

CASE HISTORY ECORNATURASÌ

Bologna - Italy

Grocery



The Company

EcorNaturaSì is Italy's leading operator in the distribution of organic and biodynamic products, serving as a benchmark for the national organic supply chain. Born from the integration of Ecor, the first wholesale distributor in the specialized sector, and NaturaSì, the leading network of organic supermarkets, the company has built an industrial model that directly connects **agricultural production, logistics platforms, and the distribution network**, ensuring consistency and continuity throughout the supply chain.



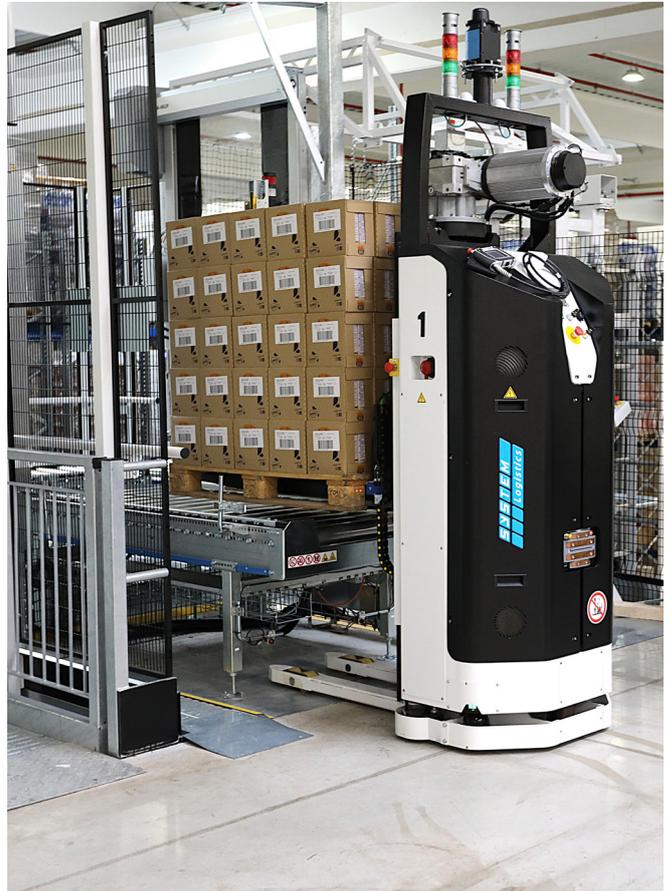
The Logistics Group manages around 12,000 SKUs, handles over 24.5 million packages annually, and serves 7,800 customers nationwide, with a network of 250 stores and a logistics infrastructure spread across Veneto and Emilia. Among its strategic sites, the **distribution center in Bologna - a 49,000 m² facility** - is the heart of the Group's operations. It was here, in 2016, that the first automated system by **System Logistics** was installed, marking the beginning of a collaboration focused on efficiency, sustainability, and the growth of the distribution network.



The Project

The evolution of the business and operations led to the need to expand the existing automated system, aiming to increase the percentage of packages handled automatically in the General Merchandise area, from 25-27% to 43-45%. The priority was to ensure operational continuity, scalability, and reliability, while optimizing space utilization and enhancing the overall quality of the environment and working methods for distribution center operators.

EcorNaturaSi chose System Logistics to develop a solution capable of supporting growth, expanding the assortment managed through automation, and introducing next-generation technology, designed to offer scalability and applicability across various product categories. The project represents a strategic step toward a more high-performing and flexible logistics system, fully integrated into business processes and geared toward sustainable business evolution.



The Solution: PickMate Compact

System Logistics implemented an evolutionary integration of the existing system by introducing the PickMate Compact module, a robotic technology that combines advanced automation, AGV Light vehicles, and the Systore management software to ensure process continuity, precision, and productivity.

Two AGV Light vehicles move source pallets along the feeding lines, ensuring a constant material flow to four anthropomorphic robots equipped with artificial vision and interchangeable grippers.

The robots identify the packages, pick them from the source pallets, and place them on a motorized conveyor belt leading to the automatic palletizing station. The process is managed by Systore, System Logistics' proprietary WMS, which sequences the packages by priority and routes them to the synchronizer and palletizing island. The Best-Fit algorithm calculates the optimal arrangement of packages on each mixed pallet, considering weight, stability, and height, ensuring balance and safety at every stage.

The system handles up to 150 pallet positions for picking and has enabled the utilization of a previously unused elevated warehouse area, now fully integrated into automated flows thanks to a pallet elevator connecting the ground floor to the upper floor.

The PickMate Compact solution stands out for its reliability, simple construction, and low maintenance, ensuring a sequenced and continuous flow from source pallet to finished order. Its scalability allows the system to be extended to other areas and product categories, strengthening EcorNaturaSi's path toward an increasingly integrated, efficient, and sustainable supply chain.

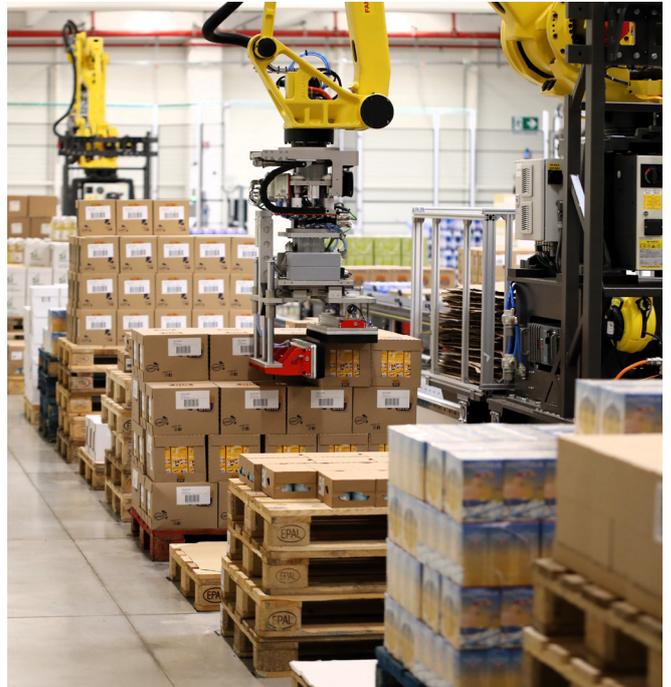
Results and Benefits

The system expansion has led to a substantial evolution in operations, with measurable effects on **productivity, service quality, and process sustainability**.

The **utilization of the elevated warehouse area** has increased operational capacity and improved volume usage, allowing the integration of new technologies and processes without compromising flexibility. The result is a more efficient and scalable system, capable of adapting to the Group's growth needs.

The project has also reinforced the **human-centric** approach that guides **System Logistics'** design philosophy, reducing workers' exposure to strenuous tasks - such as heavy lifting or working in cold areas - and improving the ergonomics of picking and palletizing stations.

From an industrial perspective, the system now **allows for automated management** of up to **400-500 additional SKUs**, ensuring flexibility in handling rotations and new product introductions. The increase in **automation productivity**, measurable in packages/day and operating hours, is accompanied by **improved service quality**, with more stable roll containers, better-balanced weights, and a **significant reduction in grouping errors**.



The **greater integration between traditional and automated activities**, achieved through a unified flow with the order flow area, has reduced waiting times between automatic and manual phases and optimized roll container usage at the packing station.

The expansion of the automated system has strengthened **EcorNaturaSi's supply chain**, making it more consistent, streamlined, and efficiency-oriented in the long term. Thanks to **PickMate Compact** technology, the Bologna distribution center is now a benchmark for integrated and scalable **automation, combining technological innovation** and human centrality to support the Group's competitiveness and growth.

Technical Highlights

- › **2 pallet feeding lines**
- › **4 anthropomorphic robots** with interchangeable grippers and next-gen vision systems based on AI algorithms
- › **2 dedicated AGVs** for pallet movement in the PickMate area
- › **1 pallet elevator** for transfer between P0 and P1
- › **150 pallet positions** for picking
- › **Management software:** Systore (WMS)

