



**DEMATIC**

# A Sustainable Future for People, Planet, and Products

2022 ANNUAL SUSTAINABILITY REPORT





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## Dear Stakeholders,

The global restart that followed the easing of pandemic restrictions created significant supply chain challenges worldwide. Companies looked to Dematic for guidance and solutions to not only rebuild the efficient flow of commerce, but also to reimagine it. This is where Dematic shines — through thoughtful innovation and a shared commitment to improving quality of life, while helping our customers achieve their sustainability goals.

Sustainability begins with prioritizing people. We aim to be an employer of choice and to provide our team with learning and development opportunities where occupational health, safety, and well-being are fundamental, and where employees can bring their whole selves to support the communities we serve. It's our team that determines the impact Dematic has on our customers, our supply chain partners, our neighbors, and our planet. Our mission is to make our impact a positive one.

As our customers look to Dematic for sustainable improvements in their operations, we continue to examine our own environmental footprint, including our emissions, energy usage, waste, and water withdrawal. In 2022, Dematic made significant strides with many of our operations receiving Platinum ratings — the highest mark awarded by EcoVadis — placing them in the top one percent of companies.

Purposeful collaboration with suppliers and partners is vital for both a positive environmental impact and enhanced safety. In 2022, Dematic piloted industry-pioneering Life Cycle Assessments that calculate the environmental impacts of our offerings. Through our partnership with Google Cloud, we are moving customers beyond traditional warehouse management and into the next age of intelligent optimization with Dematic software and analytics providing enhanced pathways for carbon neutrality.

I am honored to be part of Dematic's enduring sustainability journey. I encourage you to explore this report for details about our performance, goals, and strategies as we continue to weave sustainability into every aspect of our business. While we should take time to reflect on the achievements of the year, we remain focused on continued improvements for people, planet, and products.



Hasan Dandashly  
President, Supply Chain Solutions & Executive Board Member  
KION Group



# Executive Summary

Power the Future of Commerce

**Dematic continues the transformation of global supply chains to embrace trends in digitalization and e-commerce.**

We design, build, and support intelligent, automated supply chain solutions that unlock measurable value for customers in a wide variety of industries — general merchandise, grocery, food and beverage, healthcare, apparel, and many more. With research and development engineering centers, manufacturing facilities, and service centers located in more than 35 countries, the Dematic global network of over 11,000 employees has helped achieve successful customer installations for many of the world's leading brands.



## About Dematic

**11,000+**  
employees

**35+**  
countries

**\$4B**  
in revenue

### Power On. Together.

As a global company, we acknowledge and embrace diverse ideas and perspectives. By engaging with customers, suppliers, team members, and other stakeholders, we contribute to the United Nations 2030 Agenda for Sustainable Development for a peaceful and prosperous planet. We envision a responsible and sustainable future of commerce, one where vital resources flow smoothly to consumers and efficiently to where they are most needed.

**Dematic is part of the KION Group, a global leader in industrial trucks, supply chain solutions, and related services.** At Dematic, and throughout the KION Group, we are guided by four shared values: [integrity, collaboration, courage, and excellence.](#)

### About This Report

This sustainability report reflects activity, accomplishments, and metrics spanning our 2022 fiscal year, January 1 to December 31, 2022. The data and policies reflect all fully owned operations within our global network unless otherwise indicated. All monetary figures in this report are in U.S. dollars unless otherwise indicated.

Please direct any questions regarding the content of this report to [sustainabilityreport@dematic.com](mailto:sustainabilityreport@dematic.com).

# Sustainability Strategy

## People, Planet, and Products

The principles of sustainability are woven into every aspect of our business — from interactions with our stakeholder base to the processes we employ to the improvements we make to customer operations.

Dematic's approach to sustainability has been formed through equally valuing people, planet, and products. The holistic and intentional application of sustainability throughout the company helps ensure our position as a global leader in intelligent automation.

We aim to be an employer where **people want to work**. **Occupational health and safety** is fundamental to us.



We provide highly performing products, solutions, and services that are **efficient to use**, contribute to **climate change mitigation**, and enhance the **safety** of our customers.

We limit our **impact on climate change**. We also expect our **suppliers to comply with environmental and social standards**.



# Dematic's 2022 Sustainability Achievements

**Reduced Lost Time Injury Frequency Rate (LTIFR) by 40%** through an emphasis on the importance of workplace safety and accountability to each other.

**Met 82% ISO 45001 certification rate**, nearing our goal of 100% by 2024 with a continued focus on health and safety across the company.



**PEOPLE**

**Invested more than \$273,000** in the communities where we live and work through hands-on, in-kind support and grants.

**Increased Employee Resource Group-driven events by 70%**, sparking global employee engagement in volunteer opportunities, networking, and professional development.

**Reduced total Scope 1 and 2 GHG emissions by 24%** since 2020 through ongoing sustainability efforts across our global facilities.



**PLANET**

**Achieved EcoVadis Platinum rating** in Germany, Italy, Spain, the Czech Republic, and the U.K., placing these Dematic facilities among the **top 1%** of companies assessed by EcoVadis.

**Reached 81% ISO 14001 certification rate** by ensuring continued systematic improvements in environmental performance across our facilities.

**Conducted a workshop** with a multidisciplinary team of sustainability experts along with key stakeholders to determine the strategic products that will be analyzed during 2023 in the first phase of **Life Cycle Assessment (LCA)** generation, as we progress toward a sustainability-focused portfolio.

**Partnered with Google Cloud** to move our customers closer to **carbon neutrality** in products and solutions during use phase (in metric tons of CO<sub>2</sub>e Scope 3 GHG emissions caused by the use of shipped KION Group products and solutions) by 2050.



**PRODUCTS**

**Mitigated risks of noise pollution** with new **noise-reduction features** available on our linear sorter, including the quiet shoe, the merge wedge, and the slider belt.

## Sustainability Steering Committee

### Aligning to KPIs

Dematic's Sustainability Steering Committee, led by Dematic President and KION Executive Board Member, Hasan Dandashly, is responsible for integrating our identified areas of action into all business operations and processes through established quantitative targets, executed against key performance indicators (KPIs). Our areas of action are connected to an individual leader who helps ensure alignment with our KPIs and oversees our progress.

## Sustainable Development Goals

### Committed to Supporting a Global Effort

Dematic sustainability efforts are aligned with the framework outlined by the United Nations Sustainable Development Goals (SDGs). The SDGs are a universal call to action to end poverty, protect the planet, and ensure that by 2030 all people enjoy peace and prosperity.

The SDGs that we are prioritizing, based on where we believe our operations and activities have the greatest potential for impact, include:



## Governance

### Weaving Integrity into All We Do

Dematic's enduring commitment to good governance is in lock step with that of our parent company, KION Group, and their established structures, programs, and standards inform decisions we make as an organization. The KION Group Code of Compliance serves as the primary source of rules for what we consider ethical, value-oriented, and law-abiding business activities. Along with this code, additional policies help communicate and set the standards and expectations for a wide range of activities within Dematic. We prioritize these policies through clear and consistent communications to employees, suppliers, and customers alike, ensuring a global understanding of the importance of accountability and integrity to every part of our business.

At Dematic, our compliance team leads proactive efforts to identify potential risks while encouraging a culture of openness. In 2022, we refreshed and streamlined our Compliance Risk Assessments to align with those of KION Group more closely and to further reduce the number of risk assessment requests. We completed our Data Protection Assessments, conducted a Global Training Campaign, and launched our Annual Compliance Attestation Certification Program.

This past year, we also took several steps in preparation for the German Supply Chain Due Diligence Act. As part of those efforts, we launched Supply Chain Due Diligence Assessments to identify potential areas of concern and to consider appropriate countermeasures.

### KION Group Sustainability Strategy

For more information about KION Group's sustainability journey, see the [KION Sustainability Report](#).

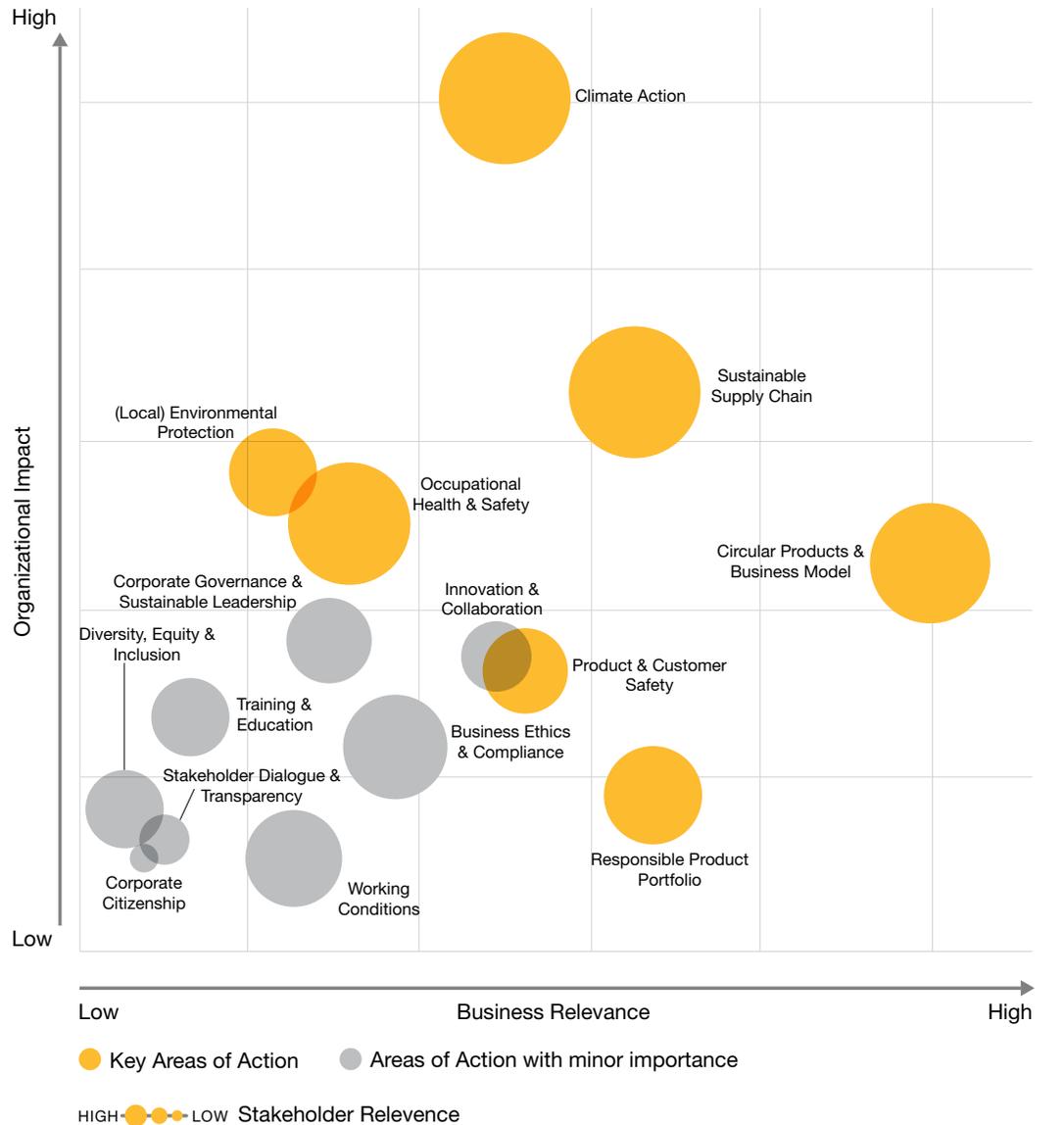


# Materiality

## Shared Stakeholder Priorities

Dematic's approach to materiality is based on analysis undertaken by KION Group, which was updated in 2022. The process included a detailed internal examination across all regions as well as global surveys of key stakeholder groups. Opportunities and risks for corporate activities were considered on the basis of the United Nations SDGs, as were the positive and negative impacts of company activities on the environment and society. Based on these findings, we identified seven key areas of action in our sustainability strategy as well as in this report.

In 2022, Dematic also conducted or participated in a number of engagement activities including our inaugural Innovation Showcase, National Nonprofit Day, employee pulse surveys, and supply chain trade group activities.





## People

Sustainability Starts Here

**Dematic designs, builds, and supports intelligent automated solutions, but that tells only part of our story.** Yes, we deliver world-class products, but everything we do is ultimately human-centered. How do we improve the lives of our customers? How do we make our communities more vibrant? How do we make our workplaces more rewarding? These are the types of questions we challenge ourselves with every day. And, every day, we're making greater strides.

## Empowering Our People

### Providing Personal and Professional Guidance for Tomorrow's Leaders

By attracting talented people, developing them for success, and creating a myriad of opportunities for their advancement, we will continue to create an environment that benefits Dematic, our customers, and, most importantly, our people. We define this as our talent lifecycle, and nurturing it is critical to finding, retaining, and developing a world-class workforce.

In 2022, as a part of this effort, we launched our first employee value proposition — **The Dematic Difference** — that captures the essential benefits of our workplace and resonates with both recruits and current employees alike. It conveys what distinguishes us as a workplace destination of choice and helps serve as a guidebook for our Human Resources team.

Dematic introduced in 2021 LinkedIn Learning®, comprehensive digital courses taught by industry experts available free to our employees. And in 2022, we witnessed a significant increase in engagement throughout our global workforce. In fact, we recorded over 10,000 individual courses completed and over 14,000 hours of views. This growth was the culmination of efforts by our employees to identify gaps and develop a wide range of custom learning pathways to help close those gaps.



### Creating a Global Hub

Dematic Engineering India opened its doors in January 2022, welcoming mechanical and controls engineers — and other professionals — to a new office in Pune, Maharashtra, India to improve our customer order responsiveness. The Dematic Global Project Engineering Academy, which delivers learning and development programs for our engineers, partnered with regional teams to provide onboarding support to ensure success from Day 1. The new office quickly began contributing to project engineering work for the Americas and EMEA regions. Another important item to note — Dematic Engineering India employs a 40% gender-diverse workforce, cultivated through a partnership with Maharshi Karve Stree Shikshan Samstha's (MKSSS's) Cummins College of Engineering for Women and through the efforts of the India chapter of Dematic Women's Network, one of our many employee resource groups.



**40%**  
reduction in  
Lost Time Injury  
Frequency Rate  
(LTIFR)

**82%**  
of our sites  
are ISO 45001  
certified

## Health & Safety

### Creating a Safer Workplace

At Dematic, we're always striving for new ways to improve overall safety for our employees, customers, and partners alike. Our dedication to safety shined in 2022 with a 40% reduction in Lost Time Injury Frequency Rate (LTIFR). This significant achievement was, in part, a result of the engagement of our leadership team in emphasizing the importance of workplace safety and accountability. A great example of this was the success of the KION Group Safety Walk, which symbolized our togetherness as we emerged from the pandemic. Another example was our ongoing Health Safety and Environment Championship program, which recognizes employee contributions to improving safety and health.

We also made progress on our objective for ISO 45001 certification on health and safety across the company. As of December 2022, 82% of our sites were certified as we close in on our goal to have 100% of sites certified by 2024.

### Well-Being

As Dematic team members returned to pre-pandemic activities, including on-site customer visits and community engagements, we provided tools to help keep them safe and healthy. Our road-warrior initiative, rolled out in 2022, featured the delivery of supplies for our traveling employees including fitness kits and routines and sanitization and nutritional guidelines. We also began monthly toolbox talks within our manufacturing facilities to communicate wellness priorities such as safety precautions and the benefits of proper sleep and diet. Efforts like this helped the Dematic Grand Rapids facility win a 2022 **Best and Brightest in Wellness** award.



# Diversity

## Cultivating More Inclusive Workplaces

Given our global reach, Dematic recognizes the importance of diverse perspectives and appreciates the benefits that result from new ways of thinking. Myopic views only stifle innovation, so we must continually broaden our approaches to collaboration, processes, and solutions to successfully deliver for our customers and for our employees.

Dematic's **Employee Resource Groups (ERGs)** serve as powerful examples of our appreciation for diverse and inclusive workplaces. These connection points bring together our employees in supportive environments where ideas, thoughts, and viewpoints are developed into actionable objectives.

While our established ERGs continued to thrive, we launched two new groups in 2022 that experienced immediate growth — Dematic Engineering Network (DEN) welcomed 160 members worldwide and Support Excellence for Reservist and Veteran Employees (SERVE) welcomed 110 members in the U.S. The India chapter of Dematic Women's Network (DWN) was established to expand the global reach of the ERG and to provide support and global connection opportunities to its members.





## Supplier Diversity

### Promoting a Diverse Supply Chain

Encouraging diversity extends to our base of suppliers as well. We recognize the role of diversity in creating innovative products and solutions for our customers. Therefore, we actively pursue relationships with companies that are third-party certified as owned and operated by diverse populations (women, minorities, veterans, LGBTQ+, and disabled) or meet the requirements of a small business.

The **Dematic Supplier Diversity Program** helps promote our shared values of integrity, collaboration, courage, and excellence while helping us to become a more inclusive company. The program ensures that we consistently add small and diverse businesses while encouraging enduring, symbiotic relationships with our suppliers. We also work with business leaders, community organizations, and trade associations that represent the interests of diverse and small businesses.

**250**  
number of  
diverse suppliers

**\$150M+**  
goods and services  
purchased

**\$126M**  
from small  
businesses

**\$7M**  
from minority-owned  
suppliers

**\$11M**  
from veteran-owned  
companies

**\$6.1M**  
from women-owned  
businesses



## Communities

### Making a Positive Impact

As a company, we recognize the importance of giving back to the communities where we live and work. By volunteering our time, donating to worthy causes, sharing our thought leadership, and connecting with our neighbors, we create a better environment within Dematic and for those living around us. **Our company-sponsored giving falls into three focus areas: building a stronger community, education, and environment and sustainability.**

### Pro Bono Thought Leadership Marathon

Last year, Dematic partnered with Taproot Foundation, an organization that connects nonprofit organizations (NPOs) with business talent to provide thought leadership. After careful deliberation, we identified nine NPOs across the U.S. to provide high-impact, actionable deliverables to help improve their effectiveness and reach.



The Thought Leadership Marathon was a virtual, two-day event that matched the expertise of 35 Dematic employees to specific NPO challenges so they could provide insights and a set of actionable, strategic, and tactical recommendations. Feedback for the program was exceptional, with 100% of NPO respondents anticipating an increase in effectiveness as a result. The program's value totaled over **\$68,000 in Dematic time and talent donated to the nonprofits.**

**“[The biggest benefit was] the ability to tap into the diverse skill sets of the Dematic team members and get much done in a short period of time.”**



— Sheltering Arms, Dematic Marathon Participant

# Communities

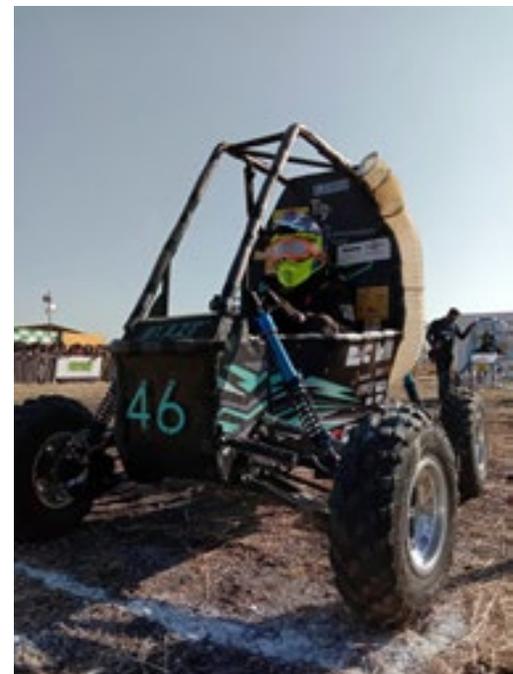
## Helping Our Neighbors

### In Asia Pacific and China:

Our teams continued to display courage in the face of adversity. As part of government mandates, a small number of members on our China team spent time sheltering at home. Dematic leaders supplemented government provided groceries and coordinated the purchase and delivery of essential food and supplies to help ensure their safety and well-being. Our employees also joined community volunteer teams to serve their neighbors and society.

After a two-year hiatus, our Sydney office joined Australia's Biggest Morning Tea, a country-wide event that aims to raise awareness and funds for cancer research that will bring us closer to a cancer-free future.

Dematic Engineering India sponsored a BAJA SAE racing team from MKSS's Cummins College of Engineering for Women during the 2022 season. Team Zenith competed in an intercollegiate engineering design competition (conducted by the Society of Automotive Engineers) that challenged undergraduate engineering students to design, fabricate, and operate off-road vehicles. Our sponsorship helped promote the participation of Indian women in engineering activities and studies.



# Communities

## Helping Our Neighbors

### In Europe, Middle East, and Africa:

Colleagues in Spain remain committed to the International Day of Persons with Disabilities. Dematic employees mobilized support for critical issues relating to the inclusion of persons with disabilities, raised awareness about disability issues, and drew attention to the benefits of an inclusive and accessible society.

In Italy, the Dematic team partnered with Bosch Rexroth and Legambiente for community clean-up activities and collected more than 222 kg of litter.

In response to the ongoing war in Ukraine and the resulting humanitarian crisis in Eastern Europe, KION Group worked intensively to provide rapid and pragmatic support to Dematic and KION employees as well as to victims and refugees of this conflict. KION Group donated €1 million to the German Red Cross, which worked with the International Red Cross to provide humanitarian aid. In addition, KION Group provided forklifts to support Red Cross logistic hubs set up for the humanitarian aid efforts in countries neighboring Ukraine.



# Communities

## Helping Our Neighbors

### In the Americas:

The Dematic Employee Association (DEA) serves West Michigan communities through an employee-based giving program. Each quarter, funds contributed are combined and donated to local nonprofits as part of Dematic's long-standing commitment to the region. In 2022, \$75,200 was donated to West Michigan nonprofits.

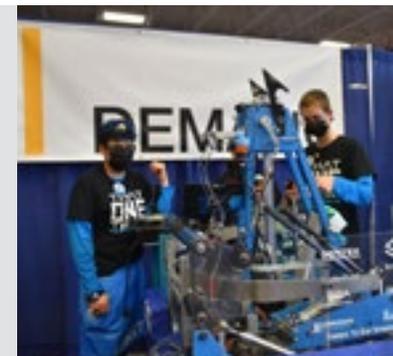
In recognition of National Nonprofit Day in August 2022, U.S. team members used their 8-hours Volunteer Time Off (VTO) and set up donation drives throughout the month to give back to their local communities.

Dematic Mexico's team volunteered for Dr. Sonrisas A.C., a nonprofit organization that relies on donations to make the dreams of a child living with a life-threatening disease a reality. Our team spent the day in July enjoying fun activities with the children in Mexico City.



### FIRST

For Inspiration and Recognition of Science and Technology (FIRST) is a leading youth-serving nonprofit advancing Science, Technology, Engineering, and Math (STEM) education. Dematic proudly continued its ongoing support in 2022 by providing hundreds of hours of mentorship and donations totaling \$63,000, including \$15,000 in scholarship funds.





# Planet

Ensuring a Greener Tomorrow

**Dematic is committed to the health of our planet by working with supply chain partners and customers to limit the effects of our operations.** In every aspect of our business, we strive to make measurable differences through personal accountability, innovative processes, sourcing more sustainable materials, and developing more environmentally friendly products and solutions. Together, with help from our suppliers and customers, we're delivering on our promise to be responsible stewards of the environment.

# EcoVadis

## Advancing Our Rating

Dematic continues to be fully committed to corporate sustainability and stakeholder transparency. That dedication is reflected by assessments of our entities from EcoVadis, a widely recognized, third-party provider of sustainability metrics and analyses. EcoVadis provides holistic ratings of non-financial issues such as ethics, sustainable procurement, environmental impacts, and human rights.

**We made significant improvements in 2022 with many of our facilities receiving Platinum ratings – the highest awarded by EcoVadis – placing them in the top 1% of assessed companies.** We're proud of how our teams have focused their efforts to achieve these goals. (Learn more about how EcoVadis rates business sustainability at [ecovadis.com](https://ecovadis.com).)

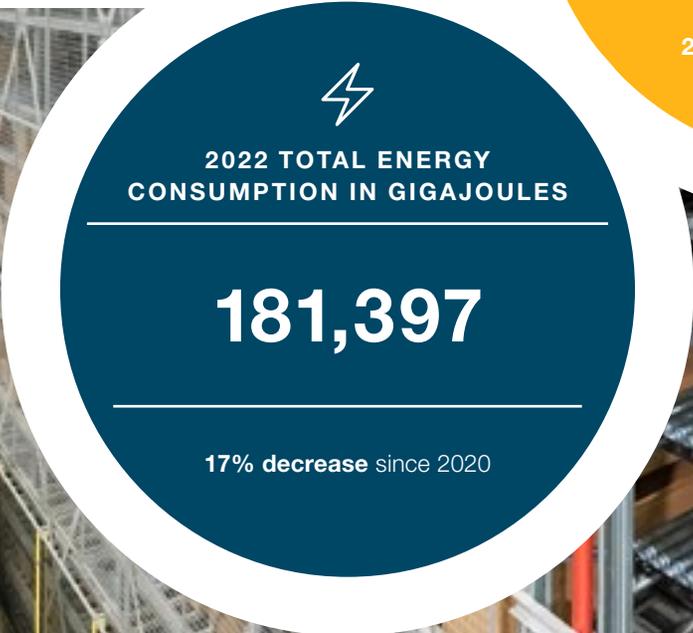


# Greenhouse Gas (GHG) Emissions and Energy

## Striving for Better Efficiency

Efficiency has always been integral to Dematic success. Customers look to us to provide efficiency for their operations, and we continuously examine our own operations — for example, by determining where and how we can most effectively reduce our environmental impacts.

Despite the increase in activities in 2022 (as we returned to on-site work after pandemic precautions eased), we reduced our overall emissions. **GHG emissions decreased by 24%** since 2020, due in part to ongoing sustainability efforts across our global facilities.



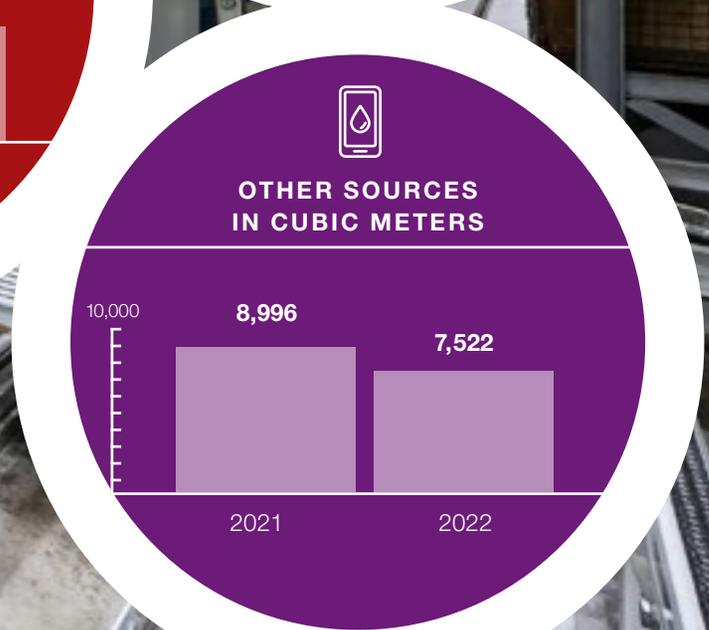
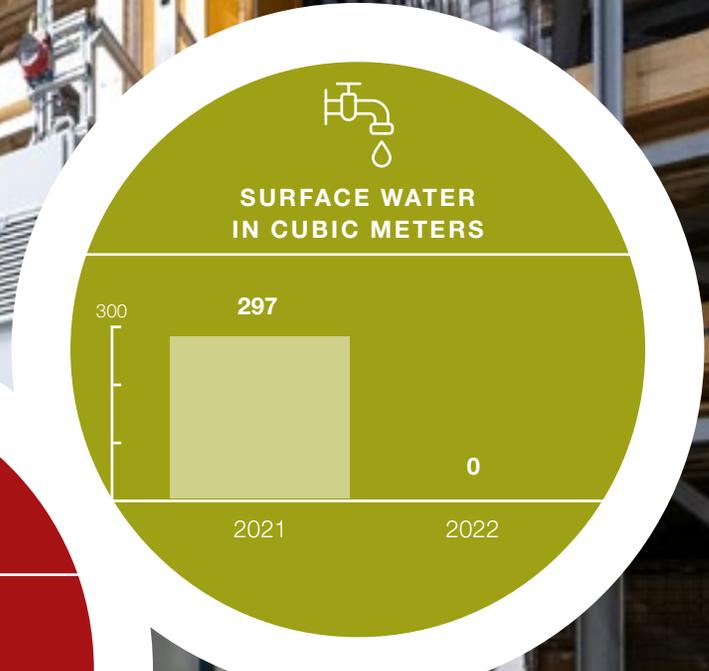
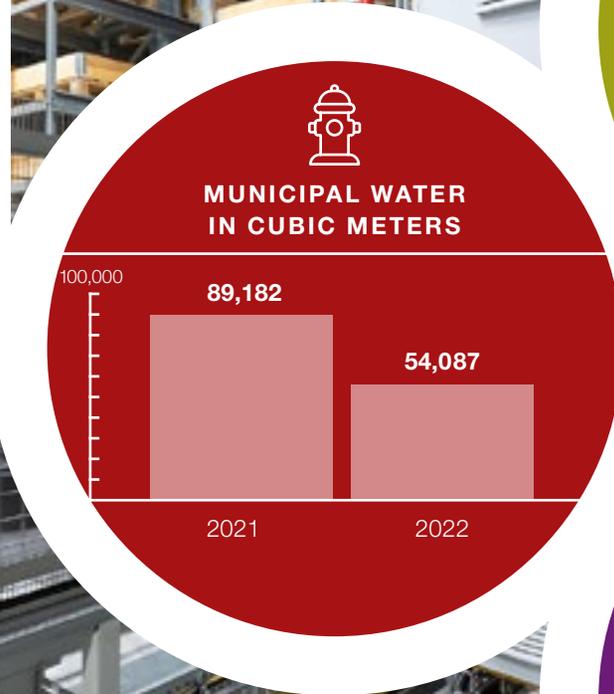
# Water

## Conserving Lifegiving Resources

Dematic supports and encourages efforts to conserve water, recognizing the significance and increasing scarcity of this resource. We regularly evaluate our manufacturing processes to reduce water consumption. Our manufacturing processes do not require large amounts of water, so our primary water usage comes from employees and visitors within our facilities. As a result, we continue to identify opportunities that can make the biggest impact.

**We're proud to report that our total water withdrawal in 2022 decreased by 37% worldwide.** This was achieved through the diligence of Dematic employees keeping conservation top of mind.

**61,609** 2022 TOTAL WATER WITHDRAWAL IN CUBIC METERS



## Waste

### Focusing on Reuse

Dematic waste reduction efforts continued to gain momentum in 2022 as we recorded a 7% drop in total waste for the year. We were able to achieve this by focusing on new processes within our manufacturing sites where most opportunities for improvement exist. We regularly evaluate our methods and implement innovative ways to reduce waste — from traditional recycling to material reuse.

We implemented waste recovery programs in several of our facilities across the globe. Dematic facilities in Australia and New Zealand sourced equipment to compress cardboard and paper waste, saving landfill space. The Dematic manufacturing facility in Střibro, Czech Republic introduced more environmentally friendly packaging materials and more efficient transportation methods.

**Our operations in Mexico, Canada, Germany, and the United States ramped up programs to recycle electronic waste that helped deliver a 100% increase in recovered hazardous waste worldwide** — a truly remarkable achievement.

**3,727** 2022 TOTAL WASTE  
IN TONS





## ISO 14001 Certification

### Nearing Our Goal

Dematic began instituting ISO 14001 certified environmental management systems (EMS) throughout our global sites in 2019. The third-party certified EMS is a rigorous approach that ensures continued systematic improvements in environmental performance across our facilities.

As of December 2022, **81% of Dematic sites are ISO 14001 certified**. This percentage takes into account 13 newly registered Dematic sites and nine newly certified Dematic sites in 2022. Our goal is 100% certification by 2024.

We collect company-wide sustainability data using a sustainability management system that is aligned with our parent company, KION Group. The platform provides us the ability to track and report data in the form of KPIs.

## Supply Chain

### Helping Our Suppliers Build More Sustainable Capabilities

At Dematic, we believe a chain is only as strong as its weakest link, and, while that's a bit of a cliché, it's the sentiment that drives our approach to developing a stronger and more sustainable supply chain. We take the responsibility seriously, and by building a collaborative ecosystem spanning Dematic, customers, and suppliers, we more effectively improve our sustainability.

Dematic has established several sustainability goals related to our supply chain, reflecting those of our parent company, KION Group. For the second year, we maintained our 2022 goal of EcoVadis (or equivalent) rating 25% of our top strategic suppliers. Looking ahead, we have set targets for 100% of our high-risk suppliers to share their sustainability data with EcoVadis (or equivalent) in 2023 and 100% of direct suppliers by 2025. Ultimately, our intent is for 100% of our suppliers to achieve a soon-to-be established minimum EcoVadis rating by 2027.

Reaching these lofty goals is not without challenges. In 2022, we solidified a three-level approach to sustainable supply chain management. We started by aligning supplier requirements with our requirements so we can assess risk levels to work together with them and continuously improve their sustainable capabilities. Through this collaborative approach, we improve our impact on the environment and become a better supplier to our customers.

### DEMATIC'S THREE-LEVEL APPROACH TO SUSTAINABLE SUPPLY CHAIN MANAGEMENT

1 Require Supplier Alignment



2 Assess Each Supplier



3 Continually Improve Sustainable Capabilities





# Products

Sustainably Driven Customer Solutions

**Dematic develops and delivers sustainable solutions that power the future of commerce.** As a global leader in intelligent automation systems, our focus is squarely set on helping our customers achieve their performance and sustainability goals with a collaborative approach.

Our sustainability journey continued in 2022 as we advanced a strategy to create industry-leading, data-driven sustainability improvements throughout the logistics ecosystem. We actively assessed areas for improvements and advanced initiatives to implement them into our solutions. Specific areas included: improved worker safety, reduced product energy consumption, reduced material waste, and improved data insights.

# Product Lifecycle

## A Circular Approach

As Dematic continues to develop products that reduce energy consumption and material waste, we have adopted the **precept of circularity**. It is a holistic concept that helps ensure every phase of our product lifecycle — from design to manufacturing to post-use life — is potentially closing the loop so nothing is wasted.

Dematic has set targets to develop a sustainability-focused portfolio by 2027 in which 100% of our new products are assessed by uniform, global standards for sustainability performance. To that end, we have piloted, and continue to conduct, industry-pioneering **Life Cycle Assessments** (LCAs) to measure and evaluate the environmental performance of our products. Through these assessments, we can more effectively implement a Cradle to Cradle® (C2C) approach that ensures products are intentionally designed and produced for recycling (upcycling) at the end of their life. These initiatives will provide us the opportunity to certify our products and quantify the environmental impact of our products, helping further differentiate them in the market.

We have also created a new team of dedicated sustainability specialists to lead **LCA certification** efforts, implement key data and metrics, guide research and development (R&D) goals, and drive customer success with solutions that increase energy efficiency. As part of that effort, our experts have found that the largest contributor to emissions is the energy consumed during a product's use phase. Already, we have developed a strategy that prioritizes energy efficiency when in use.

## DEMATIC SOLUTION LIFECYCLE



## Product Innovation

### Delivering Sustainability

To continue providing the innovative solutions our customers depend upon, Dematic collaborates with our customers and business partners to anticipate evolving regulatory standards and market preferences. Our global teams made several key product breakthroughs in 2022 that have empowered our customers to elevate their sustainability efforts. Here are a few product examples:



#### High-Efficiency Motor Drives

We continued implementing high-efficiency drive technologies — which ensure efficient use of electricity — into our standard line of products to help our customers decrease their energy usage. These new technologies contribute to the reduction of greenhouse gas emissions while continuing the high performance and reliability customers expect from Dematic.



#### Noise Reduction Portfolio

Reducing noise levels in customer facilities continues to be a high priority to help protect worker hearing. Dematic uses technologies like 3D noise mapping to conduct on-site testing that visually identifies acoustical hazards, a tool unique in our industry.

This data-driven approach guides strategies that meet and exceed customer requirements. Dematic standards for new product development include targets below 85 dB(A). In 2022, we introduced new noise-reduction features available on our linear sorter, including the quiet shoe, the merge wedge, and the slider belt. These features allow workers to better communicate and hear safety sounds, such as a fork truck backing up, to help ensure health and safety in the workplace.



#### Ergonomic Workstations

Dematic automation solutions decrease or eliminate the need for manual tasks, thereby reducing injury risks from repetitive stress. Additionally, we consistently design new products and refine existing ones to enhance worker safety and ergonomics.

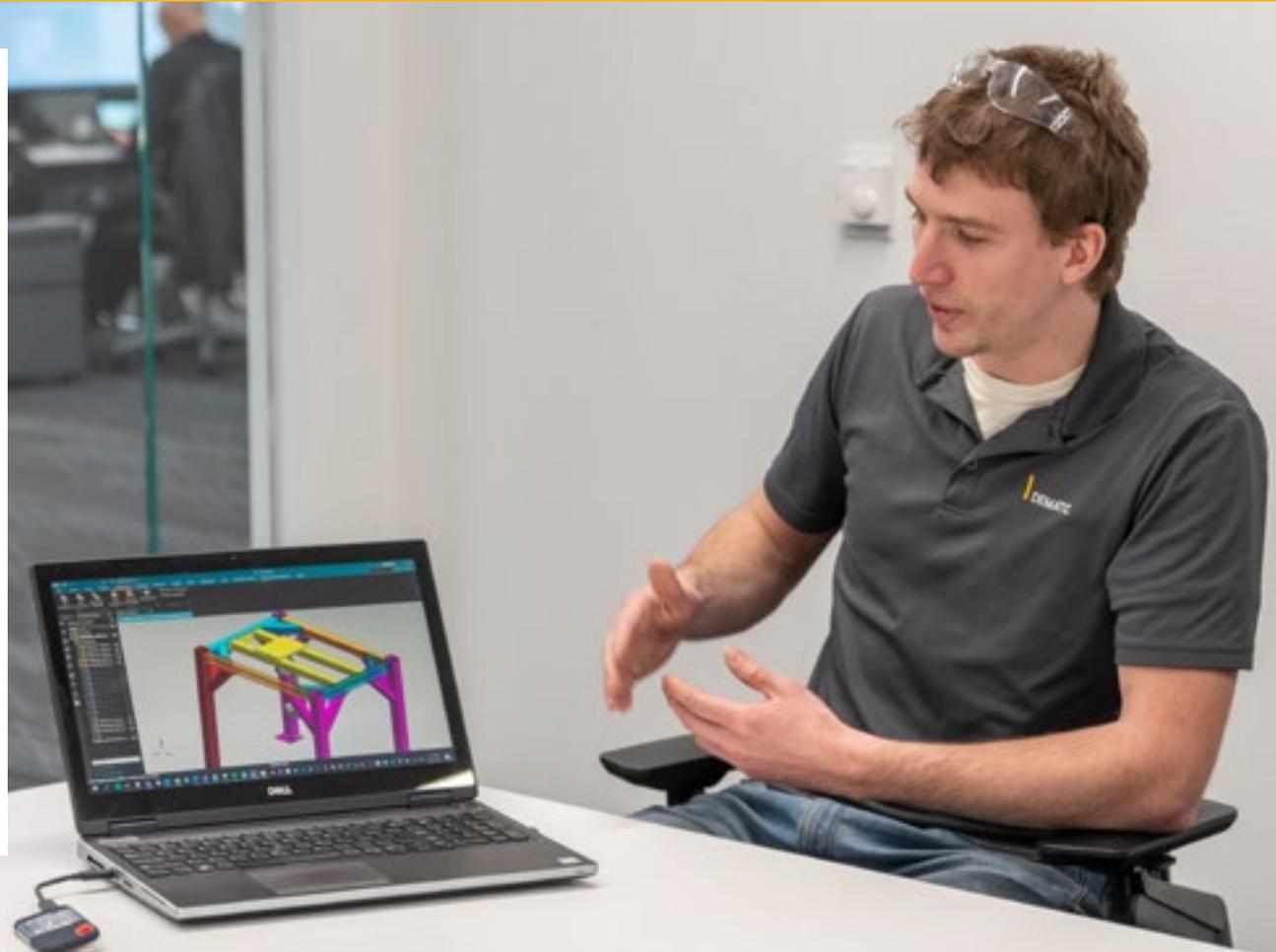
As an example, we finalized the development of Dematic's next generation of goods-to-person workstations. This new, single-level, highly dynamic ergonomic picking station achieves a low-risk category score with the Rapid Upper Limb Assessment (RULA) tool. Not only will the workstation minimize worker strain, but it will also promote improved performance with enhanced accuracy and increased throughput. Moving forward, all new Dematic workstations will be required to achieve a RULA low-risk category score.

## Research and Development

### Driving Product Innovation

Dematic R&D teams strive to exceed the stringent requirements and expectations of our customers. Through continuous improvement, Dematic R&D seeks to develop solutions that help our customers achieve their sustainability goals.

Dematic R&D has begun to establish baselines at the product level for overall power consumption to identify areas in our firmware and software where we can drive energy efficiency. These baseline energy metrics will provide a foundation for us to set goals and initiate strategies to enhance product sustainability. In addition, Dematic R&D is exploring new applications for energy regeneration — a technique that recovers and reuses otherwise wasted energy — to reduce energy consumption in customer operations.



## Dematic and Google Cloud

### Transforming the Supply Chain

Cloud-computing technologies have driven remarkable progress in analytics, artificial intelligence (AI), and machine learning (ML) in the past few years. Consequently, Dematic sought a cloud partner to help integrate those advancements into our solutions, and Google Cloud was the perfect fit. By combining Dematic's supply chain expertise and Google Cloud's AI and ML technologies, we are now better able to drive customer efficiencies in their operations, including in planning, labor, and inventory management.

This partnership will provide customers with increased operational visibility to their data, allowing for more informed decisions that can reduce their environmental impact. Google data centers are two times more energy efficient as a typical enterprise data center — 100 percent of their electricity consumption comes from renewable energy. Furthermore, data insights, inventory transparency, and warehouse optimization present significant opportunities to reduce truck emissions and waste. Together, **Dematic and Google Cloud** are accelerating supply chain digital transformation and increasing supply chain resilience.





## Product Safety

### Delivering Safer Workspaces

Product safety remained paramount in providing our customers with safer work environments. Dematic continually assesses, identifies, and mitigates potential safety risks across our entire product line during the development process.

We comply with the highest safety and health standards, including CE marking, Australian C-Tick/RCM, and UL certification requirements. We follow rigorous third-party safety processes — as well as rigorous internal standards — with a mission of preventing all accidents.

## Safety in Action

### Driverless Forklift Systems

Dematic Automated Guided Vehicles (AGVs) are designed to meet or exceed multiple requirements, including stringent global safety standards such as ISO 3691-4. By focusing on collision avoidance, Dematic continues to create safer and more efficient workplace environments for people while protecting customer facilities and the materials being transported.

[Read how Dematic is ensuring safety and peace of mind for driverless forklift systems.](#)



# DEMATIC

Dematic designs, builds, and supports intelligent automated solutions empowering and sustaining the future of commerce for its customers in manufacturing, warehousing, and distribution. With research and development engineering centers, manufacturing facilities, and service centers located in more than 35 countries, the Dematic global network of over 11,000 employees has helped achieve successful customer installations for some of the world's leading brands. Headquartered in Atlanta, Dematic is a member of KION Group, one of the world's leading suppliers of industrial trucks and supply chain solutions.

**Power the Future of Commerce**

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