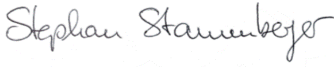




Environmental Program 2024

Purpose	The environmental program serves to improve the environmental performance of our company and describes the goals, KPI's and measures for implementation.
Scope of application	According to DIN EN ISO 14.001:2015 and DIN EN 16247-1 (energy audit)
Responsible	Environmental Management
Remarks	This document is released for public use.

Approved by:

DocuSigned by:

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Stephan Stammberger (Managing Director)


Created: February 2024

QM/EM Department

MISUMI Europa GmbH, Franklinstr. 61-63, D-60486 Frankfurt/Main

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1. Our environmental policy



We, MISUMI Europa GmbH, have set ourselves the goal of using our natural resources responsibly and keeping or avoiding the environmental impact resulting from our business activities as low as possible. In order to improve our environmental performance, we have identified the requirements arising from the context of our company and derived corresponding goals and measures from them. Our objectives are measurable and regularly reviewed.

1.1. Obligation

As a trading company, we see particular challenges in the **avoidance of waste** and **resource-saving packaging** of our products. In our state-of-the-art logistics center, we place high demands on **efficient energy consumption** and the **reduction of CO2 emissions during the transport** of our products. We meet these challenges by integrating sustainability measures into the underlying business processes. The necessary financial and human resources will be made available for this purpose.



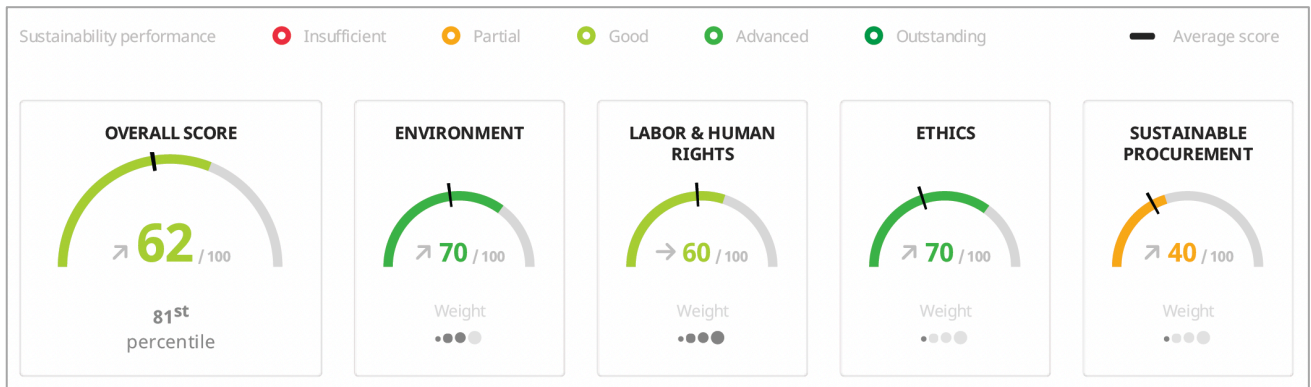
Managers and employees who are tasked with contributing to the effective implementation of environmental protection measures always receive the support of the management. Appropriate communication within the company is intended to sensitize all employees to the careful use of our natural resources and to support our environmental goals and contribute to their fulfillment.

To implement the environmental policy and to continuously improve our environmental performance, we have an environmental management system that is certified according to DIN EN ISO 14001 and is regularly reviewed by independent auditors. In addition, an energy audit in accordance with DIN 16247-1 takes place every 4 years, which serves to optimize our energy consumption and identify potential savings.


1.2. Transparency



We have decided for a high level of transparency on all sustainability issues. In addition to **protecting the environment**, this also **applies to the commitment to social and ethical concerns** as well as **responsible corporate governance** and ensuring **sustainable supply chains**. Since 2022, we have been providing annual information on the *ecovadis sustainability platform* and having ourselves evaluated. In 2023, we were able to improve our overall score from 56 to 62 points. The current score shows that we have made significant progress, especially in the environmental area (from 60 to 70 points).



In addition, our parent company, MISUMI Group Inc., plans to commit to the UNGC (United Global Compact) and SBTi (Science-based Target Initiative) initiatives to establish, track and disclose our quantitative targets on a scientific basis. In particular, the targets for reducing CO₂ emissions must be drawn up for the entire MISUMI Group with all its locations and for around 12,000 employees and must be implemented in a binding manner for each subsidiary (see Section 2.2).

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1.3. Responsibility

Taking responsibility means identifying issues, recognizing problems and developing solutions. We have analysed the following topics and incorporated them into our environmental policy.

1.3.1 Protection against Pollution and Soil Contamination



Accidental and local contamination is the result of events that may occur during regular business activities or as a result of an accident (e.g. fire, burst pipe, transport accident). This can have serious consequences for water, air and soil. We are aware that certain processes can lead to environmental damage if not handled properly and we do everything we can to avoid such pollution. To achieve this goal, the following principles have been established and apply to all our sites:

Comply with all legal requirements: MISUMI is committed to complying with all applicable legal and regulatory requirements regarding accidental pollution. We regularly review the laws and local regulations regarding pollutants, waste disposal, discharge of wastewater and handling of chemical substances.

Responsible disposal: We only use accredited waste management companies that are approved by the authorities for the disposal of waste and wastewater. We organize the disposal in accordance with the laws and local regulations. Disposal in the environment (e.g. into streams, rivers or soil) is strictly prohibited.


Prevention of leakage of liquids and other substances from installations: We regularly carry out preventive maintenance and monitoring to prevent and, if necessary, detect leaks in lubrication systems, emission systems, pipes, tanks, refrigeration plants, cleaning systems, sewage systems, etc.

Supporting pollution prevention initiatives: We work with local authorities and support their pollution reduction initiatives. We share and promote these initiatives with other MISUMI locations and branches. We also make employees aware of the consequences of environmental pollution, whether in the soil, in the air or in the water.

Transparency on the effects of pollution: We have assessed the risks related to the effects of pollution. We monitor the implementation of measures taken and their effectiveness and have defined responsibilities. We immediately report possible serious incidents to the authorities and the MISUMI headquarters.

Document procedures: We conduct regular risk assessments to identify areas of operation where accidental or local contamination could occur. We document the procedures for potentially accidental and local contamination risks and for their operational control.

Emergency insurance: We have ensured that adequate insurance is in place to cover the risks of accidental leakage or contamination, for example to cover cleaning costs, damage to the environment and legal costs.

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1.3.2. Careful management of water and wastewater




It is essential to ensure access to affordable, reliable and sufficient water supplies. The water resources we rely on are shared with the people in the communities where we operate. Accordingly, we will act responsibly to protect water as a resource for others, ourselves and future generations.

MISUMI is therefore committed to:

- Comply with all applicable laws and local regulations related to the use of water and the discharge of wastewater.
- Not wasting water, avoiding pollution from wastewater, and continuously raising awareness among all employees.
- To continuously measure our water consumption to identify potential savings and to be able to take action.
- Understand natural and man-made impacts on water resources, including climate change, and act within the framework of our corporate policy.
- Involve local and other relevant stakeholders, e.g. in connection with operational changes or strategic adjustments.

As part of our environmental program, measures are defined when the need for action has been identified in accordance with our commitment. Since water is only used in normal household quantities due to our business activities and there are no machines and systems that require water for manufacturing processes, no dedicated water management is implemented. Risks associated with the handling of firefighting water, or the discharge of wastewater are identified in emergency management.

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1.3.3. Manage waste responsibly



Preventing, reusing, and properly disposing of waste is critical to the environmentally responsible use of our resources. Responsible waste management is one of our environmental objectives (see section 2.1). For this reason, waste is separated into paper, plastic and residual waste. For this purpose, properly labelled separating containers are used at both locations. In addition, the principle of waste avoidance applies: most documents are stored electronically, and printing documents is only necessary if it is unavoidable from a legal or procedural point of view. Packaging is reused whenever possible.

In addition to the usual household waste, packaging waste is mainly generated at the logistics site. These are separated according to the types of residual waste, cardboard and plastic waste. For this purpose, appropriately marked containers are set up in many work areas. There are also separate collection areas for electronic waste and scrap metal.

Since no hazardous waste is generated at any location, there are no guidelines for this. Only used batteries are produced in normal household quantities and are collected and taken to suitable collection points.

The waste process in our logistics center is documented and supplemented by instruction documents. All waste is recorded in a waste register. The use of packaging materials is also documented.

1.3.4. Reducing CO₂ emissions



As a trading company, we do not operate any production facilities, but as part of the supply chain, we also see ourselves as obliged to contribute to the reduction of CO₂ emissions. We record our energy consumption and the associated CO₂ emissions for both sites.

The indirect CO₂ emissions caused by the freight transport of our merchandise, mainly from the Asian region, are a significant part. These CO₂ emissions are also recorded for air transport as well as for sea and road transport. Total emissions are disclosed.

Quantitative and scientifically verifiable targets are set for our emissions (see sections 2.2 and 2.3).

1.4. Consciousness

The involvement of employees and suppliers is essential for the successful implementation of the goals and measures described below.



Through appropriate information and instruction, our employees are sensitized to energy saving. In the logistics center in particular, the avoidance and separation of waste will be further discussed.

In preparation for the Supply Chain Due Diligence Act (SCDDD), our suppliers are increasingly being involved in the overall sustainability management, with environmental management playing an important role. Through a newly implemented application, our key suppliers are evaluated on all ESG issues. In doing so, we stand by our obligation to make our contribution to meeting sustainability requirements.

2. Our Goals

We regularly identify and evaluate the environmental aspects that influence our day-to-day business processes (see Appendix 1). From this, we have identified the topics of **"waste, energy and transport"** as key environmental aspects and formulated our objectives from this:

- 1) **Waste avoidance:** optimization of packaging and consistent waste separation
- 2) **Energy efficiency:** Responsible use of energy and reduction of CO₂ emissions
- 3) **Reduction of fuel emissions:** optimization of our transport routes and means

2.1. Waste avoidance: optimization of packaging and consistent waste separation



Our goal is to contribute to the prevention of waste and not to waste resources unnecessarily. To achieve this goal, we examined our packaging management and identified a lot of potential for optimization. Avoiding waste is a top priority. If waste is unavoidable, reuse (upcycling) or recycling should help to save resources as much as possible.

Waste avoidance in packaging and fillers so that waste is not generated in the first place

In addition to a stable outer packaging, high-quality filling material is necessary to ship our products to ensure safe shipping. Since 2018, a special paper has been used as an alternative filler for consignments whose weight and quality allow it. By using this filler, the number of PET film cushions and polystyrene flakes has

been significantly reduced since 2018. Spurred on by the good experience and positive feedback from our customers, we are now using the alternative filler in two quality levels: thinner paper for light to medium-weight shipments and stronger paper for heavy shipments. PET film cushions must still be used for very heavy shipments, but these will only be reused from incoming shipments. Since 2020, we no longer must buy foil cushions. As a result, since the end of 2021, we have been able to completely dispense with fillers made of plastic and polystyrene.

Since the changeover has been completed, no key figures will be collected, and no measures will be defined.



1 - PaperJet with normal paper thickness



2 - PaperJet with higher paper thickness



3 - Paper fillers

Efficient handling of packaging material to reduce waste

Every year, we send around 400,000 shipments of goods to our customers. As a result, many packaging materials are produced. When selecting the envelopes, care is taken to ensure that they are FSC-certified. The packaging size is also selected so that no materials are wasted excessively. Due to the future recording of packaging materials in our warehouse management system (LFS), packaging quantities can be monitored very precisely and optimized if necessary. The aim is to dimension packaging in such a way that as little waste as possible is generated. In addition, suitable packaging is reused.

The underlying measure #2 is described in Section 3 – "Our Metrics". The planned action #1 is described in Section 4 – "Our Actions" for the year 2024.



4 - FSC certified mailers



5 - Optimized packaging sizes

Separating and recycling your own waste so that it can be reused in a meaningful way

With our waste concept at the Logistics site, we want to help avoid excessive waste and motivate our employees to separate waste properly. For example, containers were set up at all work areas for on-site separation. Waste balances are evaluated in detail as part of environmental management to achieve step-by-step improvements together with the disposal company. The employees have been trained as part of the new waste concept and will continue to be sensitized through regular instruction in the future. To verify the target, a separate collection rate will be collected and tracked. The separate collection rate shows how high the proportion of all waste is separated on site. Finally, in 2023, bins for waste separation were set up in all recreation and office rooms.

The underlying measure #2 is described in Section 3 – "Our Metrics". The planned action #4 is described in Section 4 – "Our Actions" for the year 2024.



6 - Separator tank on site



7 - Separate waste compactors

2.2. Energy efficiency: Responsible use of energy and reduction of CO2 emissions

Our goal is to use energy as efficiently and sparingly as possible. By relocating our locations to a modern logistics center and an energy-efficient office building, we already created an important basis for this in 2017 and 2018. We have developed a program for the two sites to be able to take the right measures for the responsible use of energy.

For the entire MISUMI Group Inc., a reduction of CO2 emissions of 42% by 2030 (compared to 2020) is planned. For us in Europe, this means that we will make the same efforts and reduce our own direct and indirect emissions by the target.

The necessary key figures have been calculated and stored in the following overview:

Year	Reduction Target (%)	Emissions (t) Scope 2	KPI IS (g/€ Sales)	KPI TARGET (g/€ Sales)	Emissions (t) Scope 3	KPI IS (g/€ Sales)	KPI TARGET (g/€ sales)
2020	100,00%	399	3,61	3,61	10.292	93,10	93,10
2021	95,80%	402	2,98	3,46	10.784	80,05	89,19
2022	91,60%	370	2,68	3,31	10.770	77,98	85,28
2023	87,40%	332	2,30	3,15	10.253	70,97	81,37
2024	83,20%			2,69			76,96
2025	79,00%			2,56			73,08
2026	74,80%			2,42			69,19
2027	70,60%			2,29			65,31
2028	66,40%			2,15			61,42
2029	62,20%			2,01			57,54
2030	58,00%			1,88			53,65

CO2 Emission Reduction Target (MISUMI Group):

42% Reduction from Base Year 2020 to Target Year 2030

Emissions S3: Inbound/Outbound Transport + Waste

Energy-efficient office building




The layout of the office building, which was newly occupied in 2018, is already designed to be very energy-saving. All rooms are equipped with LED lighting technology, and motion detectors automatically switch off the lights in all offices.

The building is cooled passively by beton core activation. The building complies with current standards in the field of green building and is DGNB-certified. This means that the building meets the standards of the German Sustainable Building Council.

State-of-the-art heating technology and use of high-speed doors in our logistics centre

Our new logistics centre also meets today's requirements. Gas radiant heaters are characterized by a high proportion of heat used with acceptable exhaust gas losses. Our two hall areas are equipped with this energy-

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efficient heating technology. The noiseless and fanless technology also creates a more pleasant working environment for the employees.

Goods are delivered via roller shutters. Due to the regular approach of the delivery vehicles, heat escapes unnecessarily when the roller door is opened. At the beginning of 2019, these doors were supplemented with high-speed doors, which are only open for a short time during loading and unloading. As a result, less heat escapes.



8 - Gas radiant heater



9 - High-speed door


Area-specific recording of electricity consumption in our logistics center and measures to reduce electricity consumption

The basis of efficient energy management is a sector-specific recording of consumption. Since mid-2021, we have been able to record consumption in smaller areas (e.g. parts warehouse, shuttle storage system, office areas) and derive targeted measures through technical measures.

In March 2020, a reactive current compensation system was put into operation. This makes it possible to reduce the amount of so-called reactive current, which occurs when using alternating current and has no benefit. The consequence is the saving of electricity that is not actually used. In this way, up to 140 kW per hour can be saved, which enables financial savings of up to 25,000 euros per year and thus also significantly reduces CO₂.

In 2018/19, all office areas at the logistics site were equipped with motion detectors for automatic light switch-off. The office areas as well as the work areas in the warehouses were equipped with LED lighting technology by the summer of 2021. Finally, in 2023, the sanitary and catering areas were converted. For outdoor lighting, the changeover is planned for 2024. This means that by the end of 2024, our two locations should be fully converted to LED lighting.

Since the beginning of 2024, the electricity supply for both sites have been completely converted to the "Öko-Premium" green electricity variant. This green electricity is independently certified by the "Green Energy" label and is characterized by special sustainability, for example through targeted funding of regional energy projects by the electricity provider.

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Another important measure will be the use of a newly installed photovoltaic system on the roof of the hall areas. This should make it possible to limit the share of purchased electricity to 40% from mid-2023. The majority of 60% of the electricity required is then generated emission-free directly on the roof of our logistics center.

The underlying measure #3 is described in Section 3 – "Our Metrics". The planned measures #2 - #8 are described in section 4 - "Our measures" for the year 2024.



10 Reactive current compensation system




11 - Separate consumption recording



12 - PV system (example photo)



13 - Green electricity certificate from the supplier

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2.3. Reduction of fuel emissions: optimization of our transport routes and means

Fuel emissions are caused by the transport of goods and the traffic of our employees. Especially when importing goods, we cause high fuel emissions due to long transport routes. For both areas, emissions are to be reduced through appropriate measures.

Recording and evaluation of transport emissions

As a trading company, a large part of GHG emissions are caused by the transport of our products, primarily from the Asian region. Most of the products are currently transported by air freight, which leads to very high emissions. In 2020, we started recording these transport emissions monthly. At the same time, more and more products that are stored on site are being transported by ship.

However, strengthening local production and supply chains is also essential for reducing transport emissions. It is therefore one of our strategic goals to set up a production of various components within Europe or to include European manufacturers in our supplier network. As a result, transport routes are shortened and the resulting GHG emissions are reduced.

Currently, only key figures around inbound goods are collected. Outbound goods are expected to be received from mid-2023.

The underlying measure #4 is described in Section 3 – "Our Metrics". The planned measure #9 is described in section 4 – "Our measures" for the year 2024.

Entry into e-mobility and support of alternative mobility concepts

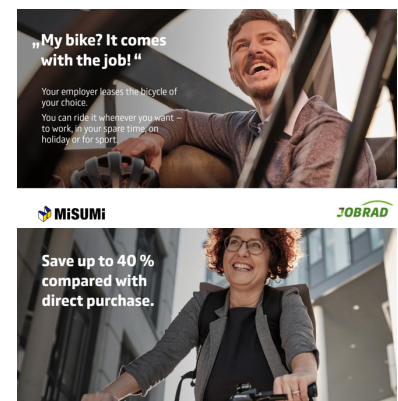
In 2021, the first company vehicles were converted to zero-emission battery-powered vehicles. By 2023, four fast-charging stations have now been installed at our logistics site to enable on-site charging. The aim is to support employees in switching to e-mobility in their private lives. Since the beginning of 2021, we have been offering all employees the opportunity to purchase a job bike at fair conditions. All employees at the Logistics site receive a travel allowance if they use public transport. A job ticket has been available for the office location since 2022.




14 - Wallbox at the logistics site



15 - Weather-protected bicycle parking spaces



16 - Job bike program


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3. Our key figures

The key figures are defined at the beginning of a financial year. Each metric is based on an operational objective, which is reviewed annually. In order to achieve the operational objectives, measures are defined and the measures of the previous year are evaluated.

The tracking of the key figures is documented in Appendix 2. Where possible, follow-up is carried out monthly by determining the relevant figures. The results are evaluated once a year in our Management Review.

En-vironmental aspect	#	Ratio	Definition	IS 2023	TARGET 2024	Operational Objectives
Waste	1	Waste quota per shipment <i>xx kg / shipment</i>	The waste quota is determined by the total weight of all waste divided by the total number of all consignments.	0.15 kg / shipment	< 0.15 kg/shipment	Reduce the waste rate of packaging materials to reduce waste in packaging management and optimize package sizes
Waste	2	Separate collection rate xx % of separately collected fractions	The separation collection rate indicates the prescribed separation rate of 90 percent by mass. If this is not achieved, the waste is sent to a pre-treatment plant by the disposal company.	81.5% / 100% waste	> 80% / 100% waste	Increasing the separation collection rate on site and thus reducing residual waste
Energy	3	GHG emissions from purchased electricity, heating energy, fuels (Scope 1/2) <i>xx g / Euro sales</i>	The key figure is the CO ₂ emissions per euro of sales. Long-term measures are intended to gradually reduce this rate.	2.3 g CO ₂ e/EUR turnover	< 2.0 g CO ₂ e/EUR sales	Reduce GHG emissions by 42% by 2030 (adoption of MISUMI Group target)
Traffic	4	GHG Emissions Per Shipment (kg) - In-bound (Scope 3) <i>xx g/Euro Revenue</i>	The key figure is the CO ₂ emissions per euro of sales. Long-term measures are intended to gradually reduce this rate.	66 g CO ₂ e/EUR turnover	< 80 g CO ₂ e/EUR turnover	Reducing emissions in in-bound transport through fewer or optimized air transports and strengthening local production and thus shortening transport routes
Traffic	5	GHG emissions per shipment (kg) - Out-bound (Scope 3) <i>xx g / Euro sales</i>	The key figure is the CO ₂ emissions per euro of sales. Long-term measures are intended to gradually reduce this rate.	5.0 g CO ₂ e/EUR sales	< 6.0 g CO ₂ e/EUR sales	Recording of emissions from the main transporters GLS and TNT and regular tracking

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4. Our measures

The following table lists all the measures that are to be implemented in the coming financial year. Details of each planned action are described in Section 4.2. The measures of the previous year are evaluated in Annex 3.


4.1. Planned measures

Location	Environmental aspect	Description	KPI Ref.	Appointment	#
Logistics	Waste	Inclusion of environmental criteria in the selection of packaging and packaging aids	2	31.12.24	1
Logistics	Energy	Control of the lighting in the shelving system (mezzanine)	3	31.07.24	2
Logistics	Energy	Switching the exterior lighting on the building to LED	3	31.07.24	3
Logistics / Administration	Energy / Waste	Guidelines for employees on how to save energy and manage waste	2 / 3	31.07.24	4
Logistics	Energy	Automatic shutdown of the workstations on the automation system (CUBY)	3	31.07.24	5
Logistics / Administration	Energy	Implementation of an energy audit according to DIN 16247-1	3	31.09.24	6
Logistics	Energy	Use of the installed photovoltaic system for a proportion of electricity feed-in	3	31.12.24	7
Logistics	Energy	Carrying out measurements of compressed air loss in the automation system (CUBY)	3	31.07.24	8
Logistics / Administration	Traffic	Evaluation of transporters considering sustainability criteria	4 / 5	31.12.24	9

4.2. Our measures in detail

To achieve the defined goals, measures are defined, tracked, and evaluated on an annual basis. The measures for the current financial year are described below. The structure is the following:

- Each measure refers to the underlying environmental aspect (see Annex 1) and the defined indicator (see section 3).
- Each measure is described in detail and – where appropriate – documented by photos or pictures.
- Upon completion, each measure will be evaluated in terms of effectiveness (see Annex 4).

Action #1	Environmental aspect: Waste	KPI Reference: 2
<p>Inclusion of environmental criteria in the selection of packaging and packaging aids</p>		
<p>The aim is to examine whether more environmentally friendly alternatives can be found for the following packaging aids:</p> <ul style="list-style-type: none"> - Printer rolls (FSC-certified paper, eco-friendly adhesive coating + backing film) - Packing tape (environmentally friendly adhesive coating) - Delivery note pockets (recycled film, eco-friendly adhesive coating) - Stretch film (recycled film) - Strapping (recycled plastic) <p>As early as 2021, it was possible to switch completely to paper instead of foil cushions or Styrofoam for the filling material. If paper cannot be used due to the weight, foil cushions from delivered packaging are re-used.</p> <div style="display: flex; justify-content: space-around;"> <div data-bbox="172 1317 663 1684">  </div> <div data-bbox="692 1317 1024 1751">  </div> <div data-bbox="1050 1317 1382 1751">  </div> </div> <div style="display: flex; justify-content: space-around; margin-top: 10px;"> <div data-bbox="172 1720 584 1751"> <p>17 - Storage space for packaging aids</p> </div> <div data-bbox="692 1787 884 1818"> <p>18 - Packing tape</p> </div> <div data-bbox="1050 1787 1264 1818"> <p>19 - Reusable films</p> </div> </div>		

Action #2

Environmental aspect: Energy

KPI Reference: 3

Control of the lighting in the shelving system (mezzanine)

Currently, the lighting of the shelving system (mezzanine) is centrally controlled in each area via several switches. As a result, areas where no one is present are often constantly illuminated. The energy consumption is very high due to the large number of lamps. Switches are installed behind the seats of the Unit Leaders to control the lighting from there. This ensures that the lighting can be switched off centrally after work. The lighting can also be controlled as needed during working hours (e.g. switching off individual areas in the shelving system).



20 - Mezzanine lighting



21 - Central control of the lighting

Action #3

Environmental aspect: Energy

KPI Reference: 3

Switching the outdoor lighting to LED

The building's exterior lighting has not yet been converted to LED technology. It should be checked whether the installation of new lamps is necessary (high costs) or whether only the bulb can be replaced. A corresponding test is to be carried out at the beginning of the year. Switching to LED would result in significant savings in electricity consumption. In any case, the landlord must be involved.



22 -Outdoor lighting



Action #4

Environmental aspect: Energy

KPI Reference: 3

Guidelines for employees on how to save energy and manage waste

A guideline is to be created to sensitize the employees at both locations to saving energy. Key points of the guide:

- Handling of heating
- Dealing with electricity at workplaces
- Dealing with the air conditioning systems in the offices
- Shutdown of systems at the end of work

Furthermore, a guideline for the proper separation of waste is to be created for all employees at the logistics site. In addition, regular on-site instruction is to be provided.



23 – Waste collection point (yellow = foil, blue = left-over, grey = paper)

Employees at the administration site are to be made more aware of the need to save energy. The following measures are envisaged:

- Presentations for the Info Screens with information on the economical use of energy
- Identical information in the QM Sharepoint and in the QM Newsletter at regular intervals

Action #5
Environmental aspect: Energy
KPI Reference: 3
Automatic shutdown of the workstations on the automation system (QUBY)

The devices at the packing stations (computers, monitors, printers, lighting) on the automation system should be completely switched off at the end of work. It should be checked whether an automatic shutdown is possible. Alternatively, the workstations could be equipped with switchable power strips. In addition, employees are to be instructed.



24 - Packing workstation

Action #6

Environmental aspect: Energy

KPI Reference: 3

Implementation of an energy audit according to DIN 16247-1

As part of our voluntary commitment to have an energy audit carried out every 4 years in accordance with DIN 16247-1 by an independent testing body, all consumers must be regularly recorded with regard to their electricity requirements. In addition, the cross-sectional technologies must be documented. In preparation for the upcoming audit in 2024, the recording will be carried out again this year. The audit is scheduled for August 2024.

Gebäudekennung	Bezeichnung Verbraucher	Baujahr	Energieträger
	Bitte wählen Sie hier das Objekt oder die Gebäudekennung aus, auf welches sich der Energieverbraucher bezieht.		
	Geben Sie hier bitte die exakte Bezeichnung des Energieverbrauchers ein. Dazu gehört auch ggf. die Anzahl gezeigter Verbraucher (wie bei der Beleuchtung). Sie haben max. 300 Zeichen zur Verfügung.	Wählen Sie bitte das Baujahr des Verbrauchers aus. Sollte Ihnen das Baujahr nicht bekannt sein, können Sie bitte eine grobe Schätzung.	Welche Energieträger nutzt der Verbraucher? Sollte der Verbraucher mehrere Energieträger nutzen, machen Sie bitte einen jeweils einen separaten Eintrag. Beispiele: Strom Wärme Erdgas
St. Martins Tower WING	Aktivvernichter (9 x 120W)	2016	Strom Getec
St. Martins Tower WING	Access Points (20 x 100W)	2016	Strom Getec
St. Martins Tower WING	Beleuchtung Bürobereiche (400)	2018	Strom Getec
St. Martins Tower WING	Beleuchtung Empfang (4 x 40W)	2018	Strom Getec
St. Martins Tower WING	Beleuchtung Flurbereiche (128 Downlights)	2018	Strom Getec
St. Martins Tower WING	Beleuchtung Sanitär (104 Downlights á	2018	Strom Getec
St. Martins Tower WING	Beleuchtung Teeküchen (16 Downlights á	2018	Strom Getec
St. Martins Tower WING	Desktop PCs (26 x 100W)	2014-2020	Strom Getec
St. Martins Tower WING	Durchlauferhitzer (24 x 2000W)	2018	Strom Getec
St. Martins Tower WING	Kaffeemaschine Agulla (1 x 8600W)	2019	Strom Getec
St. Martins Tower WING	Kaffeemaschinen Gerni (4 x 2400W)	2016	Strom Getec
St. Martins Tower WING	Kaffeemaschinen Aramark (5 x 2000W)	2014	Strom Getec
St. Martins Tower WING	Klimaanlage 1 Serverraum (1 x 11.000W)	2018	Strom Getec
St. Martins Tower WING	Klimaanlage 2 Serverraum (1 x 3700W)	2017	Strom Getec
St. Martins Tower WING	Kühlschränke (10 x 90W)	2018	Strom Getec
St. Martins Tower WING	Kuvertiermaschine (1 x 600W)	2014	Strom Getec
St. Martins Tower WING	Laptops (188 x 90W)	2014-2020	Strom Getec
St. Martins Tower WING	Mikrowellengeräte (8 x 1450W)	2018	Strom Getec
St. Martins Tower WING	Monitore (375 x 21W)	2016	Strom Getec
St. Martins Tower WING	Multifunktionsdrucker C227 (5 x 1500W)	2016	Strom Getec
St. Martins Tower WING	Multifunktionsdrucker 6586 (1 x 1500W)	2016	Strom Getec
St. Martins Tower WING	Netzwerkkomponenten MPLS (19 x 100W)	2016	Strom Getec
St. Martins Tower WING	Heizkörper (240)	2014	Fernwärme
St. Martins Tower WING	Dell R620 Server (4 x 750W)	2017	Strom Getec
St. Martins Tower WING	Spülmaschinen (16 x 2000W)	2018	Strom Getec

25 - Survey of consumers

Beleuchtungssysteme Standort WING	
<p>Allgemeine Prozessbeschreibung</p> <p>Im WING können vier unterschiedliche LED-Beleuchtung der Firma Osram verwendet werden. Die Beleuchtung wird ausschließlich in Abhängigkeit der verfügbaren Tageslicht gesteuert. Dies geschieht mit Hilfe von Sensoren, die gleichmäßig ausgebracht werden. Durch die automatische Anpassung an das Tageslicht werden auch viele nur zu sehr geringen Leistungen, wie geschätzt benötigt. In Abhängigkeit befinden sich 4 unterschiedliche Anlagenarten.</p>	
<p>Angaben zu einzelnen Anlagen</p> <p>Art</p> <p>2002 Standard LED-Downlights (3-11 Modult)</p> <p>248 Zumbal LED-Downlights</p> <p>34 Anlagen-Lampen</p>	<p>Standort</p> <p>Baujahr 2014, Neuerung, Wartung durch Hauswart</p>
<p>Beleuchtungssysteme Standort DCT</p> <p>Allgemeine Prozessbeschreibung</p> <p>Die Beleuchtung der beiden Hallen besteht überwiegend aus LED-Lichtketten und einzelnen LED-Spots. Nach verfügbaren Leuchtstoffröhren werden zunehmend auch LED-Technik eingesetzt. In den Anlagen (Mitarbeiter können ausschließlich LED-Beleuchtung zum Einsatz, die bereits weiter geschaltet werden kann. Energie gespart werden nicht nur Strom, da jeweils die Bereiche der Beleuchtung werden, welche in den Mitarbeiter werden zur Zeit noch Leuchtstofflampen verwendet. Für die Außenbeleuchtung kommen HQ-Lampen zum Einsatz.</p>	
<p>Angaben zu einzelnen Anlagen</p> <p>Art</p> <p>107 LED-Fluter (1x1 & 1x2)</p> <p>2011 LED-Lichtkette (1x1 & 1x2)</p> <p>47 LED-Lichtkette (1x1 & 1x2)</p> <p>100 Leuchtstofflampen (1x1 & 1x2)</p> <p>20 Leuchtstofflampen (1x1 & 1x2)</p> <p>20 Leuchtstofflampen (1x1 & 1x2)</p> <p>20 Leuchtstofflampen (1x1 & 1x2)</p>	<p>Standort</p> <p>LED-Beleuchtung neuartig, mit Lichtsensoren (Drehzahlstromwert von 2018)</p> <p>Leuchtstoffröhre in den Büroräumen (1x1 & 1x2) (Lampen aus dem abmontierten Bestand (Baujahr 2008), Zustand gut)</p>
<p>Beleuchtungssysteme</p>	
DCT:	<p>Leuchtstoffröhre DCT (1x1 & 1x2)</p> <p>LED-Fluter DCT (1x1 & 1x2)</p> <p>LED-Lichtkette DCT (1x1 & 1x2)</p>

26 - Recording of cross-sectional technologies

Action #7

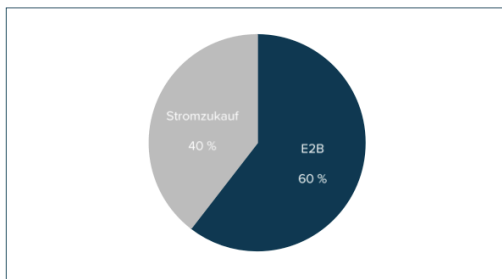
Environmental aspect: Energy

KPI Reference: 3

Use of the installed photovoltaic system for a proportion of electricity feed-in

In 2022, a new photovoltaic system was installed on the roof of the logistics halls. The operator uses the roof area to sell the generated electricity to appropriate suppliers. After contacting the operator, it is possible for us to purchase the electricity directly. Currently, the plant has not yet been put into operation, as a transformer station still needs to be built. As soon as the system has been put into operation, the supplier will contact us to discuss the contractual conditions. Subject to the contractual arrangements, we will then be able to obtain approx. 60% of our annual electricity from the PV system.

jährliche Übersicht in %



→ Jährlicher Zukauf von 40 % Graustrom nötig

Überblick Stromverbrauch

	Stromverbrauch MISUMI [MWh]	Stromherstellung Solaranlage [MWh]	E2B [MWh]	Stromzukauf [MWh]
Januar	56	34	24	32
Februar	51	44	28	24
März	56	82	37	20
April	50	116	34	16
Mai	54	129	39	15
Juni	52	137	38	14
Juli	54	140	40	14
August	55	117	38	17
September	54	91	34	20
Oktober	53	56	30	23
November	52	33	24	28
Dezember	54	29	22	32
Summe	640	1.009	387	253

27 - Analytical evaluation of current load profiles

Action #8

Environmental aspect: Energy

KPI Reference: 3

Carrying out measurements of compressed air loss in the automation system (CUBY)

A leak detector was procured to be able to search for compressed air losses in the automation system. Compressed air losses result in a significant increase in energy consumption at the compressor system. Once all leaks have been identified, measures can be determined. The inventory is planned for Q1 2024. The measures are to be defined by the middle of the year.



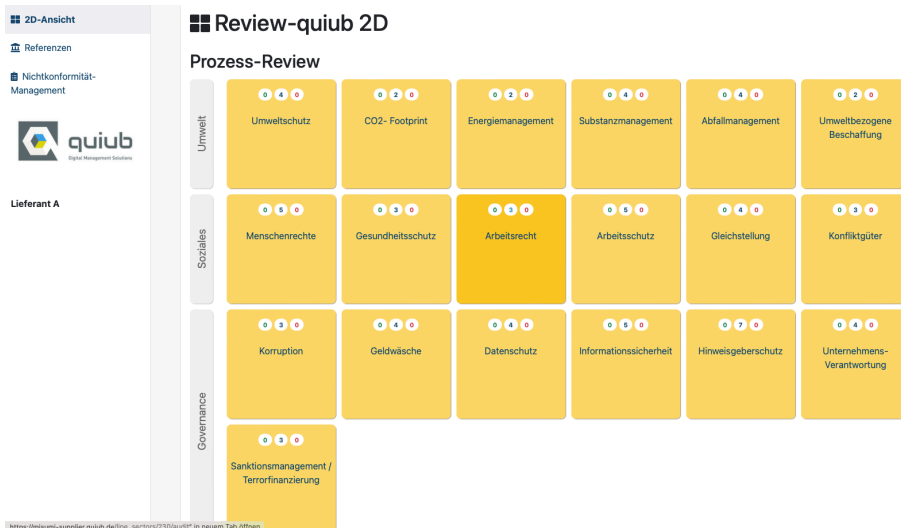
Action #9

Environmental aspect: Transport

KPI Reference: 4 / 5

Evaluation of European suppliers considering sustainability criteria

For the inclusion of European suppliers, the most important suppliers are to be included in an assessment that also considers sustainability aspects in accordance with the Supply Chain Due Diligence Act (SCDDD). This also includes suppliers with environmentally relevant activities and services. To this end, the standard assessment was expanded to include sustainability aspects and a risk assessment of these suppliers was carried out. Based on this, measures can be determined. The QUIUB SCORE tool is used for this purpose. The results are incorporated into our own sustainability reporting at EcoVadis. The next reporting period will start in May 2024.



28 - Supplier evaluation tool: QUIUB SCORE

Annex 1 – Environmental assessment

The environmental aspects are re-evaluated annually. First, the environmentally relevant activities for each location are listed and examined regarding their *input and output*. *Input* stands for resources that are consumed, *output* stands for environmentally harmful impacts. Each input and output have an impact on the environment and is evaluated according to 5 criteria (the evaluation criteria are described below).


The outcome of the evaluation identifies the priorities for action:

0	There is currently no need for action.
5	It must be examined whether there is a need for action. Measures can be planned in the medium to long term.
10	There is an acute need for action. Corrective measures must be implemented in the short term. Preventive measures can be planned in the medium to long term.

Appropriate measures can be taken to reduce or substitute the impact on the environment. The measures referred to here are set out in detail in Section 4 for the current financial year.

Site and environmental activities	Input / Output	Environmental Impact / Environmental Impact	Evaluation (criteria below)				
			Binding Commitments	Severity of exposure	Interested Parties	Ability to be influenced	Economic aspects
Location Office / WING: Administrative processes (supplier management, customer service, sales and marketing, product purchasing, IT, compliance, finance, human resources)	General Power Consumption (Input)	Resource consumption (electricity, indirect CO2)	0	0	5	5	5
	Heat Consumption (Input)	Resource consumption (district heating, indirect CO2)	0	0	0	0	0
	Fuel consumption by vehicle fleet (input)	Resource consumption (fuel, indirect CO2) and avoidable exhaust emissions	0	0	0	0	0
	Water Consumption (Input)	Resource consumption (water)	0	0	0	0	0
	Noise and Noise (Output)	Noise emissions, e.g. traffic noise, printer noise, noise from conversations in open-plan offices	0	0	0	0	0
Both locations: Operation of IT equipment (PCs, monitors, printers,	Power consumption (input) for IT equipment	Resource consumption (electricity, indirect CO2)	0	0	5	5	5

Site and environmental activities	Input / Output	Environmental Impact / Environmental Impact	Evaluation (criteria below)				
			Binding Commitments	Severity of exposure	Interested Parties	Ability to be influenced	Economic aspects
servers, data backups, etc.)	Waste from e-waste (input)	Avoidable waste emissions from e-waste and possible pollutants	0	0	0	0	0
Logistics location: Activity: Logistics processes (delivery of merchandise, storage and shipping)	Power consumption (input) without IT equipment	Resource consumption (electricity, indirect CO2)	0	5	0	5	5
	Heat Consumption (Input)	Resource consumption (gas, indirect CO2)	0	5	0	5	5
	Water Consumption (Input)	Resource consumption (water)	0	0	0	0	0
	Fuel consumption due to incoming and outgoing transport (input)	Inbound: Resource consumption during transport: Long transport routes by air or sea freight (indirect environmental aspect)	5	5	5	5	5
	Waste and extinguishing water (output)	Possible soil contamination	0	0	0	0	0
	General waste generation (output)	Negative environmental impact due to high waste generation or inadequate separation	5	5	0	5	5
	Waste generated by packaging (output)	Resource consumption: High output of packaging materials and fillers	5	5	5	5	5
	Noise (Output)	Noise emissions, e.g. traffic noise, noise from machinery and equipment	0	0	0	0	0
Logistics location: Operation of a system for dispatch automation (QUBY)	General Power Consumption (Input)	Avoidable consumption of resources (electricity)	0	5	5	5	5
	Compressed air through compressors (output)	Avoidable consumption of resources (electricity)	0	0	0	5	5
Logistics location: Operation of a shelving system (mezzanine)	Power consumption by lighting (input)	Avoidable consumption of resources (electricity)	0	5	5	5	5






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Evaluation criteria:

1 - Compliance with binding obligations			
10 - High Priority	5 - medium priority	0 - low priority	
Legal and other obligations are not complied with, criminal relevance	Legal and other obligations are not complied with , legal consequences possible according to administrative offence law	Legal and other obligations are complied with or there is no obligation to the environmental aspect	
Measures are imperative		no need for action	
2 - Severity of environmental effects			
IN/OUT	10 - High Priority	5 - medium priority	0 - low priority
Electricity in general	No monitoring of electricity consumption, no measures defined for potential savings	Monitoring of electricity consumption is sporadic and not sector-oriented, the search for potential savings follows exclusively economic considerations	Electricity consumption is monitored systematically and in a sector-oriented manner, potential savings are regularly searched for and improvement measures are developed
Electricity for lighting	Little or no LED lighting	Lighting switched to LED by >40%	Lighting switched to LED by >80%
Power for IT equipment	All IT equipment that is not in use will run in "standby mode" and will not be switched off. However, the indirect environmental impact is relevant.	Approximately 50% of the IT devices that are not used are running in "standby mode" and are not switched off. However, the indirect environmental impact is relevant.	Automatic shutdown of unused IT equipment. The IT devices at the workstations are switched off at the end of the shift, e.g. by means of power strips that can be switched off.
Heat in general	Heating is not controlled or only sporadically, no monitoring of heat consumption, no measures for savings potentials are defined	Heating is controlled manually, heat consumption is monitored sporadically, and the search for potential savings is based exclusively on economic considerations	Heating is controlled according to demand and area, heat consumption is monitored systematically, potential savings are regularly searched for and improvement measures are developed
Fuel for vehicle fleet	There is no discernible management of the vehicle fleet, no examination of alternative drive and traffic concepts, existing vehicles with combustion engines meet the legally permissible emission standards, and CO2 emissions are not determined.	The management of the vehicle fleet is manual but systematic, alternative drive and traffic concepts are only sporadically tested, existing vehicles with combustion engines are state-of-the-art and meet the legally permissible emission standards, CO2 emissions are determined sporadically.	There are professional tools for managing the vehicle fleet, alternative drive and traffic concepts are systematically tested and, if necessary, implemented, existing vehicles with combustion engines are state-of-the-art and meet the latest emission standards, CO2 emissions are systematically determined.
Fuel for transport	CO2 emissions are not determined, transport alternatives are not used, alternative delivery concepts do not play a role	CO2 emissions are determined sporadically, the search for transport alternatives is based exclusively on economic considerations, alternative delivery concepts are not strategically planned	CO2 emissions are regularly determined, transport alternatives are regularly sought, and strategic projects on alternative delivery concepts are initiated
Waste in general	Waste storage areas are not suitable. Storage of waste bins on unpaved ground. Leaks and overfilling lead to contamination of soil and groundwater with pollutants. No documented inspections by the waste management officer.	Waste storage sites are suitable to a limited extent. Storage of waste bins on paved ground with "bone stones", i.e. not liquid-tight. Leaks and overfills are visible. Soil contamination with pollutants cannot be ruled out.	Suitable for waste storage areas. Even in the event of a leak, no penetration of pollutants into the soil is possible. Stringent checks by the waste management officer can be demonstrated.
IN/OUT	10 - High Priority	5 - medium priority	0 - low priority

E-waste waste	Generated >5% of total waste. Disposal measure is not suitable. Transportation to African countries plus improper recycling with significant emissions into the environment.	Between 5% and 2% of total waste Disposal measure in Germany is not suitable. Improper recycling with significant emissions into the environment.	Generated <2% of total waste Disposal measure is suitable. Recycling is carried out professionally according to "state of the art" with responsible emissions into the environment.
Waste from packaging	The shipping of products and waste results in avoidable environmental impacts (e.g. loss of resources for packaging materials, pollutant inputs into the environment, exhaust emissions from means of transport or unfavourable transport routes)	The shipping of products and waste results in environmental impacts that can be reduced due to process optimizations.	The shipment of products and waste does not result in any negative environmental impact.
Noise	very high noise level with consequential health damage (physical and psychological) with the need for immediate remedy	intermittent high noise levels with the need for a medium-term remedy or appropriate protective measures	Noise level in the normal range without permanent impairment
Water	Very high water consumption	Above-average water consumption	Average water consumption in normal household quantities
Se-wage	High risk of soil contamination by extinguishing/dirty water	Average risk of soil contamination by extinguishing/dirty water	No risk of soil contamination by extinguishing/dirty water
Compressed air	There are no studies on alternative types of energy or process optimisation (e.g. local pressure boosting units) and their energy balance. Leaks often occur in the network. Internal friction losses are not assessed. The available pressure levels are not evaluated for obviousness. There is no "consumption data" on the subject of compressed air. The correlated electricity consumption is high, and the indirect environmental impacts are relevant (e.g. CO2 emissions).	There are no studies on alternative types of energy or process optimisation and their energy balance. Occasional leaks occur in the network. Internal friction losses are assessed, but unavoidable or their optimization would result in high costs. The available pressure levels are evaluated for obviousness. There is no "consumption data" on the subject of compressed air. The correlated electricity consumption is high, and the indirect environmental impacts are relevant (e.g. CO2 emissions).	There are studies on alternative types of energy or process optimisation and their energy balance. There are no leaks in the network. Internal friction losses are evaluated and unavoidable, or their optimization would result in high costs. The available pressure levels are evaluated for obviousness. The "consumption data" on the subject of compressed air are measured and documented for each plant or area.
Measures are imperative		Check if action is needed	no need for action
3 - Interested parties			
10 - High Priority		5 - medium priority	0 - low priority
e.g. critical neighbours who have already submitted complaints or authorities who have sent environmental notices in the last year		e.g. enquiries from banks on environmental issues in the context of lending. Enquiries from stakeholders on environmental issues. Customer enquiries about the substance contents of products, etc.	e.g. employee questions about environmental issues - without any indication of environmental problems at the site. External enquiries on general environmental issues
Measures are imperative		Check if action is needed	no need for action
4 - Suggestibility			
10 - High Priority		5 - medium priority	0 - low priority
Very good influenceability in the sense of a short-term (within 1 year) achievable goal		Very good influenceability in the sense of a medium-term (within 2 years) achievable goal	Without further research, no goal formulations possible / recognizable
It is imperative to formulate goals that can be achieved in the short term		Check whether goals are useful or necessary	no goal formulation possible
5 - Economic aspects			
10 - High Priority		5 - medium priority	0 - low priority
Savings possible immediately or amortization of measures within 2 years		Savings possible within the next year or payback within 4 years	No direct savings possible or amortization > 5 years
Measures are imperative		Check if action is needed	no need for action

Appendix 2 – Assessment of 2023 key figures

En-viron-mental aspect	#	Ratio	IS 2021	IS 2022	IS 2023	TARGET 2024	Rating 2023
Waste	1	Waste quota per shipment <i>xx kg / shipment</i>	0.16 kg / shipment	0.11 kg / shipment	0.15 kg / shipment	< 0.15 kg/shipment	 <p>Slightly increased waste generation with a reduction in shipments due to better consolidation.</p>
Waste	2	Separate collection rate <i>xx % of separately collected fractions</i>	49.1% / 100% waste	63.2% / 100% waste	81.5% / 100% waste	> 80% / 100% waste	 <p>Significantly increased separation collection rate due to improved and effective waste concept</p>
Energy	3	GHG emissions Scope 2 (purchased electricity, heating energy, fuels) <i>xx g / Euro turnover</i>	2.7 g CO2e/EUR turnover	2.39 g CO2e/EUR sales	2.3 g CO2e/EUR turnover	< 2.0 g CO2e/EUR sales	 <p>Further reduction of CO2 emissions with moderate increase in sales</p>
Traffic	4	GHG Emissions Per Shipment (kg) - In-bound (Scope 3) <i>xx g/Euro Revenue</i>	80 g CO2e/EUR sales	73 g CO2e/EUR turnover	66.0 g CO2e/EUR sales	< 70.0 g CO2e/EUR sales	 <p>Further reduction of CO2 emissions with moderate increase in sales</p>
Traffic	5	GHG emissions per shipment (kg) - Out-bound (Scope 3) <i>xx g / Euro sales</i>		5.0 g CO2e/EUR turnover)	5.0 g CO2e/EUR sales	< 5.0 g CO2e/EUR sales	 <p>Key figure defined, tracking based on the annual reports of the carriers.</p>



Environmental Program with Measures

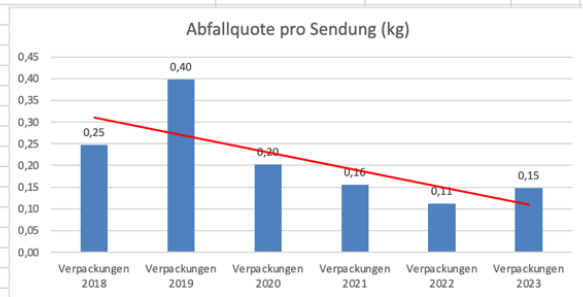
Creation date: 23.02.2024

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Department: QM/EM

Abfallquote bei Verpackungen

Verpackungsart	Gewicht pro Stück (kg)	Verpackungen 2018	in kg	Verpackungen 2019	in kg	Verpackungen 2020	in kg	Verpackungen 2021	in kg	Verpackungen 2022	in kg	Verpackungen 2023	in kg
Kartonagen (kg)	0,3	239.000	71.700	245.000	73.500	250.000	75.000	245.000	73.500	304.228	91.268	257.998	77.399
Versandtaschen (kg)	0,1	137.325	13.733	147.529	14.753	151.438	15.144	147.901	14.790	136.709	13.671	110.142	11.014
Versandetiketten (kg)	0,05	376.325	18.816	392.529	19.626	401.438	20.072	392.901	19.645	440.937	22.047	368.140	18.407
Füllstoffe (qm)	0,08	1.320	106	81.221	6.498	82.054	6.564	82.000	6.560	138.907	11.113	137.932	11.035
Anzahl der Sendungen		376.325		392.529		401.438		392.901		440.937		368.140	
Abfälle gesamt (kg)			93.100		156.560		81.200		60.920		49.330		54.480
Verpackungsquote pro Sendung (kg)			0,28		0,29		0,29		0,29		0,31		0,32
Abfallquote pro Sendung (kg)			0,25		0,40		0,20		0,16		0,11		0,15



Source: [2023 Environmental Program KPI Tracking.xlsx](#)



Environmental Program with Measures

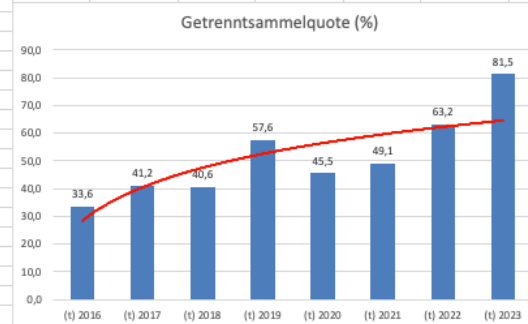
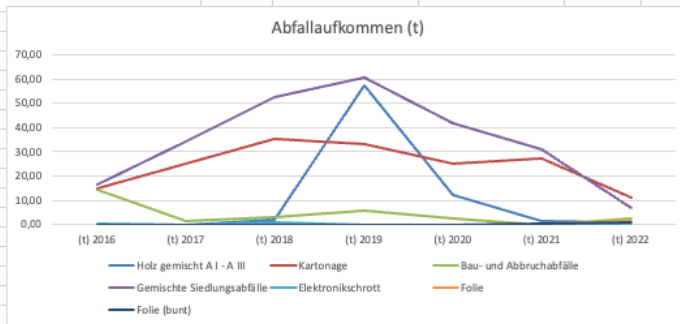
Creation date: 23.02.2024

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Department: QM/EM

Abfallbilanz und Trennquote

Abfallart	AVV	Erklärung	Zeroboard-Faktor	t) 2016	t (CO ₂ e) 2016	t) 2017	t (CO ₂ e) 2017	t) 2018	t (CO ₂ e) 2018	t) 2019	t (CO ₂ e) 2019	t) 2020	t (CO ₂ e) 2020	t) 2021	t (CO ₂ e) 2021	t) 2022	t (CO ₂ e) 2022	t) 2023	t (CO ₂ e) 2023
Holz gemischt A I - A III	170201	Recycling	0,113	0,00	0,00	0,00	0,00	1,86	0,21	57,14	6,46	11,94	1,35	1,42	0,16	1,50	0,17	2,86	0,32
Kartonage	200101	Recycling	0,131	14,88	1,95	24,98	3,27	35,06	4,59	33,07	4,33	25,00	3,28	27,34	3,58	25,64	3,36	34,84	4,56
Bau- und Abbruchabfälle	170904	Vorbehandlung	0,011	14,24	0,16	1,64	0,02	2,78	0,03	5,78	0,06	2,42	0,03	0,00	0,00	3,94	0,04	0,90	0,01
Gemischte Siedlungsabfälle	200301	Vorbehandlung	0	16,21	0,00	34,05	0,00	52,48	0,00	60,57	0,00	41,76	0,00	31,01	0,00	14,19	0,00	9,19	0,00
Elektronikschrott	160214	Recycling	0	0,54	0,00	0,00	0,00	0,92	0,00	0,00	0,00	0,00	0,00	0,26	0,00	0,00	0,00	0,00	0,00
Folie	150102	Recycling	0,821	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,59	0,48	1,97	1,62	4,46	3,66
Folie (bunt)	150102	Recycling	0,821	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,30	0,25	1,43	1,17	1,74	1,43
Folie (transparent)	150102	Recycling	0,821	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,66	0,54	0,49	0,40
		Vorbehandlung		30,45		35,69		55,26		66,35		44,18		31,01		18,13		10,09	
		Recycling		15,42		24,98		37,84		90,21		36,94		29,91		31,20		44,39	
		Vorbearbeitungsquote:		66,4		58,8		59,4		42,4		54,5		50,9		36,8		18,5	
		Getrennsammelquote:		33,6		41,2		40,6		57,6		45,5		49,1		63,2		81,5	
		Emissionen (t CO₂e):			0,0		0,0		0,0		0,0		0,0		0,0		0,0		0,0



Source: [2023 Environmental Program KPI Tracking.xlsx](#)



Environmental Program with Measures

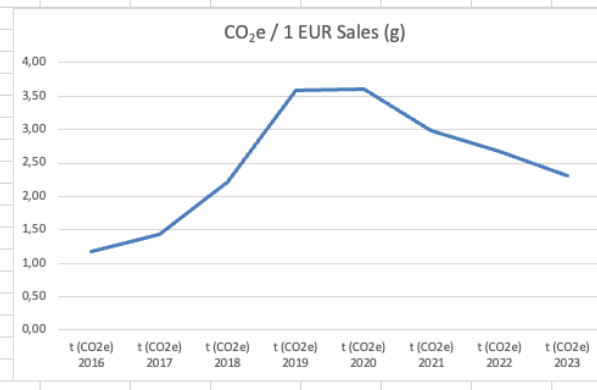
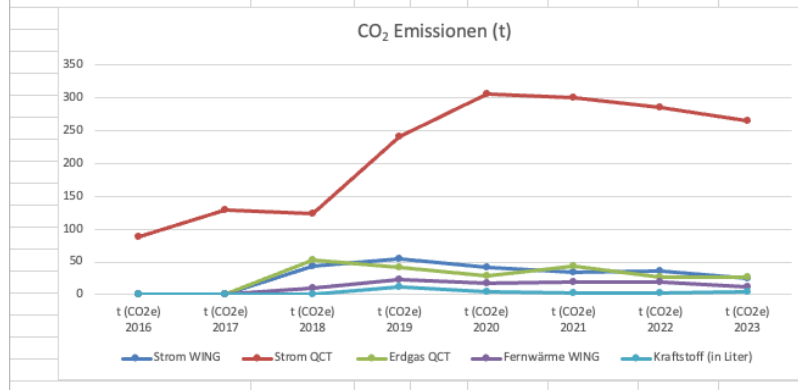
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THG Emissionen (Scope 1/2)

Verbraucher	(t/MWh o. TKM)	Conv. Factor	Einheit	(kWh/ltr) 2016	t (CO ₂ e) 2016	(kWh/ltr) 2017	t (CO ₂ e) 2017	(kWh/ltr) 2018	t (CO ₂ e) 2018	(kWh/ltr) 2019	t (CO ₂ e) 2019	(kWh/ltr) 2020	t (CO ₂ e) 2020	(kWh/ltr) 2021	t (CO ₂ e) 2021	(kWh/ltr) 2022	t (CO ₂ e) 2022	(kWh/ltr) 2023	t (CO ₂ e) 2023
Strom WING	0,433	1000	kWh	0	0	0	0	99.602	43	124.763	54	96.432	42	78.076	34	83.193	36	57.622	25
Strom QCT	0,433	1000	kWh	203.404	88	296.348	128	283.876	123	557.108	241	708.168	307	694.623	301	661.057	286	611.119	265
Erdgas QCT	0,234026667	100	m ³	0	0	0	0	22.824	53	17.844	42	12.289	29	18.808	44	11.634	27	11.670	27
Fernwärme WING	0,2052	1000	kWh	0	0	0	0	52.608	11	110.100	23	86.076	18	97.885	20	91.740	19	57.882	12
Kraftstoff (in Liter)	0,258496333	100	ltr	0	0	0	0	0	0	4.887	13	1.632	4	1.210	3	693	2	1.418	4
CO₂e Emissionen gesamt (t):					88		128		230		372		399		402		370		332
CO₂e / 1 EUR Sales (g)					1,17		1,42		2,22		3,59		3,61		2,98		2,68		2,30

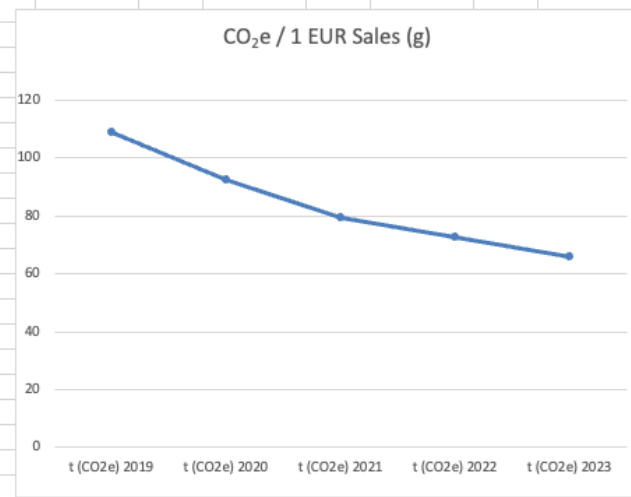
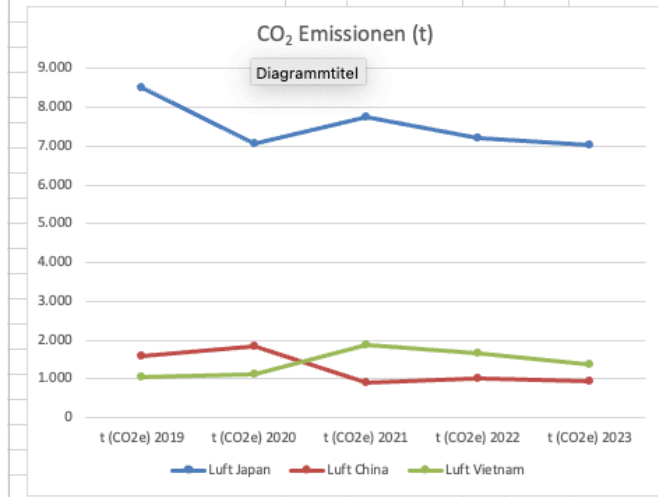


Microsoft Office User:
entspricht 11.895 kWh (1211:7,4 ltr/100km=163,64*72,69 kWh (Referenzwert für Diesel pro 100 km) = 11.895 kWh)

Source: [2023 Environmental Program KPI Tracking.xlsx](#)

THG Emissionen (Scope 3 - Inbound Transport)

Inbound Transport	km	kg/TKM o. TEU	G _w	(t) 2019	t (CO ₂ e) 2019	(t) 2020	t (CO ₂ e) 2020	(t) 2021	t (CO ₂ e) 2021	(t) 2022	t (CO ₂ e) 2022	(t) 2023	t (CO ₂ e) 2023
Luft Japan	9456	0,264824	3,9	875	8.498	729	7.079	800	7.769	741	7.197	723	7.029
Luft China	8953	0,262812	3,9	175	1.597	204	1.859	101	925	111	1.016	105	961
Luft Vietnam	9752	0,266008	3,9	105	1.053	113	1.138	188	1.892	167	1.679	136	1.370
Luft Taiwan	9460	0,26484	3,9	6	58	5	45	7	63	6	59	6	59
Luft Korea	8639	0,261556	3,9	2	19	2	16	1	11	2	21	8	73
Luft Türkei	1934	0,275244	3,9	6	12	11	22	9	19	9	19	4	7
Luft USA	7066	0,256665	3,9	2	16	2	14	2	13	2	13	2	15
See Japan	20775	0,0044	3,4	73	23	84	26	62	19	46	14	61	19
See China	19408	0,0044	3,4	19	6	2	1	18	5	16	5	2	1
Straße Türkei	1867	0,023	3,2	16	2	69	10	34	5	22	3	1	0
gesamt (t):				1.279	11.282	1.219	10.211	1.221	10.723	1.123	10.028	1.048	9.534
CO₂e / 1 EUR Sales (g)					109		92		80		73		66
CO₂e / Shipment (kg)					28,74		25,44		27,29		22,74		21,62



Source: [2023 Environmental Program KPI Tracking.xlsx](#)




Environmental Program with Measures

Creation date: 23.02.2024
 Updated on:
 Department: QM/EM

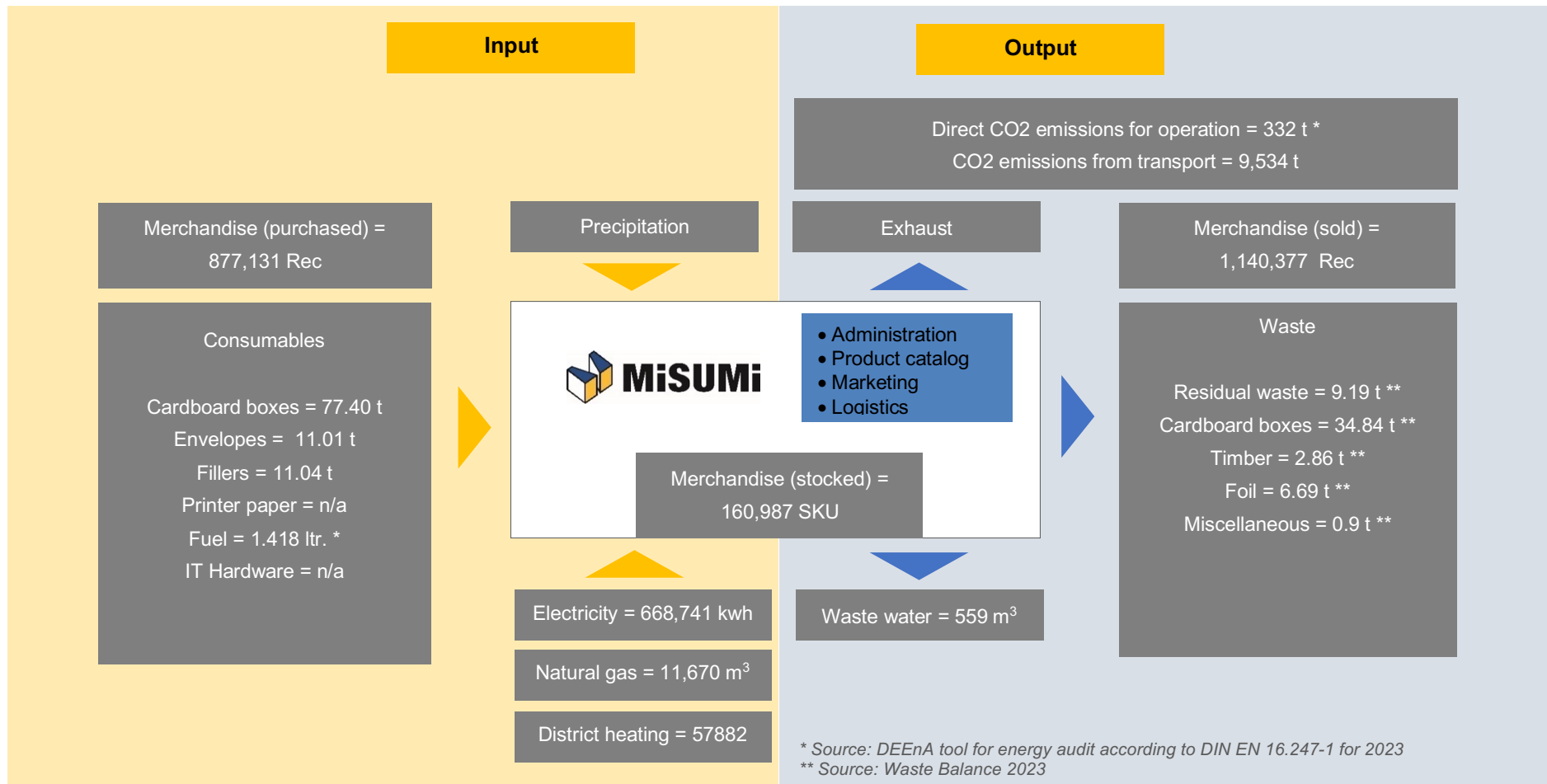
THG Emissionen (Scope 3 - Outbound Transport)						
Outbound Transport	Shipments 2022	(t) 2022	t (CO₂e) 2022	Shipments 2023	(t) 2023	t (CO₂e) 2023
GLS (Domestic - DE)	167.707	680	132	167.946		132
GLS (Export)	21.600	88	44	681		1
TNT / Fedex (Domestic - DE)	1.529	33	11	1.647	35	12
TNT / Fedex (Export)	178.352	723	506	196.757	793	519
Gesamt:	369.188	1.524	693	367.031	828	665
CO₂e / 1 EUR Sales (g)			5			5
CO₂e / Shipment (kg)			1,88			1,81


Source: [2023 Environmental Program KPI Tracking.xlsx](#)

	Environmental Program with Measures	Creation date: 23.02.2024
		Updated on:
		Department: QM/EM







Appendix 3 – Presentation of material flows in 2023

The following overview contains the qualitative and quantitative input-output presentation of the material flows in relation to the 2023 financial year.










	Environmental Program with Measures	Creation date: 23.02.2024
		Updated on:
		Department: QM/EM

Annex 4 – Evaluation of the 2023 measures

#	Location	Environmental aspect	Description	Appointment	Responsible	Status	Assessment
1	Logistics	Waste	Improving the monitoring of packaging inventories	31.12.23	Logistics	Work in progress	 Packaging inventories are recorded and monitored via the LSF system.
2	Logistics	Waste	Inclusion of environmental criteria in the selection of packaging and packaging aids	31.12.23	Logistics	Work in progress	 Cardboard boxes, mailing bags and filling paper are FSC-certified or bear the "Blue Angel". Will be continued in 2024 for further aids.
3	Logistics	Waste	Guidance for employees on waste prevention and separation (+ on-site instruction)	31.12.23	QM/EM	Work in progress	 All topics will be brought together, and a comprehensive guide will be created. To be continued in 2024.
4	Logistics	Waste	Reuse of delivered cartons for consignments	31.03.23	Logistics	Work in progress	 Will be made individually. There is a special storage area for this. However, it cannot be measured in a meaningful way, and the measure will not be continued.
5	Logistics	Waste	Waste separation for recreation and office areas	30.06.23	Logistics	Work in progress	 In all recreation and office areas, waste is separated into packaging, paper and residual waste.
6	Logistics	Energy	Control of the lighting in the shelving system (mezzanine)	31.12.23	Logistics	Work in progress	 To be continued in 2024

#	Location	Environmental aspect	Description	Appointment	Responsible	Status	Assessment
7	Logistics	Energy	Switching the exterior lighting on the building to LED	31.12.23	Logistics	Work in progress	→ Landlord must be involved. To be continued in 2024.
8	Logistics	Energy	Energy-saving guidelines for employees (+ on-site instruction)	31.03.23	QM/EM	Work in progress	→ All topics will be brought together and a comprehensive guide will be created. To be continued in 2024.
9	Logistics	Energy	Automatic shutdown of the workstations at the QUBY	31.12.23	Logistics	Work in progress	→ Measure could not be completed. To be continued in 2024
10	Logistics	Energy	Changing the lighting of the canteen/sanitary rooms to LED	31.12.23	Logistics	Work in progress	↑ All common areas as well as the sanitary rooms have been converted to LED lighting.
11	Logistics	Energy	Conversion of the QUBY electricity supply contract to green electricity	31.01.23	QM/EM	done	↑ Electricity contracts have been converted for the CUBY, Unit 1 and Unit 2 divisions.
12	Logistics	Energy	New recording of all consumers as well as cross-sectional technologies as part of the energy audit preparation	30.06.23	QM/EM	Work in progress	→ To be continued as part of the planning of the 2024 energy audit.
13	Logistics	Energy	Use of the installed photovoltaic system for a proportion of electricity feed-in	31.12.23	QM/EM	Work in progress	→ The plant could not be connected to the grid in 2023 for technical reasons. To be continued in 2024.

#	Location	Environmental aspect	Description	Appointment	Responsible	Status	Assessment
14	Logistics	Traffic	Audit of all outbound suppliers regarding CO2-neutral shipping or emissions reporting	30.06.23	QM/EM	Work in progress	 Since 2023, outbound suppliers have been providing regular reports on the basis of which emissions can be recorded.
15	Logistics	Traffic	Regular monitoring of the emission data of the inbound transporters	30.06.23	QM/EM	Work in progress	 Air and sea transports will be recorded, and road transport will be gradually included in sustainability reporting from 2024.
16	Administration	Traffic	Evaluation of European suppliers considering sustainability criteria	31.07.23	QM/EM	Work in progress	 Complex requirements by the CSDDD, will be continued in 2024.
17	Administration	Energy	Information on energy saving for all employees (e.g. e-mail, office guide, info screens)	30.04.23	QM/EM	Work in progress	 All topics will be brought together, and a comprehensive guide will be created. To be continued in 2024.
18	Administration	Energy	Check switching times of the lighting in the office so that they are reduced or adjusted	28.02.23	QM/EM	done	 Switching times were checked. Current setting: 15 min. Possible conversion to 5 min was examined, but discarded.
19	Administration	Energy	Check if radiators can be equipped with smart thermostats	31.03.23	QM/EM	Work in progress	 There is no permission from the landlord.
20	Administration	Energy	Check whether all workstations can be equipped with switchable power strips	31.03.23	QM/EM	done	 Switchable power strips are not possible, as the workstations are permanently wired in the floor tanks.