

casemagiQ®



Universal Case Forming System

Case Forming.
Plug & Play.



reddot winner 2024



Any Robot | Any Case

IMPACT

ROBOTICS





casemagiQ

casemagiQ is a modular, universal case forming system designed to standardize how cartons are picked, formed, and prepared for packaging.

It combines end-of-arm tooling, stations, and supporting accessories into a structured workflow that reduces engineering effort and makes automation easier to deploy and repeat.

The system is designed to work across different robot types and applications, allowing you to build reliable case forming setups without starting from scratch each time.

casemagiQ CM100

CM100 is a universal case forming EOAT designed for larger carton formats and applications requiring higher flexibility.

It automates the case forming process by transforming flat cartons into fully erected cases, addressing a critical step in packaging operations.

Unlike traditional end-of-arm tooling, which requires custom design and integration, CM100 is delivered as a ready-to-use solution, reducing engineering effort and simplifying deployment.

CM100 supports cartons from 225 × 175 × 175 mm up to 500 × 400 × 400 mm.

casemagiQ CM50

CM50 is a universal case forming EOAT optimized for smaller carton formats. It performs the same case forming process, using an integrated pneumatic design and communication logic.

Its compact design makes it suitable for applications with limited space, while still reducing the need for custom EOAT design and integration.

CM50 supports cartons from 200 × 125 × 125 mm up to 300 × 300 × 300 mm.

Value Proposition

casemagiQ CM100 and CM50 offer a streamlined and efficient solution for case forming by eliminating the complexity associated with custom-designed end-of-arm tooling.

Traditionally, designing and assembling case forming tooling requires coordination between mechanical and electrical design, sourcing multiple components, and managing procurement, assembly, and integration. This process increases engineering time and introduces variability from one project to the next.

CM100 and CM50 replace this approach with a plug-and-play solution in which key functions are already integrated into a single tool. This reduces engineering effort, simplifies integration at the robot, and enables faster and more predictable deployment.

Advantages

casemagiQ CM100 and CM50 provide several advantages over traditional end-of-arm tooling.

Their lightweight and compact design, combined with integrated pneumatic logic, reduces complexity and eliminates the need for multiple tubes and components. This simplifies installation, maintenance, and adaptation to different case sizes.

In addition, simplified communication with robot controllers enhances usability, making them suitable for companies looking to automate packaging processes with minimal technical overhead.

Applications

The versatility and ease of use of casemagiQ CM100 and CM50 make them suitable for a wide range of applications where efficient and reliable case erection is required.

From manufacturing and distribution to retail and e-commerce fulfillment operations, they help improve productivity and operational efficiency.

Their ability to handle different carton sizes with minimal setup changes allows businesses to adapt to changing packaging needs while reducing downtime.

magic with cases.
casemagiQ®



Plug & Play Approach

Plug & Play design ensures immediate integration and operation with existing robotic systems, dramatically reducing setup time and allowing for instant productivity gains.

Optimized Mechanical Form Factor

The compact size, light weight and sleek design of casemagiQ allows it to be seamlessly installed on the robotic arm. The extendable arm & flap folding speed controller allows for quick changeover for different sizes.

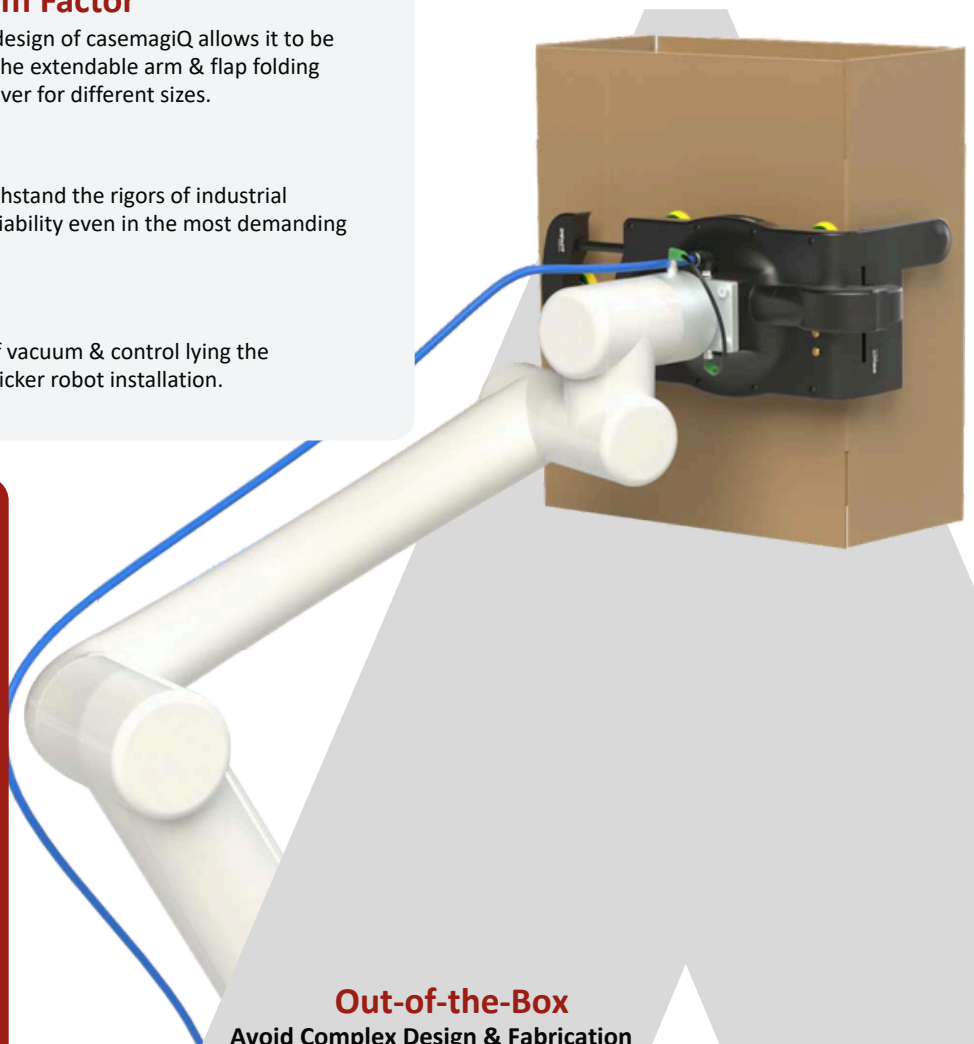
Rugged Design

casemagiQ's sturdy design allows it to withstand the rigors of industrial environments, ensuring durability and reliability even in the most demanding applications.

Smart Robot Installation

The single tube air inlet and availability of vacuum & control lying the pneumatic cylinder enables smarter & quicker robot installation.

Install in just 10 minutes



Benefits - Integrators

- Plug & Play design enables reduced design complexity.
- Faster project completion saving 4-8 weeks.
- No dependency on skilled design & engineering resources.
- Simplified procurement eliminates coordinating from multiple vendors.
- Reduce installation time to just a few minutes.
- Decrease turnaround of projects - more projects in the same time.
- Aesthetic implementation of the robotic cell.

Benefits - End Users

- Aesthetic robotic cell. Single EOAT adaptable for multiple carton sizes.
- Zero maintenance.
- Minimize spares requirement.
- Quicker deployment of projects.
- Quick redeployment for other applications.

Out-of-the-Box

Avoid Complex Design & Fabrication

Laser Aligner

Allows quick alignment for new cartons

Extendable

Suitable for varying carton sizes

Quick Install

Accelerate Robot Deployment

Light

Maximize Robot Payload

IP54

Use in Industrial Environment



From Flat Carton to Formed Case in Minutes

A Complete Robotic Case Erection System

Case erection is a fundamental step in many packaging operations. Flat cartons must be picked, erected into an open box shape, and then folded and sealed before the case can proceed further along the packaging line.

The **casemagiQ CM100 and CM50** enable robots to reliably pick and erect flat cartons across a wide range of case sizes. Mounted directly at the robot wrist, these tools simplify robotic case forming and provide a consistent method for erecting cartons.

To complete the case erection workflow, cartons must also be supplied to the robot in a structured manner and folded and sealed once the case has been erected.

The casemagiQ system brings these elements together into a structured robotic case erection solution. Flat cartons are organized in the casemagiQ Case Stacker, picked and erected by the robot using casemagiQ CM100 or CM50, and then transferred through the casemagiQ Station, where the carton is folded and sealed before moving to the next stage of the packaging process.

This integrated approach simplifies system design and enables faster deployment of robotic case erection applications.

casemagiQ[®] Station

Complete robotic case erection system

From carton supply to folding and sealing.

Organized carton supply

casemagiQ Case Stacker provides a structured pickup location.

Robotic case erection

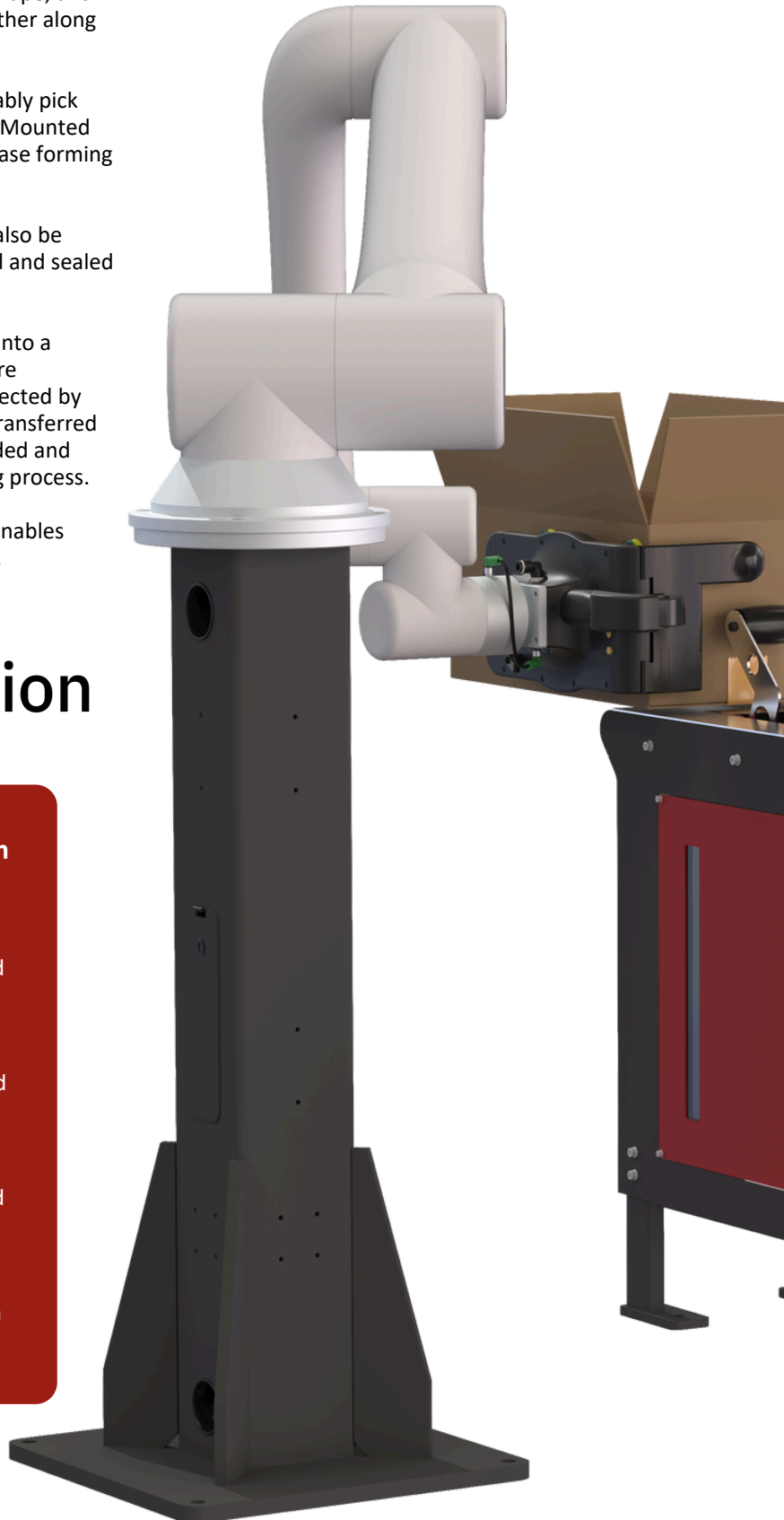
casemagiQ CM100 and CM50 reliably pick and erect cartons.

Integrated folding and sealing

casemagiQ Station folds and seals the erected case.

Flexible system integration

Designed for easy integration into production lines.



casemagiQ Station

casemagiQ Station is a fixed mechanical station designed to support robotic case erection and folding operations. It provides a structured platform where erected cartons can be folded and sealed before continuing along the packaging line.

The station integrates a folding mechanism and taping head into a single structure, eliminating the need for custom fabrication and separate integration of taping equipment. Adjustable guides allow the station to accommodate different carton sizes, while the adjustable height enables easy alignment with existing production lines.

Mounting provisions are available for exit conveyors as well as for installing an Impact Robotics Qik-mount pedestal, enabling a stable and repeatable robot installation.

The modular design minimizes assembly effort and allows integrators to deploy robotic case erection systems faster and with greater consistency.



casemagiQ Case Stacker

casemagiQ Case Stacker provides a structured location for storing and presenting flat cartons for robotic pickup.

In many robotic case forming applications, cartons are manually placed within the robot's working area. This can result in inconsistent positioning and interruptions in the workflow.

The Case Stacker allows multiple flat cartons to be stacked neatly in a designated pickup area. The robot equipped with casemagiQ CM100 or CM50 can then pick cartons reliably from this stack and transfer them into the case erection process.

The adjustable design allows the stacker to accommodate different carton sizes, while the foldable structure enables quick deployment and easy relocation when required.

Value Proposition

Traditionally, implementing robotic case erection required multiple custom mechanical designs, including carton feeding systems, folding stations, and taping equipment.

Each project required engineering resources, fabrication work, and coordination with multiple vendors.

The casemagiQ system reduces this complexity by providing standardized components designed specifically for robotic case erection.

This approach shortens deployment timelines, reduces engineering effort, and enables faster implementation of robotic packaging solutions.

Advantages

The casemagiQ system simplifies robotic case erection by combining carton supply, robotic erection, and folding and sealing into a structured workflow.

Instead of designing and fabricating multiple custom components, integrators can deploy a ready-to-use system that reduces engineering effort and improves consistency across installations.

The modular structure enables faster deployment while maintaining flexibility for different carton sizes and production layouts.

Case Stacker



Structured Case Erection Workflow

Flat cartons are supplied, erected, folded, and sealed through a defined robotic workflow designed for reliability and consistency.

Simplified Mechanical Integration

Pre-engineered components reduce the need for custom fabrication and simplify installation within robotic cells.

Flexible Carton Handling

Adjustable mechanisms allow the system to support multiple carton sizes and packaging formats.

Faster Deployment

Standardized workstation components enable quicker system installation and reduce project timelines.

	casemagiQ Station
Weight	42 Kg
Dimensions (L x W x H)	1504 x 656 x 760 mm
Max. case dimension	500 x 500 x 400 mm
Min. case dimension	200 x 125 x 125 mm
Taping Module	Included - Signode

Benefits - Integrators

- Reduced mechanical design and fabrication work
- Faster system deployment and commissioning
- Simplified integration of carton supply and folding stations
- Standardized components reduce engineering complexity
- Less coordination with multiple equipment vendors
- Ability to deliver more projects in less time

Benefits - End Users

- Structured and reliable case erection process
- Reduced manual handling of flat cartons
- Consistent carton folding and sealing
- Faster deployment of robotic packaging systems
- Easy integration into existing production lines
- Improved operational consistency across installations





Built to Simplify Case Erection

Reducing Engineering Effort and Accelerating Deployment

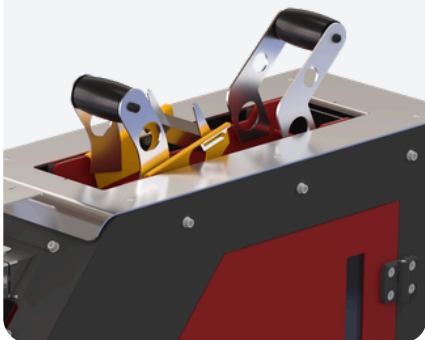
Many robotic case erection projects require multiple pieces of equipment to be designed, fabricated, and integrated around the robot. Carton supply systems, folding stations, and taping equipment are often developed separately, increasing engineering effort and deployment time.

The casemagiQ system simplifies this process by combining the essential elements required for robotic case erection into a structured solution. From carton supply to folding and sealing, each component is designed to work together as part of a consistent robotic workflow.



casemagiQ Station

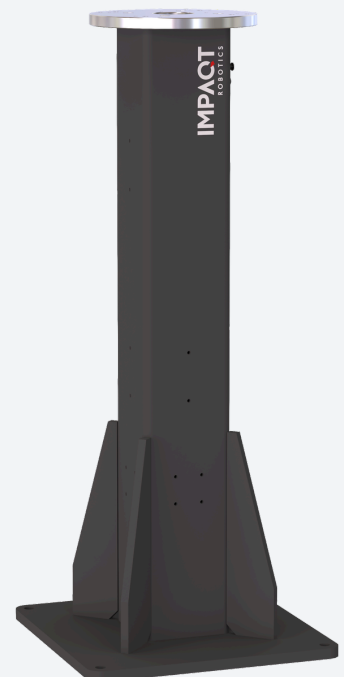
Taping Head



Case Flap Folders



Qik-mount Pedestal



Case Stacker



CM100



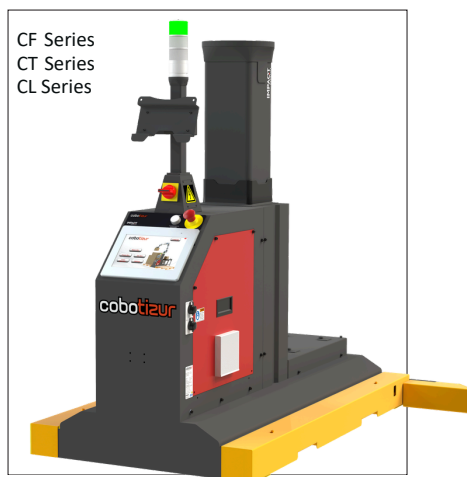
CM50

Specifications

	CM100	CM50
Operating medium	Compressed air	
Weight	1350 g	915 g
Dimensions (L x W x H)	464 x 176 x 94 mm	384.5 x 136 x 94 mm
Max. case dimension	500 x 400 x 400 mm	300 x 300 x 300 mm
Min. case dimension	240 x 140x 165 mm	200 x 125x 125 mm
Max. load	3kg	3 kg
Airflow rate	85 slpm/ 3 scfm	
Vacuum flow rate	15 slpm/ 0.53 scfm	
Air consumption	100 slpm/ 3.53 scfm	
Max. vacuum pressure	-870 mbar/ -12.62 psi	
Max. operating pressure	6 bar / 87 psi	
I/O Connector	M8 8pin female connector	
Air Inlet	Ø8 mm tube quick connector	
Operating voltage	24V DC	
Ambient temperature range	+5°C to 50°C	+5°C to 50°C
Noise level	<50 dB	<50 dB
Ingress Protection	IP54	IP54

Product Lineup

cobotizur
the collaborative palletizer
The Cobot Palletizing Platform



vaQgrip®

Universal Plug & Play Vacuum Grippers



pneumagiQ®
Patented

Universal Pneumatic EOAT Interface



casemagiQ®

Universal Case Forming EOAT



pneuvaQ®
Patent Pending

Integrated Pneumatic + Vacuum Interface



Qik-kit®
Cable Management System

Qik-mount®
Cobot Peripherals

Robot Compatibility

ABB

DOOSAN



ELITE ROBOT

FANUC

JAKA

Kawasaki Robotics

KUKA

OMRON

TM ROBOT



UNIVERSAL ROBOTS

YASKAWA

and more...



reddot winner 2024



reddot winner 2023
innovative product



reddot winner 2023



IMPAQT
ROBOTICS

Impaqt Robotics Private Limited
267 Kilpauk Garden Road, Chennai 600 010, India
sales@impaqt-robotics.com
www.impaqt-robotics.com

6 900 1704