusova, Camfil Slovakia, HR coordinator.



#### 1st prize, as voted by Camfil employees

"Camfil Slovakia - Working team during coronavirus" by Livia Martiskova, Camfil Slovakia, Quality Manager

# 1 SUSTAINABLE CITIES AND COMMUNITIES



# SDG 11 aims to reduce the adverse environmental impact of cities by 2030, including by paying special attention to air quality.

According to the World Health Organization, more than 90% of the world's population live in places exceeding WHO air quality guidelines. Camfil's air filters and clean air solutions are some of the most energy-efficient on the market, and help purify the indoor air and create more sustainable buildings around the world where people live, study and work.

Also related to this SDG, Camfil engages employees in local sustainability and corporate social responsibility actions through a programme called CamfilCairing. This global, group-wide programme demonstrates how Camfil cares about the air we breathe and wider environmental issues. It integrates sustainability initiatives and good corporate citizenship into our business strategy. As part of the programme, each year Camfil companies host a Cairing Week during which we place a special focus on community outreach events and internal improvement measures related to our business of promoting health and well-being through clean air. From beach clean-ups to resource efficiency programmes to raising health awareness, our people engage, educate and inspire.

# Human rights

# Human rights in our business and beyond

Camfil's stated vision is to make clean air a human right. We are passionate about creating awareness and educating people on this critical topic by providing knowledge, expertise and resources. Externally, our commitment to respect human rights informs our operations, extending from employees and suppliers to customers and society at large.

Our approach to human rights is based on the UN Guiding Principles (UNGP) on Business and Human Rights, which emphasise the responsibility of companies to respect human rights even if government actions and regulatory frameworks fail. We are a signatory to the UN Global Compact, and we support and comply with the Compact's ten principles, including human rights. Our commitment is incorporated in Camfil's policies and procedures including our Code of Conduct for Employees, for Business Partners and Owner's Directive.

# Dedicated to diversity and inclusion

Camfil strives for an inclusive business culture where all employees can overcome stereotypes and develop to their full potential. We believe that diversity and inclusion help to attract, develop and retain talent, spark innovation and meet and exceed customer expectations.

At Camfil, we are convinced that striving for diversity and equal opportunities helps to build a more sustainable and attractive company. A company that embraces diverse backgrounds and experiences not only benefits the employees, but is good for business too.

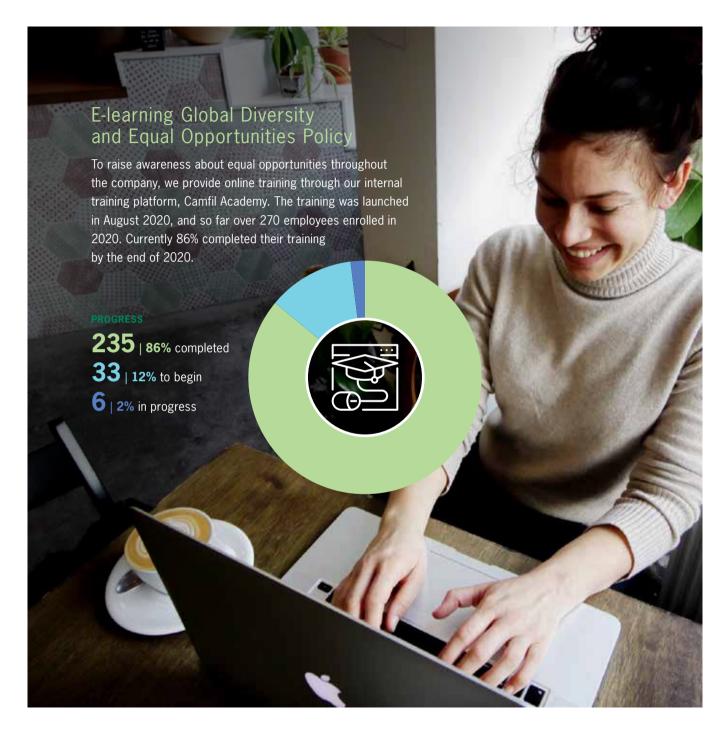
GEEIS is an internationally recognised label for



companies that demonstrate a strong, successful commitment to achieving diversity and equal opportunities in the workplace. GEEIS assesses companies from three broad dimensions: management tools, HR and managerial practices, and the global impact of European and international policies. During 2020, an additional four subsidiaries in Finland, Denmark, Slovakia and Malaysia were certified to GEEIS – that makes a total of 13 Camfil companies.









#### Diversity and inclusion in practice.

# Interview with Luciano Rogato, Managing Director of Camfil Italy

#### WHEN WERE YOU GEEIS CERTIFIED, AND AT WHAT LEVEL?

In October 2020 we had the intermediate audit that confirmed level 3.

#### AND WHEN IS YOUR NEXT AUDIT?

After reaching level 3 in 2020, our next audit will take place in 2022.

#### DESCRIBE HOW CAMFIL ITALY ADDRESSES DIVERSITY AND INCLUSION.

At Camfil Italy, we started preparing for the July 2018 GEEIS audit in 2017. Our approach to GEEIS has made it possible to improve the shared culture and monitor and formalise the various internal processes. All Camfil employees were involved through improvement proposals that were collected, analysed, implemented, and shared in a process that allowed each colleague to participate in an active, specific way, which makes us all proud to be part of this company.

This bottom-up approach instead of a top-down one helped us better understand the meaning of the Diversity and Equal Opportunity Policy (DEOP) in the company, and gave us the possibility to receive feedback so we could make improvements.

During 2019 and 2020, all employees with management responsibilities took an e-learning course on the DEOP policy, and a few of them held a MOOC course on inclusion and diversity.

## WHAT DO YOU THINK THE BENEFITS ARE OF CERTIFICATION? EASIER WHEN RECRUITING, LOWER STAFF TURNOVER, HIGHER EMPLOYEE ENGAGEMENT?

The most important benefit of GEEIS certification from an internal point of view has been to formalise some good practices and adjust some KPIs to monitor how we are working and how we need to move forward.

WHAT IS "CAMFEEL VISION"? WHY WAS IT CREATED AND WHAT BENEFITS DOES IT BRING?

Our Camfeel Vision involves a group of 10 of our youngest colleagues. We have Millennials in all the departments, and with this forum we wanted to encourage them to meet every two weeks to share news and ideas related to Camfil.

These meetings give voice to our youngest Camfil Italy employees and enables them to contribute in a meaningful way to the company. They share stories from their daily lives at Camfil, information about colleagues, information about products, and any other visions they have for the company. They organised several events in 2019. Due to Covid-19 in 2020, they now meet up via Teams and continue to post news on a virtual notice-board on Camfil's intranet.

These young people are the future of our company. Camfeel is one way to encourage out of the box thinking, diversity, and fresh perspectives. We firmly believe that it can help them grow professionally, shape their futures, and make an impact on Camfil today and into the future.



# DECENT WORK AND ECONOMIC GROWTH



# SDG 8 calls for promoting safe, secure working environments to create decent work opportunities.

Camfil provides satisfactory working conditions for nearly 4,800 employees at offices and manufacturing sites around the world. In addition to our Code of Business Ethics, Code of Conduct, and Health & Safety Handbook, which provide governance on these particular issues, we have strong human-resource management practices at our local workplaces and local employee healthcare programmes. Our global workforce helps us steadily grow sales and support economic growth in more than 30 countries. We conduct due diligence and proactively integrate our strong culture around work ethics in all companies that Camfil acquires.

# Anti-corruption and business ethics

#### EMPLOYEE CODE OF CONDUCT: "THE CAMFILCAIRING CODE"

The Code of Conduct, also called the CamfilCairing code, applies to all of us, from our owners to each of our employees worldwide. Our leaders have a particular responsibility to lead by example and act as a company ambassador. Managers must not turn a blind eye to unethical conduct.

We are currently updating our current code to include more information of what this means for the individual employee. Our managers are responsible for making sure people on their team are provided with the training necessary to understand the code and the policies related to it. We are therefore launching the updated code in 2021 along with e-learning training for all employees. The training will also be part of our global onboarding program for all new hires.

#### WHISTLEBLOWING

Camfil believes that it is critical not only to ensure compliance with applicable laws, but to enhance transparency and accountability across the organisation. To support our efforts in identifying potential ethical and fraudulent violations, Camfil provides, together with an external partner, a whistleblowing service to all employees for reporting their concerns confidentially. The service is encrypted and password protected, and using the system is voluntary.

Employees who come across a situation that does not appear to conform to the principles set out in our Code of Conduct, our policies, or the law are expected to bring their concern to the company's attention. This way, we can improve our work environment and reduce risks for the company so that we can continue to be an ethical and sustainable company.

Our employees' privacy and integrity are essential at all times. The whistleblowing service is therefore outsourced to a third party, so any employee who voices a concern in good faith can report anonymously without the fear of any negative consequences. The whistleblowing policy is available in 15 languages to make it accessible for all employees.



**TARGET/KPI:** When new e-learning is available, 100% of employees should complete the Employee Code of Conduct training by end of 2021

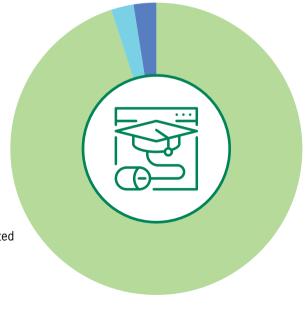


## Trade compliance

Camfil delivers products and services to countries around the world. We are committed to fully complying with all applicable laws and regulations on trade sanctions and export control of the European Union, the United States and the United Nations, and other local laws and regulations that govern the sale, supply and export of Camfil products, services and technical data. Camfil's Owner's Directive clearly states that Camfil must step away from a business deal if there is a risk of non-alignment with our moral and ethical values.

Camfil has a dedicated Group Trade Compliance
Manager who is tasked with ensuring that our policies
and procedures on trade compliance are effective
worldwide. Trade compliance procedures are in place
for export licensing, screening of third parties on a
risk-based approach, reporting structures, product
classifications, mandatory contract clauses, countryspecific requirements, end user certificates and red flag
situations.

We train our employees to raise their awareness and understanding of trade compliance, and we incorporate trade compliance in all day-to-day operations. In June 2020, Camfil Academy launched an e-learning course that covered the updated trade compliance policy. This training is mandatory for senior management within finance, sales and other key employees. We enrolled 120 employees in the course, and 95% completed their training by the end of 2020.



#### **PROGRESS**

**113** | 95% completed

3 | 3% to begin

3 | 3% in progress



# Data security and privacy

As digitalisation brings opportunities to businesses, it also poses challenges around data security and privacy. The risk of cybercrime and data security breaches has increased tremendously in recent years, and as a global company Camfil must remain vigilant and stay ahead of potential threats, whether internal or external.

Camfil takes active prevention and protection steps to minimise risks. Just like in other areas of our business, we engage all employees around the way we work on security issues and align our efforts. Camfil has an IT Security Policy in place as part of our broader approach to ethics and compliance. With regards to data privacy, the EU's General Data Protection Regulation (GDPR) strengthens citizens' right to control their personal data by setting requirements for personal data processing. Through our Data Privacy Policy, Camfil aims to fully comply with the GDPR to help ensure this right.



SECURITY AWARENESS TRAINING

During 2020 nearly 86% of our employees participated in our continuous Security awareness training.



## Sustainable IT

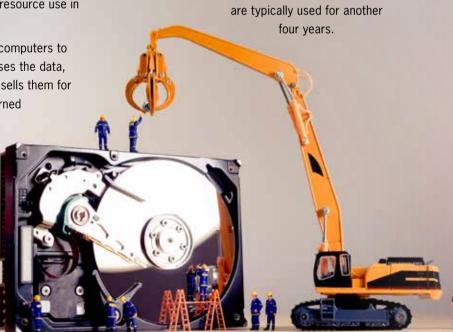
As a global organisation that continues to grow and embrace digitalisation, Camfil bears a great responsibility to minimise waste generation. We must manage our IT assets responsibly, and are taking actions to move away from a throwaway mentality towards a lifecycle management where we reuse what we can. We determine which computer models we will use by only selecting the most high-quality, energy-efficient computers we can find. The durability of a product is critical to enabling a circular economy so that products are kept in use longer, limiting resource use in new products.

In Europe, we return all of our computers to one supplier, who securely erases the data, refurbishes the devices, and resells them for secondary use. 98% of all returned devices are re-sold, and those that are not in resale condition are sent for

material recycling.

We use multiple suppliers in Asia, but we follow the same principle there. In some cases, we manage the equipment internally by securely erasing the data and offering it to staff or donating to charity. In the Americas we work the same way as in Asia, and the U.S. applies the European model; there, we managed to refurbish 95% of all returned devices through one supplier.

When a used device is sold, we no longer control the destiny of that device. For this reason, we make sure our devices are only sold to countries that have adequate programmes for recycling electronic equipment. The refurbished devices are typically used for another



# Code of Conduct for Business Partners

Camfil has updated its Code of Conduct policy for Business Partners to align with recent adjustments from external sources of guidance on compliance with regulations and laws. The Code has become more comprehensive, with further in-depth business conduct controls and a stricter level of transparency regarding proof of compliance. Camfil has taken steps to focus more on active reporting systems for managing and maintaining improved adherence to this Code of Conduct.

The latest changes address in particular trade compliance and money laundering, and anti-corruption guidance is now more extensive and specific. Camfil has chosen to integrate the UN Global Compact's ten principles in the Code. Environmental compliance requirements for external partners now also include a more modern approach that strives to integrate both practices and technology in order to promote energy efficiency and the sustainable use of resources.

Another key effort we took was to strengthen related legal contracts linked to the Code. General supply and development agreements have been significantly upgraded. Camfil has also initiated activities for the 2021 goals which include mandatory sign-off by our primary material suppliers on the new Code if they are to stay in business and grow with Camfil. Furthermore, a more sophisticated supplier performance and evaluation programme will be piloted during 2021. Its aim is to become a more strict, formal mechanism to justify and establish long-term global supply chain strategies.



# Building for the future

New state-of-the-art facility in China meets the growing demand for air filtration solutions in AsiaPacific

In December, Camfil kicked off construction of a strategic facility in China to better serve the Asia Pacific region and meet growing demand for air filtration solutions that safeguard people, processes and the environment from the impact of poor air quality.

This new state-of-the-art facility will be one of the Camfil Group's largest manufacturing sites in the world. It is being built on a total area of more than 40,000 square metres in the city of Taicang, in Jiangsu province just south of the Yangtze River. The new plant is set to be fully operational in 2021. A new state-of-the-art facility owned by Camfil will give us better ability to control and improve waste handling and energy efficiency.

The Taicang facility will be equipped with a world-class research and development centre that uses advanced technology and has the capability to design energy-efficient custom products for the APAC market. The facility also will serve as the first integrated factory for Camfil to include four production lines: for general ventilation filters, turbomachinery filters, molecular contamination control filters, and a new filter series for air pollution control. It will also house a metalwork centre for housing, air cleaners, dust collectors and more.

"Camfil's air filters and clean air solutions are some of the most energy-efficient on the market. They help purify the indoor air and create more sustainable buildings around the world. This new project meets high standards of safety and compliance, and the increased production lines ensure safe, environmentally friendly operations."

- Michel Moulin, Managing Director, Camfil China



# Business and market development

2020 was a turbulent year due to the Covid-19 pandemic, with uncertainty in the market and across supply chains. Camfil's business areas were impacted in different ways this year, but as a whole we adapted well to the new conditions and could meet the increased demand for certain products. Throughout the year, the Camfil Group continued to make substantial investments in production equipment and buildings to support our continued growth.

#### **DEVELOPMENT OUTLOOK**

Camfil drives the development of leading air and particle filtration technologies to create sustainable customer offerings that deliver better performance and lower resource consumption. Our business landscape is affected by various drivers, such as economic and market developments as well as the view of the environment and sustainability.

The Camfil Group has solid geographical coverage, with sales companies, agents and retailers in more than 50 countries. Our global position reduces the risk of impact on the company's earnings if the economic development of an individual country were to deteriorate.

As a whole, Camfil's growth potential remains positive. In the short and medium term, however, there may be exceptions in specific geographies or in categories where economic uncertainty adversely affects the willingness to invest in new projects. Over the next few years, Camfil will continue to make growth-oriented investments.



# Financial (5-year summary)

Five year Summary	2020	2019	2018	2017	2016
Income statement					
Net sales	9 164	8 676	8 298	7 294	6 722
Operating profit	1 346	1 003	1 114	896	775
Profit after net finance costs	1 282	928	1 044	829	725
Tax	-295	-235	-239	-258	-205
Profit for the year	987	693	805	572	521
Balance sheet					
Intangible assets	1 612	1 621	1 555	1 432	1 416
Property, plant and equipment	1 604	1 666	1 100	980	963
Financial assets	102	117	109	109	128
Inventories	994	912	803	930	1 056
Cash and cash equivalents	1 344	840	598	615	316
Other current assets	1 703	1 656	1 803	1 428	1 352
Assets	7 359	6 812	5 968	5 496	5 231
Equity	3 668	3 157	2 577	1 919	1 462
Interest-bearing liabilities	1 885	2 170	1 868	1 934	2 084
Interest-free liabilities	1 806	1 485	1 523	1 643	1 684
Equity and liabilities	7 359	6 812	5 968	5 496	5 231

	2020	2019	2018	2017	2016
Cash flows					
Cash flow from operating activities	1 571	1 119	714	849	684
Cash flow from investing activities	-487	-387	-306	-281	-262
Cash flow from financing activities	-473	-509	-455	-260	-571
Cash flows for the year	611	223	-47	308	-149
Key ratios					
Operating margin, EBIT	14,7%	11,6%	13,4%	12,3%	11,5%
Profit margin before tax, EBT	14,0%	10,7%	12,6%	11,4%	10,8%
Equity ratio	50%	46%	43%	35%	28%
Interest-bearing net liabilities	505	1 283	1 217	1 275	1 740
Net debt-equity ratio (gearing ratio)	14%	41%	47%	66%	119%
Return on capital employed	0,0%	27,9%	35,8%	33,6%	31,7%
Return on equity	28,9%	24,2%	35,8%	33,8%	28,7%
Investments	372	367	231	182	163
Employees (average for the year)	4 890	4 537	4 509	4 225	4 076

#### · EBIT margin (operating margin)

Earnings before financial items, appropriations and taxes, as a percentage of sales.

#### · EBT margin (profit margin before tax)

Earnings before tax, as a percentage of sales.

#### Equity ratio

Equity as a percentage of total assets.

#### · Interest-bearing net debt

Interest-bearing liabilities less cash and cash equivalents and other interest-bearing receivables, such as derivative financial instruments.

#### · Debt-equity ratio (gearing ratio)

Interest-bearing net liabilities as a percentage of equity.

#### · Capital employed

Total assets less cash and cash equivalents, non-interest-bearing liabilities including non-interest-bearing provisions. Average capital employed is calculated as capital employed at January 1 plus capital employed at December 31 divided by two.

#### · Return on capital employed

Profit after financial items plus financial expenses as a percentage of average capital employed.

#### Return on equity

Profit after tax as a percentage of average equity. Average equity is calculated as equity at January 1 plus equity at December 31 divided by two.

#### · Investments

Investments in intangible assets and property, plant and equipment.

# Camfil Sustainability Report 2020

#### CAMFIL - A GLOBAL LEADER IN AIR FILTERS AND CLEAN AIR SOLUTIONS.

For more than half a century, Camfil has been helping people breathe cleaner air. As a leading manufacturer of premium clean air solutions, we provide commercial and industrial systems for air filtration and air pollution control that improve worker and equipment productivity, minimize energy use, and benefit human health and the environment.

We firmly believe that the best solutions for our customers are the best solutions for our planet, too. That's why every step of the way – from design to delivery and across the product life cycle – we consider the impact of what we do on people and on the world

around us. Through a fresh approach to problem-solving, innovative design, precise process control and a strong customer focus we aim to conserve more, use less and find better ways – so we can all breathe easier.

The Camfil Group is headquartered in Stockholm, Sweden, and has 31 manufacturing sites, six R&D centres, local sales offices in 30 countries, and about 4800 employees and growing. We proudly serve and support customers in a wide variety of industries and in communities across the world. To discover how Camfil can help you to protect people, processes and the environment, visit us at

