

UPDATE

COMPANY MAGAZINE

Special issue



PICKING & SORTING

Manual to fully automated solutions

LOGISTICS SOFTWARE

WAMAS® and SAP used as stand-alone solution or integrated into a logistics system

GREEN THOUGHTS

Resource-friendly products, concepts and services

IDEAS, VISIONS & SOLUTIONS FOR INTRALOGISTICS

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Think Tomorrow.

SSI SCHÄFER

LET'S TALK ABOUT YOUR LOGISTICS SOLUTIONS: WELCOME TO SSI SCHÄFER.

Think Tomorrow.



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TOGETHER!**

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Dear readers

Sustainable intralogistics becomes more and more a component of future-oriented logistics. In the spirit of *Think Tomorrow.*, our presence at this year's LogiMAT is climate-neutral, certified by the Plant-for-the-Planet initiative. Appropriately, we show you our approach to Green Logistics in a separate area.

How may we support you in pursuing your goals and in solving your intralogistics questions? Let's talk. We look forward to a personal exchange with you, our customers and interested companies, from medium-sized to large enterprises. Based on our broad portfolio, together we develop the right solution for you to give you a decisive competitive advantage in the future.

With the exhibits and showcases, we focus on our manual to fully automated picking and sorting solutions. We demonstrate a highly dynamic robotics solution for efficient piece picking with our partner fpt and show customized packaging within automated handling. Considering the ongoing e-commerce boom, the modular pouch sorter system SSI Carrier is one of our exhibits, which also convinces with energy-efficient on-demand shut-off and passive drives.

Futurelab: 100% error-free order picking with LOGI-SAFEPICK* within SSI LOGIMAT® vertical storage lift is another topic we address as we combine the process with the SALLY automated guided vehicle (AGV) from our partner DS AUTOMOTION. Also, in the showcase for large load carriers, we take up the future-oriented area of AGVs: AMADEUS from DS AUTOMOTION in connection with a mobile racking system and the SSI Orbiter for standard concepts of the individual kind.

*coming soon



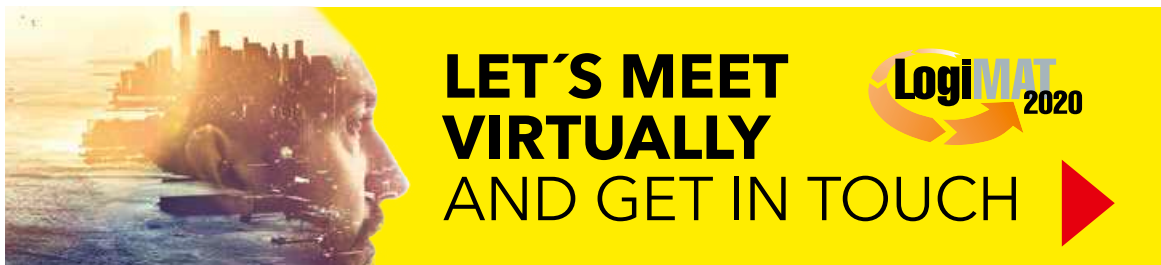
In addition, we focus on our software portfolio, which covers all processes from warehouse to material flow management with WAMAS® and SAP. Tailored to individual requirements, the solutions can be used for both manual and automatic systems, for large and medium-sized businesses. The logistics software is available as a stand-alone solution or integrated into an overall solution, depending on the customer's requirements.

We look forward to talking to you soon and wish you an interesting virtual trade fair experience.

Yours sincerely

A handwritten signature in blue ink, appearing to read 'Bruno Krauss', written in a cursive style.

Bruno Krauss
CFO SSI Schäfer Group





INTELLIGENT PICKING WITH ROBOTICS SEAMLESSLY INTEGRATED AND DRIVEN BY WAMAS® SOFTWARE MODULES

[Learn more](#) 

State-of-the art robotics applications are an integral component of modern and economic logistics 4.0 solutions. SSI Schaefer offers one of the widest robotics portfolios for different fields of application on the market that can be tailored to individual industry requirements.

Automated piece picking is becoming increasingly important. SSI Schaefer offers standardized piece picking applications, combining robotics with a wide variety of conveying systems to create intelligent overall systems. These solutions cover the requirements of a broad range of different order structures and can be employed for common picking tasks across many industries. The application,

developed in collaboration between SSI Schaefer and robot specialists fpt, facilitates efficient piece picking and can be used in e-commerce, healthcare & cosmetics or e-grocery applications. The high-performance piece pick robots can be integrated seamlessly into holistic logistics systems.

WAMAS software modules revolutionize robot-supported picking

The modules of the SSI Schaefer logistics software WAMAS make robots more intelligent and fit holistic logistics applications. The central component of robot control is what's called the Robot Material Flow Controller (RMC). This processes the 3D vision data, which it then uses to set the movements of the robots. The modular design of WAMAS enables the creation of customized solutions.

Industrial image processing is one of the key technologies of automation. It can be used to control machines intelligently, automate processes, and verify and check items. Furthermore, corresponding systems check quality criteria and provide valuable data for process optimization. Based on this know-how, SSI Schaefer provides users with the required connections of software, intralogistics hardware and industrial image processing from a single source.

Benefits at a glance:

- Process safety
- Constant performance: independent of product size and weight, working times, ambient conditions or ergonomic requirements
- Low error rate
- Consistent 24/7 performance
- Hardware, software and industrial image processing from a single source

Partner network for robotics applications

In partnership with fpt, the robotics specialist based in Amtzell, Germany, SSI Schaefer offers smart robotics solutions that enable continuous automation of the supply chain and offer high dynamics, superior flexibility and exceptional functional reliability. In addition, SSI Schaefer acquired a majority stake in RO-BER Industrieroboter GmbH in 2016, sustainably strengthening its expertise in the area of gantry robot systems with a focus on de-/palletizing as well as picking and sequencing.



SHOWCASE FOR LARGE LOAD CARRIERS STANDARD CONCEPTS OF THE INDIVIDUAL KIND



Benefits at a glance:

- Modular and scalable combination of individual components for perfect interaction
- Compatibility of new modules with existing solutions
- Easy integration of AGV solutions into modular systems
- Uncomplicated upgrading of manual to partially or fully automatic systems

Modularity is essential in the area of storage and requires appropriately customized solutions – suitable for all customer requirements. How can semi-automated warehouse components be combined with automated guided vehicles (AGVs) to create a storage solution and also increase storage density? Make sure to see SSI Schaefer's solution.

The showcase for large load carriers consists of the AGV AMADEUS from partner DS AUTOMOTION, a mobile racking system and the SSI Orbiter in a static trade show exhibit offering direct insight into the technology. While the standard concepts can be combined in a modular and scalable way, they are also impressive by themselves.

Flexible rack system - SSI Orbiter

In semi-automated applications, the innovative SSI Orbiter in combination with a docking station offers optimal space utilization with maximum flexibility, maximum personal safety, sustainability and ease of use in channel storage. It also significantly increases efficiency in automated pallet handling. The SSI Orbiter consists of the special steel construction for channel storage, the channel vehicle and the associated docking station. Rack channels in which the Orbiter is to be used have a centering console at the front.

High-lift stacker AMADEUS

The AGV from DS AUTOMOTION features a solid mechanical construction, maximum personal safety and allows a perfect combination of all components (software, actuators and sensors). AMADEUS' optimized technology for automated operation and its very compact design make it an uncompromisingly industrial AGV which ensures personal safety.

Mobile racks for pallet and long goods storage

Heavy-duty mobile racking systems from SSI Schaefer are designed to meet the highest requirements for the weight and size of the goods to be stored. Their modular structure also allows for customer-specific solutions. In addition, the combination of mobile racks, the conveying system expertise and powerful electrical drives makes the systems the first choice for use in deep-freeze storage.

SSI CARRIER FOR FLEXIBLE AND SUSTAINABLE E-COMMERCE DISTRIBUTION

Delivery at the desired date, shortest delivery times or deliveries to pick-up points including free returns or easy return in the store - these customer requests increasingly change classic distribution channels. It requires an intelligent, flexible and highly dynamic logistics solution to ensure fast access to the requested goods in the warehouse and immediate availability of returns after they have been checked.

For this purpose, SSI Schaefer offers SSI Carrier, a versatile and scalable overhead conveying system that is perfectly suitable for handling e-commerce and omnichannel distribution. One single load carrier for transport, accumulation, buffering, sorting and sequencing - the SSI Carrier pouch sorter provides all these functions. It also convinces with its sustainability: In addition to increased storage density and permanent availability, the intelligent switch-off on demand and the use of passively driven components ensure a high degree of energy efficiency.

The innovative SSI Carrier system consists of the universal SSI Carrier as load carrier, a circulating and an accumulation conveyor, switches and work stations for loading and unloading the carriers. Standardized components can be combined modularly, variably and economically to form complex systems, which can be extended at any time.

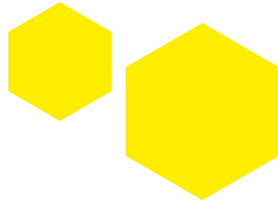
Another advantage: The pouch sorter system enables flexible and gentle transport of hanging goods, flat goods or other products in pouches from the areas fashion, pharmaceuticals, cosmetics, electronics or groceries. Thanks to the dynamic buffer, the system can be used for very economical handling of returns in e-commerce and facilitates store-friendly delivery.

[Learn more](#) ▶

Benefits at a glance:

- High sorting accuracy, load securing and process safety
- User-friendly with simple user interface
- Flexible with optimum use of space
- Pre-picking possible with dynamic buffer
- Everything from one source - development, production, planning, steelwork, tailor-made IT, installation, commissioning and service





FUTURELAB 100% PICKING PRECISION WITH LOGISAF EPICK (COMING SOON)

Ensuring error-free picking is becoming increasingly important. SSI Schaefer has been working together with its strategic partner nexonar to develop an innovation that virtually eliminates errors in picking. LOGISAFEPICK is a system that uses camera technology to track the exact position of the picking hand and a traffic light system to show the employee whether the warehouse processes in the SSI LOGIMAT® vertical lift have been handled correctly.

SHOWCASE

Error-free picking with LOGISAFEPICK

LOGISAFEPICK will be integrated into a customer picking process at the booth. The compact automated guided vehicle system (AGV) SALLY from DS AUTOMOTION provides the goods that are stored in the SSI LOGIMAT by using LOGISAFEPICK and the proven WAMAS® logistics software. The solution is based on strong commitment to fulfill customer needs - in line with *Think Tomorrow*. The compact AGV SALLY is designed for loads of up to approx. 100 kg, flexibly handles different transport tasks and navigates independently through a room by using SLAM technology.

[Learn more](#) 

Software solutions from simple applications to complex warehouse management

The vertical lift module is a small parts storage and picking solution in one and can be operated as an autonomous system or integrated directly into SAP. The quick and easy connection to an existing SAP system through the partner Status C is shown in the virtual exhibition stand. However, the WAMAS® LOGIMAT software can also be used to link to other higher-level ERP systems. The software solution optimizes warehouse and picking processes and offers a scalable path to automation thanks to flexible and simple integration options.

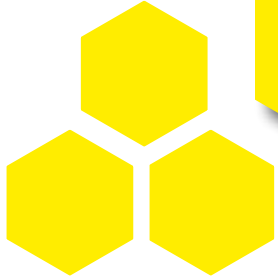
Benefits at a glance:

- Dense storage of goods and items of all kinds stored on trays
- Full utilization of the room height through the goods-to-person principle
- Increased work safety
- Simplified warehouse management thanks to intelligent software solutions



Partner network for AGV technology

A partnership involving an investment in the Austrian AGV specialist DS AUTOMOTION has allowed SSI Schaefer to extend its AGV portfolio. For more than 30 years, DS AUTOMOTION has specialized in the development and production of highly dynamic AGVs and has become one of the world's leading manufacturers in this segment. DS AUTOMOTION's expertise has allowed SSI Schaefer to further expand its AGV-related competence in customer-specific device configurations and enabled the implementation of customized solutions for an exceptionally wide range of sectors from retail & wholesale to food retail, fashion and industry as well as food & beverage. The comprehensive portfolio of services offered by DS AUTOMOTION and SSI Schaefer is complemented by their partner Rocla. The solution expertise consists of the full spectrum of products, from lift trucks to platform AGVs and AGVs for heavy loads or AGVs for the automation of assembly lines.



CUSTOMIZED PACKAGING SUSTAINABLE COMPONENT PROTECTION

Protecting against damage or dirt in the production process and transport is particularly important when handling high-quality and sensitive products. The goal is to avoid rejects - which are associated with additional work and costs and must be repaired or completely disposed of - and to simplify complex processes in a risk-reducing manner. The solution is tailor-made customized packaging, which supports a sustainable - also automated - value chain with a reusable system.

Customized packaging from SSI Schaefer is precisely fit to the contours and special features of the products in thermoforming or injection molding procedures. SSI Schaefer uses machines with the latest technology for process- and cost-optimized manufacturing. In order to adapt the material quality perfectly to the requirements of the components and the process, customized packaging is available in different materials - also in ESD versions.

Benefits at a glance:

- Maximum product protection against external impacts during transport and storage
- Waste reduction through reusable system
- Suitable for manual and automated handling thanks to adaptability
- Stable, stackable and durable

Additional options with the customized system all the way to recycling

In addition to thermoformed load carriers used as inlays in containers, SSI Schaefer also offers solutions with workpiece carriers molded in one piece as well as ready-made inserts. Packaging in special dimensions using the Cut & Weld process are also part of the product offering.

When changing components, plastic workpiece carriers can be recycled directly and processed into pellets. These pellets are used to produce new packaging, saving resources and ensuring an environmentally friendly cycle in the production process.

SHOWCASE

Robot-supported handling of customized packaging

Pre-sorting, separating and defined placing of sensitive components or workpieces in designated workpiece carriers is monotonous work. SSI Schaefer and their partner fpt Robotik present a cost-effective, space-saving and easily integrated solution.

Learn more 



[Learn more](#) 

LOGISTICS SOFTWARE STAND-ALONE OR INTEGRATED INTO HIGH-PERFORMING LOGISTICS SOLUTIONS

In regards to IT, SSI Schaefer presents its software portfolio, covering all processes from warehouse to material flow management with WAMAS® and SAP.

More than 1,100 IT experts from SSI Schaefer are linking cutting-edge software and hardware components to high-performance applications. Regardless of whether manual or automated logistics systems are involved, how large the company or project is, and no matter what the intralogistics landscape looks like - WAMAS and SAP guarantee efficient and tailor-made software solutions.

The future-proof logistics solutions fit seamlessly into existing process landscapes, are infinitely expandable and adapt flexibly to new conditions. SSI Schaefer software solutions control the warehouse processes of leading retailers, global fashion chains, highly specialized

pharmaceutical companies, and much more worldwide. With 1,200 installed systems around the world, 500 customers and 50,000 users, SSI Schaefer is one of the largest software providers and pioneer with innovative software solutions for intralogistics.

Benefits at a glance:

- Software partner for manual, semi- and fully automated warehouses
- Solutions for every size and complexity, whether you are a start-up or a multinational enterprise
- Reliable and stable interactions with actual or future third party systems
- Covering all your logistics processes and material flows
- Offering professional software support throughout the entire life cycle of the warehouse

GREEN THOUGHTS

In logistics too, sustainability is increasingly becoming a decisive criterion for determining whether the offered solutions are future-proof. The “green” approaches of SSI Schaefer in products, concepts and services correspond to the *Think Tomorrow* philosophy, according to which logistics solutions for customers are tailor-made. With its broad portfolio, SSI Schaefer is committed to supporting customers in pursuing their own climate goals in a spirit of partnership and working with them to implement the right solution.

Storage machines & shuttles

In semi- and fully automated logistics environments the following storage machines, among others, ensure optimized performances: The SSI Exyz features energy recovery, the SSI Miniload has integrated energy efficiency software, and the SSI Flexi uses supercapacitors as an energy source.

Container systems

SSI Schaefer plastic containers can be used sustainably in the reusable system, are fully recyclable and can be further processed into regranulate for new containers. Nestable and foldable containers offer efficient space savings of 75 - 80%, while customized packaging protects sensitive products from damage. Steel containers are another robust, recyclable alternative with high load capacity.



Conveying systems

The SSI Schaefer conveying systems convince with drives that meet the requirements of the latest energy efficiency class in combination with intelligent control systems. Requiring as little electrical power as possible is also the primary goal in the mechanics. Stable, wear-resistant systems combined with a needs-optimized design and preventive maintenance reduce the energy demand from the start.

Racking systems

Racking systems made of steel are characterized by a very robust and durable lightweight construction. They are almost completely recyclable, modular and scalable and can be used in various configurations. Ergonomic requirements are also supported. For instance, mobile racking systems offer a higher storage area with the same energy consumption and thus lead to lower CO₂ emissions. By using the SSI Orbiter and durable channel storage systems, a sustainable future can be created.

Ergonomics

SSI Schaefer considers ergonomic work stations, as well as preventative occupational and system safety, to be both an ethical as well as a moral obligation. This subject plays a fundamental role in the development of products and solutions. The sustainably designed work stations and processes promote employee motivation and help prevent unnecessary efforts and movement that results in health issues. This is where the modular picking and handling systems and the ergonomics@work![®] concept come into play.

Logistics software

The SSI Schaefer logistics software portfolio, including WAMAS[®] or SAP, helps to optimize the energy efficiency of warehouse and logistics centers. Sustainable storage strategies result in shorter distances and higher throughput. Software automated reconfiguration of warehouse operations ensures reduced energy consumption. In returns handling, WAMAS enables transparent tracking of returned goods and reduces the effort to reintegrate them. Predictive maintenance promises to conserve resources by avoiding premature replacement of components.



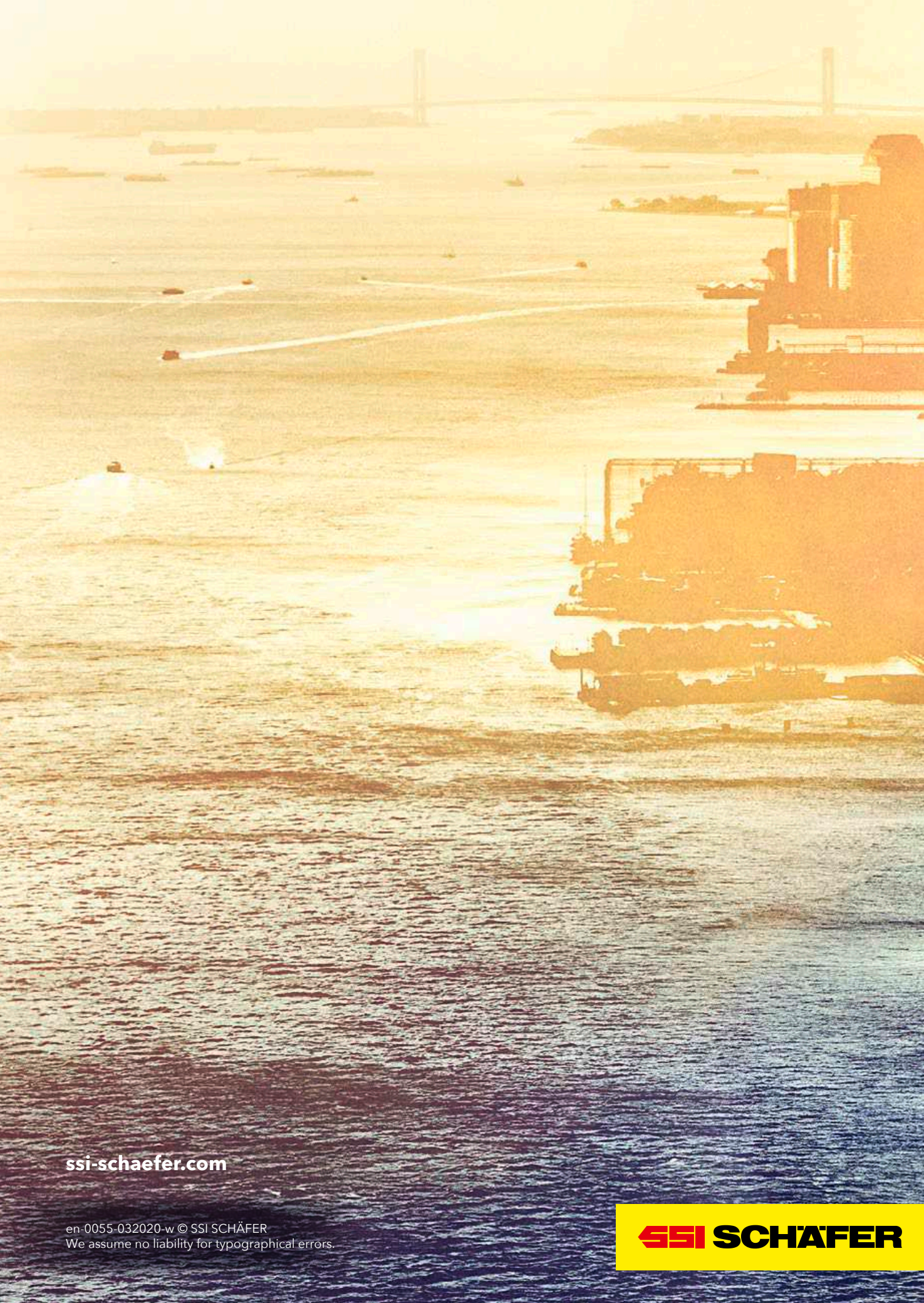
Customer Service & Support (CSS)

In CSS, SSI Schaefer translates the topic of sustainability by applying activities aimed at conserving resources, increasing energy efficiency and lowering CO₂ emissions. With these initiatives, innovative approaches are deployed with a wide portfolio of services. State-of-the-art technologies are of great importance. Especially services such as Predictive Maintenance, the SSI Schaefer Computerized Maintenance Management System (CMMS), SSI Augmented Support, and retrofitting play a major role.

Green Building

Climate-neutral and economical use of energy can already be taken into account when planning a new logistics building. The SSI Schaefer services include not only green products, but also range from energy consulting and planning, certification and monitoring, and subsidy consulting.

Learn more 



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