



Bakery & baked goods made better



coperion.com/fhn

Unifying technologies

Unlocking possibilities

We proudly stand behind our commitment to advancing technologies that feed and nourish the world, making a meaningful impact on global well-being.

Clients worldwide rely on our teams to deliver the quality, reliability, safety, and performance they expect.

Coperion, together with our dedicated food team, which includes some of the world's leading baked-goods technology brands, is more capable than ever.

Equipped with a diverse portfolio of state-of-the-art solutions and supported by trusted experts in end-to-end process innovation, we bring deep industry knowledge and technical excellence to every project. Collaborative, adaptable, and above all, dedicated to your success.



Confidence through partnership

Coperion and its brands, with over 200 years of expertise, proudly deliver solutions that help shape how the world eats, nourishes, and heals.



Key capabilities

Coperion and its technology brands cover a wide spectrum of system capabilities for producing baked goods including breads, rolls, tortillas, pastries, cakes, biscuits, cookies, crackers, and bars.

All our technologies and complete systems are designed and manufactured with long-term performance and efficiency in mind, and our turnkey installations include some of the most automated and advanced systems for bakery and baked goods on the market.

These comprehensive production-line solutions, combined with a group-wide emphasis on service-know-how and long-term relationships with customers, mean that Coperion has the collective synergy to continue growing, innovating, and shaping the world of food production.

- We offer customized and automated solutions for your bakery and baked goods production process
- We combine our experience and expertise to serve and support customers in achieving their process
- We build long-lasting customer relationships through training, knowledge sharing, maintenance, and upgrade planning

Technology for:

- Systems and ingredient automation
- Fermentation, mixing, dividing, forming, depositing and baking
- Decorating and cutting
- Aftermarket services

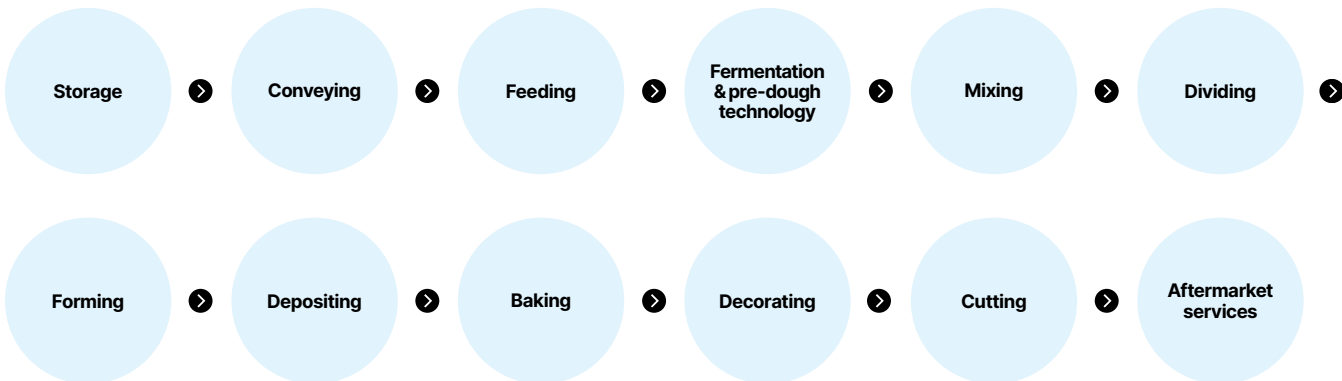
Our technologies take you from ingredient storage to cutting your final product in baking process applications.

We work with bakers to ensure:

- High product quality and process optimization
- Single-source, scalable and automated solutions
- It's a long-term partnership, with support at every stage
- Consistent and reliable performance



We cover all steps for producing baked goods:



End product capability at a glance

Coperion's integrated solutions and systems are engineered to produce a wide variety of baked goods, including breads, pastries, cakes, cookies, and crackers.

Our technologies enable bakers to produce a broad range of baked goods while maintaining consistent product quality in large-scale operations. Coperion's advanced systems ensure recipe accuracy through precise automation, reducing operator intervention and production variability.

With over 200 years of experience across our technology brands, we deliver hygienic, automated solutions designed for efficiency, reliability, and compliance with modern food safety standards.

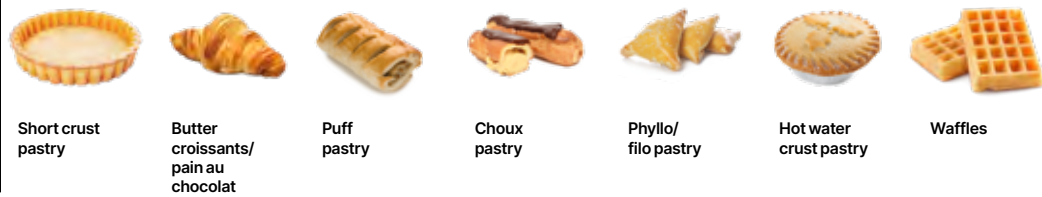
Breads and buns



Breads and buns (cont)



Pastries



Cakes

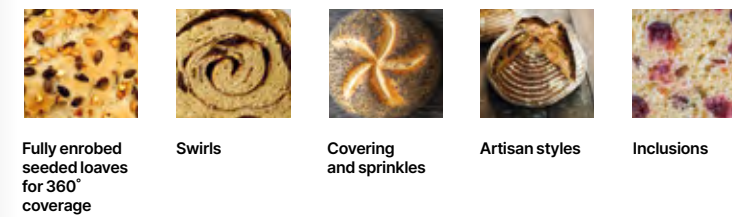


Above are just a selection of the products our technologies can produce – we can also create custom solutions tailored to your needs.

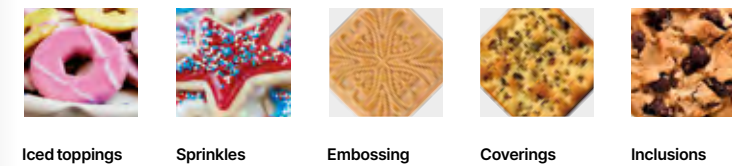
Biscuits, cookies & crackers



Bread and bakery effects



Effects for biscuits, cookies, bars, and crackers



Dessert fillings



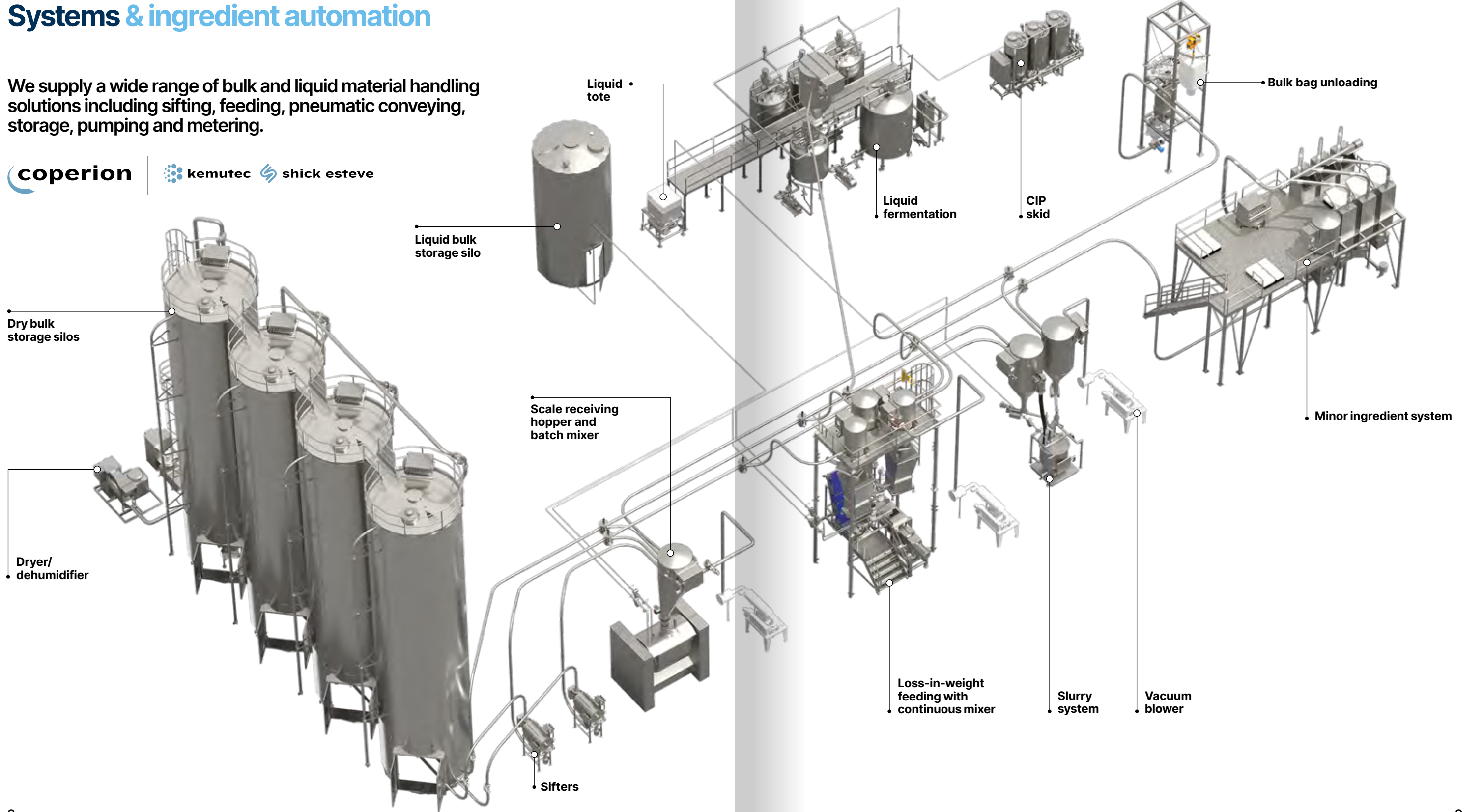
Dessert decorations



Above are just a selection of the products our technologies can produce – we can also create custom solutions tailored to your needs.

Systems & ingredient automation

We supply a wide range of bulk and liquid material handling solutions including sifting, feeding, pneumatic conveying, storage, pumping and metering.



Systems & ingredient automation

(continued)



For expert material handling and accurate ingredient automation, Coperion and its technology brands have the capability to take your raw ingredients from the beginning to the end of your process.



Sifting

Kemutec sifters are designed to separate large clumps from flour, while providing a uniform particle size. Remove all unwanted materials such as strings, packaging, insects and others. Tool free removal of sifting screen, screen retainer and paddle/blade assembly simplifies maintenance and reduces downtime.

Milling

Kemutec cone mills are ideal for crumbing or reworking cakes and cookies with creams and chocolate coating after being damaged during production. These scraps are made into usable ingredients reducing waste.

Pneumatic conveying

Coperion continuous dense phase conveying systems handle a wide range of fragile materials that include crisp rice, peanuts, extruded cereals and granola for baked goods and snacks.

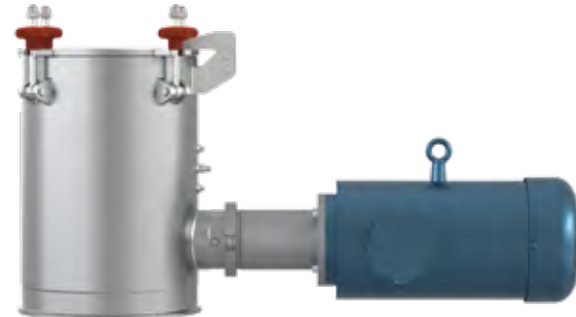
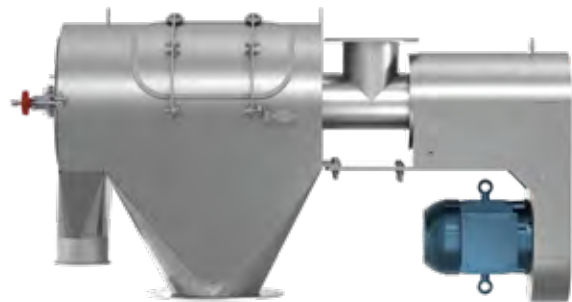
Feeding

Accurately feeding dry ingredients such as flour, sugar, salt, yeast or flavorings are a common practice with Coperion feeders in applications where these materials need to be fed into a continuous dough mixer or packaging line.



Storage and material transfer

For bulk, minor and liquid ingredient handling Shick Esteve provides storage and material transfer utilizing bins, bulk bag unloaders, pumps, bulk material handling conveyors, and pneumatic and vacuum conveyors. Shick Esteve flour reclaim systems automatically recover and deliver the recovered flour back into the process or taken to waste.



Pre-dough to fermentation



VMI and DIOSNA offer advanced sourdough solutions with precise process control.

VMI and DIOSNA offer sourdough machines that mix, mature and store sourdough and poolish. Automated cycle management and precise process control ensure smooth, reliable production, freeing you from all the constraints of daily sourdough production. Capacities are customer driven and with variable fermentation times and flexible stirring intervals, specially selected guides can be set up, even for completely different pre-doughs. We offer a selection of fermenters for wheat or sourdough breads in easy-to-operate, hygienic systems. For an even stronger start, tailor-made starter cultures are produced at our DIOSNA site, cultivated with the latest technology to guarantee pure freshness and consistent results in every loaf.

VMI and DIOSNA provide cutting edge fermentation technology for producing consistent breads.



Sourdough systems



The hygienic system provides thermally controlled pre-dough

Natural and fresh dough concepts

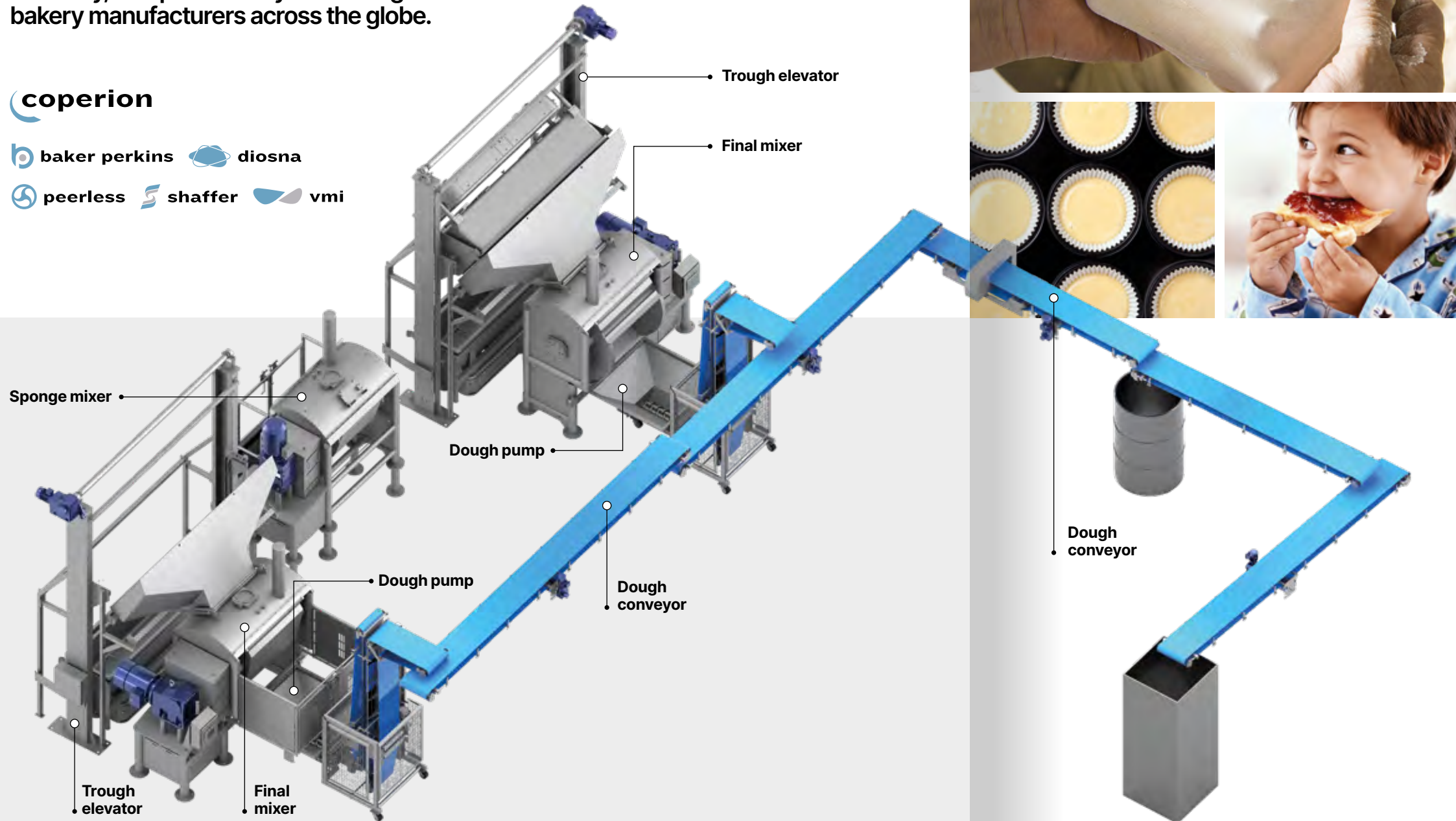


Flour and dough analysis confirms the ideal solution for your process

Mixing

From lab-scale to large-scale automation: our mixers cover all. Baker Perkins, DIOSNA, Peerless, Shaffer, and VMI mixers provide unmatched performance, reliability, and productivity for leading bakery manufacturers across the globe.

We offer the most extensive range of mixing technologies in the world, covering a wide variety of products such as biscuits, breads, pastries, cakes, cookies, crackers, and specialty baked goods for bakeries of all sizes. Our mixers go from lab-scale setups to fully automated, large-scale solutions.



We offer batch and continuous mixing solutions tailored for consistent, scalable bakery operations.

Batch mixers

Batch mixers combine precision and flexibility for any production size. Available in different technologies, they work efficiently on both manual and fully automated lines.

Continuous mixers

Designed for 24/7 production, delivering consistent, high-quality batter or dough with a high level of automation.

Dough is efficiently transferred from the mixer to downstream equipment, such as forming machines, using our reliable Shaffer pumps or advanced Shaffer and Baker Perkins dough feed systems, depending on your process needs. For fruit fillings, creams, and cake batters, our Unifiller pumps ensure smooth, precise, and consistent transfers between containers every time.

Mixing (continued)

Every bakery has unique production goals – some require flexibility for varied recipes, others demand efficiency and high output.

Batch mixers

Spiral mixers

Highly versatile, spiral mixers feature interchangeable tools for fast mixing with minimal dough heating, available in single or double tool versions.

Fork mixers

Offering controlled, gentle mixing, preserving the structure and texture of the dough, for bakers who value traditional artisanal methods.

Wendel mixers

Designed for high-performance, combining fast operation with minimal dough heating, Wendel mixers are ideal for large-scale bakery production.

Planetary mixers

Ideal for batters, creams, and cake preparations, planetary mixers can handle both liquid and viscous mixtures with ease.

Horizontal mixers

Horizontal mixers are ideal for very large batches. They excel in high-volume, fast-paced production, ensuring both speed and reliability for demanding bakery operations.

High-speed/high shear mixers

Deliver rapid and intensive mixing, ensuring uniform dough development in minimal time.



Continuous mixers

Continuous dough mixer

Ensure precise ingredient feeding, optimal dough hydration, and controlled mixing temperature for highly consistent production.

Continuous batter mixer

Efficiently mix and aerate batters, icings, and creams, ensuring consistent texture and uniform structure, for high-output bakeries.



Mixing (continued)



Whether you're starting from a small lab, running a craft bakery, or operating at scale, our goal is to help you grow.

Mixing automation

Mixing automation streamlines every stage of production - from ingredient introduction to multiple mixing cycles, resting phases, discharge, and cleaning. By automating these processes, bakeries can boost efficiency, ensure consistent results, increase capacity, and maintain flexible, adaptable production.

Benefits include:

- Automated processes & enhanced safety
- High flexibility & easy integration
- Scalability
- Improved traceability & process control
- Cleanability & easy maintenance access



Modular systems

From targeted automation to fully automated lines, our modular solutions let you choose the level of automation that fits your needs.

Ancillary systems

Elevators, hoppers, or conveyors automate transitions between process steps.

Automated stations

Feeding or cleaning ensure consistency and traceability, all supervised via a programmable interface connected to the mixer.

Automated Guided Vehicles (AGV)

Smart automated robots that transport bowls and containers throughout the process, a flexible and scalable solution eliminating manual handling. AGVs ensure full process traceability and enable real-time monitoring for better quality control and compliance.

Shuttle systems

Enclosed, high-capacity handling for bakeries requiring maximum throughput and total process control.

With automation, you can go from stand-alone equipment to semi-automated solutions up to fully automated lines. This approach gives you complete flexibility, letting you match automation to your production needs, space, and budget.

Your process - supported by advanced digital solutions

Our solutions are backed by powerful software that manages recipes, monitors operations and consumption, tracks traceability, detects faults, and delivers detailed reporting - ensuring every level of automation runs consistently, efficiently, and under full control.

Dividing

We offer a wide range of dough dividing technologies that improve bread quality through accuracy and reliability.



General product features include the following:

- Gentle dough handling without loss of accuracy
- Low lifetime running cost
- Easy to operate and clean
- Wide output and application range
- Variable pocket configurations



Easy die cleaning



Accurate dough dividing

Baker Perkins dividers provide gentle dough accuracy and speed with full wash down capability. The dough dividers can be configured for almost any baked item including most breads and pizza doughs.



Forming & moulding

Baker Perkins rounders and moulders ensure efficient production and consistently high-quality bread, helping bakeries achieve reliable results with every batch.



Rounding

Baker Perkins rounders deliver efficient, hygienic performance with non-stick operation. They gently shape divided dough pieces into uniform balls, ensuring smooth transfer to the first prover and final moulder. Capable of handling a wide range of dough weights, these machines achieve throughputs of up to 10,000 pieces per hour.

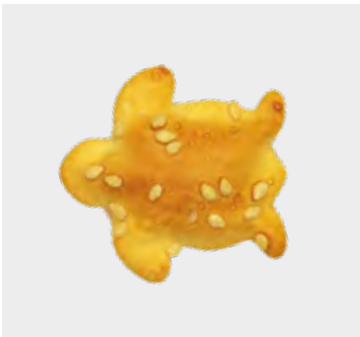
Moulding

Baker Perkins moulders deliver consistent, high-quality results through gentle dough handling and efficient panning. Designed for hygienic operation and rapid changeovers, they maximize uptime and minimize costs – optimizing dough structure to lower ingredient usage or enhance loaf quality.



Baker Perkins rounding and moulding equipment ensures consistent dough quality and perfect shaping every time. Gentle rounding creates smooth, uniform pieces for easier handling while precise moulding forms the final shape with accuracy and care. Designed for hygienic operation and repeatable performance, Baker Perkins solutions deliver the reliability, consistency, and product quality that bakeries worldwide depend on.

Forming & moulding (continued)



Baker Perkins sheet forming and cutting lines process many dough types to make laminated or sheeted crackers and snacks, with precise weight control, low costs, and hygienic operation.



Precise weight control

All units have the power and robustness to run at very high speeds for long periods without the loss of control or quality. Low-deflection gauge rolls guarantee weight control over many years.

Efficient and reliable for low production costs

Waste and scrap are very low, while changeover and cleaning between production runs is quick and straightforward. High quality components and software maintain trouble-free operation for long periods.

Designed to achieve the highest level of hygienic operation

Every unit is designed with hygiene in mind: maximum access, minimal components between the frames and tool-free removal of scrapers make cleaning simple and quick.

The Baker Perkins laminator is the ideal solution for producing high-output laminated products with a lighter, crisper texture. It combines precise weight control with efficient, reliable performance for consistent, high-quality results.

Weight control at high output

Accurate weight control is achieved by close control of dough sheet thickness and the lay-down process. Advanced motion-control technology improves the precision of the sheet positioning and lay-down. Velocity and position can be adjusted during operation, making it easy to achieve a perfectly laminated sheet. Low-deflection gauge rolls guarantee this accurate weight control over many years.

Efficient and reliable for low lifetime ownership costs

A hygienic design reduces debris, improves cleaning and simplifies removal and replacement of components. It also enables machines to be matched to specific cross-contact risks and cleaning protocols in accordance with industry guidelines.



Forming & moulding (continued)



Baker Perkins high accuracy wirecut machines are key to quality cookie production. The wirecuts and frozen dough machines are uniquely designed for soft doughs typified by the classic chocolate chip cookie.

A full range of classic cookies

The classic chocolate chip cookie is best known, but only one of a wide range made using Baker Perkins wirecuts and frozen dough machines – from grocery favorites to gourmet with inclusions, in a choice of different shapes and sizes.

'Home baked' appearance

A slow, gentle bake allows the dough pieces to flow in the oven and this plus the cutting marks left by the wire, gives the products their distinctive 'home-baked' appearance.

Production to match your needs

Wirecut machines can be specified with a range of options to ensure they meet your exact requirements. Our wirecuts combine hygienic design with the ability to control product weights very closely.

Baker Perkins' wirecuts and frozen dough machines highly accurate weight control is achieved through die and filler block technology. Fast changeovers, low waste and minimal giveaway along with easy cleaning reduce operating costs.

Baker Perkins rotary moulders produce a full range cookies. Low cost of ownership, hygienic design and easy operation are hallmarks of the moulders.

Low cost of ownership

High efficiency, accuracy, and easy maintenance deliver reliable, low-cost production with minimal labor and downtime.

Designed for hygiene

A hygienic design minimizes debris, speeds cleaning, and allows easy component removal to meet specific industry cleaning standards.

Easy operation and maintenance

Reliable, high-performance machines with simple push-button controls and minimal adjustments deliver all the benefits expected from Baker Perkins equipment.



After baking, Peerless Peters Sandwiching machines combine low maintenance and quick changeovers to produce up to 4,800 sandwich cookies per minute with consistent precision.

Depositing



When it comes to depositing systems we offer a full range of single piston, or multiple piston depositors for semi-liquid and solid products such as cake batter, cupcakes, muffins, macarons, and many more.

coperion | **b** bakon **S** peerless **U** unifiller



Unifiller depositing machines can be used for clean depositing of relatively viscous to liquid products with, or without chunks. Cakes, muffins, and cupcake batters are dosed at high speed production rates with accurate portion controls. Tool free, quick change designs make for minimal sanitation and maintenance requirements.

Depositing system capabilities:

- Continuous or intermittent depositing
- Programmable recipes
- Accurate individual portion control
- Stainless steel designs
- Easy integration into production lines



Baking

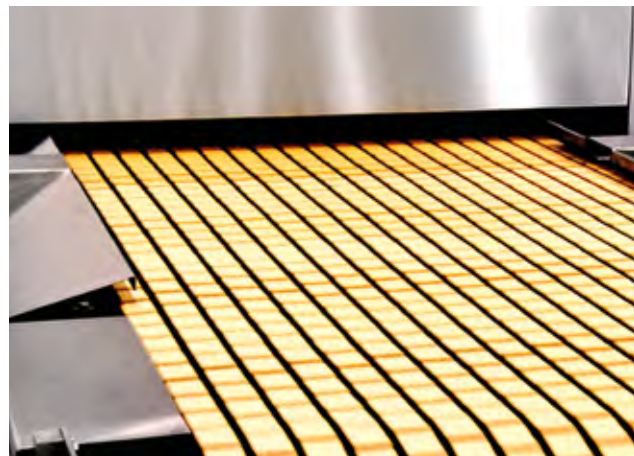


For baking biscuits, cookies, crackers, granola, and many other products, we offer Baker Perkins convection, direct gas fired and hybrid ovens.

Our convection ovens utilize a high-rate direct convection heating system achieving exceptional product quality, high throughput and low operating costs.

Direct gas fired ovens generate heat from ribbon burners mounted above and below the baking surface assisted by an air circulation system for baking biscuits, cookies, crackers and granola.

Hybrid ovens combine indirect convection and direct convection baking that meet the exact needs of any biscuit, cookie, cracker or granola bar.



Cake & cupcake decorating

Unifiller technologies offer leading-edge decorating solutions for bakeries across the world. From stand-alone machines to fully automated cake decorating systems, our versatile equipment can be used for a variety of cakes with a simple change in tooling.



Cake decorating applications:



Accurate cake mid-filling

Use our servo spread technology to easily fill layers with a smooth layer of icing or filling. Our mid-fill nozzle works for cakes 4" to 12" (102-305 mm) in diameter. Spread layers in up to 1.5 seconds!



Fast top & side icing

The Unifiller cake icing module quickly covers the top and sides of cakes in one step. It can ice up to 10 round cakes every minute. Use a fixed or adjustable turntable to ice cakes that range from 6" to 12" (152-305 mm) in size.



Clean bordering system

Our hygienic bordering automation makes it faster to add borders to the top and bottom of cakes. You can switch out bakery tips to create different border styles. This ergonomic system also helps prevent strain or injury from doing the same task over and over.



Beautiful cake designs

Unifiller cake heads make decorating cakes easy. You can quickly attach them to a depositor for use in a production line or as a standalone station. These cake heads can be customized for different styles, colors, sizes, and spacing between rosettes.

Spraying & glazing

Bakon and Unifiller spraying machines spray all kinds of liquids such as oil, glaze, jelly, aspic, fondant, egg wash, syrup, chocolate and more for glazing, flavor applications and uniform coating.

coperion | **b** bakon **U** unifiller



Our spraying machines, from small to large, are suitable for small to large producers.

Spraying machines:

- Airless, airmix and disc spraying
- Reuse overspray
- Target spray possible
- Handle different types of fluids
- Static or rotating spray guns

Donut dipping machines:

- 'Au bain Marie' heating system
- Easily adjustable dipping level
- Catch trays underneath the in-feed and out-feed section
- Drizzle unit and strewer for beautiful decorations

Utilizing servo control, quickly icing the tops and sides of round and sheet cakes with accurate portions is easily achievable.

Drizzling equipment pours or trickles a fine stream of liquid such as glaze, icing, chocolate, or fondant onto cakes, cookies, pastries or donuts making them highly attractive.



Cutting



Bakon technologies offer ultrasonic cutting and slicing machines for a wide range of breads, pastries and cakes.



Precision is key in bakery and baked goods production. Whether you're slicing layered cakes, sticky desserts or savory products, clean and consistent cutting is essential – for product quality, presentation and shelf life.

Bakon ultrasonic cutting machines are developed to meet the high demands of modern food producers. Using advanced ultrasonic technology, they deliver flawless results with minimal product deformation and residue. Solutions are available for small-scale bakeries to high-capacity production lines.



Each machine has the following features:

- Built customer specific, stand alone or inline
- Fully configurable for customer needs
- Capable of cutting products up to 4.75" (120 mm) high
- Servo driven
- Easy-to-clean
- Multiple cutting stations possible depending on production capacities

By working with Coperion, you'll find that we have every step of your baking process covered – from start to finish.

Global Test & Innovation Centers



With test & innovation centers around the globe, Coperion can identify the best system tailored to your specific application.

Whether it is pneumatic conveying, feeding, sifting, fermentation, mixing, depositing, extruding, forming, dividing, baking, decorating or cutting, we have the test facilities to verify the ideal system for baking processes.

Helping you optimize your processes

Discover our test center capabilities. With comprehensively equipped Test & Innovation Centers worldwide, we can perform advanced testing to address any challenge in your production process.

Key benefits:

- Develop your next bakery recipe
- Test equipment before investing
- Conduct factory tests without disruption



Scan the QR code to find out more

Aftermarket sales & service

Looking for after-sales solutions? Our extensive Aftermarket program provides you with after-sales services – customized to your specific requirements.

The framework of our Aftermarket program is designed with you in mind. With the guidance of our experienced after-sales team, you can create Aftermarket packages comprised of original spare and wear parts, various services and high-quality components to meet your needs.

Our Aftermarket program is based on a modular principle – you can pick and choose any individual product or a combination thereof. Aftermarket service categories focused on repair, inspection, management and support help to easily find the appropriate products.

We welcome the opportunity to provide you with individual consultation, either as part of an Aftermarket contract or on an individual basis. Whatever full service means to you – let's create it together!

Connect Advisor

At Coperion, we've been working to reshape how industrial processes and the equipment that powers them are managed, through ongoing development of our Connect Advisor technology platform.

With solutions that leverage Connect Advisor, you can:

- Gather data that can be used to optimize process performance
- Monitor equipment condition and performance in real time
- Leverage information to enable proactive preventive maintenance
- Enable effective, efficient remote assistance and service
- Identify opportunities to improve processes through engineering and operational enhancements
- Generate actionable analytics about duty cycles, energy usage, throughput and more

Complete after-sales solutions





For technical information,
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