

No.18

The First Specialized Monthly Magazine of Tray Sealer, Thermoforming and Vacuum Chamber Packaging Machinery Industry

VORMEK

Vormek an Innovation-based Machinery Company, an Knowledge & Progress Center with Superior Technology and High Reputation in its Field

Editor-in-Chief: Mr. Simon Füllenbach - Designer of Vormek Packaging Machines and Founder of this Company

Editorialist: Dr. David Sterling (Faculty Member of University and Marketing and Sale Consultant)

Editor and Translator: Dr. Stefanie Kaiser

Editorial Board: Marketing and Sales Unit of Vormek

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MAP; The Winning Solution for Dried Fruit Packaging
Extended Shelf Life, Preserved Flavor, and Reduced Waste

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License Holder and Director-in-Charge:
Simon Füllenbach



Editor-in-Chief:
Dr. David Sterling
Faculty Member of University



Assistant Editor:
Sophia Brown



Editor and Translator:
Dr. Stefanie Kaiser



Graphic Designer and Layout Artist:
Mr. Ben Stevens

Website: [Vormek.Com/ En-Ar-Ru-De](http://Vormek.Com/En-Ar-Ru-De)

Mobile Phone: +44 7552 732408

Email: info@vormek.co

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SEMI-AUTOMATIC
TRAY SEALER MACHINE

AUTOMATIC TRAY SEALER
PACKAGING MACHINE

Content

Editor's Note	04
Introducing the Gosealer-VTS200 Semi automatic Tray Sealer	05
MAP; The Winning Solution for Dried Fruit Packaging Extended Shelf Life, Preserved Flavor, and Reduced Waste	07
Dried fruit series	08
Revolution in the Fresh and Dried Fruit Industry: The Future of Fruit Marketing in Vacuum Seal Packaging	09
Strong Structure; The Beating Heart and Secret of Durability & Precision in Vacuum Sealing Machines	10
16 Golden Criteria for Selecting the Best Automatic Tray Sealer	11
Modified Atmosphere Packaging (MAP); An Effective Solution for Extending Shelf Life and Preserving Food Quality	13
Arcadia; A Successful Example of High-Efficiency Production and Long Lasting Packaging The Result of Combining Vacuum and Gas Injection	14
EXPO PACK México 2026; Shaping the Future of Packaging in Latin America	15
Advancing Freeze-Drying Technology for Long-Life Food Products	16
From Production Line to Retail Shelf; A Decade of Reliable Packaging Performance with the Vormek Tray Sealer	17
The Importance of Using Tray Sealer, Thermoforming, and Vacuum Chamber Machines in Today's Packaging Industries	18



Tray Sealer Technology: The Key to Fresh & Dried Fruit Packaging Success

Dr. David Sterling

How Modern Packaging Is Redefining the Food Supply Chain?

In recent years, the packaging industry has evolved into one of the most critical pillars of the food product supply chain. Among the various technological advancements, Tray Sealer machines have gained significant prominence due to their direct impact on:

- Maintaining product quality
- Extending shelf life
- Increasing overall product value

At Vormek specialized magazine, our mission has always been to equip packaging and food industry professionals with the latest trends, hands-on technologies, and practical experiences bridging the gap between theory and real-world application.

Issue 18: A Deep Dive into Fresh and Dried Fruit Packaging

In this eighteenth edition, we turn our spotlight on one of the most promising yet challenging product categories: fresh and dried fruits.

The quality of packaging for these products is not a minor detail it directly influences:

- Freshness preservation during storage and transit
- Visual appeal on retail shelves
- Consumer health through reduced contamination risks
- Overall customer satisfaction and brand loyalty

What This Issue Offers You?

Throughout this volume, we will:

- Examine the key challenges and emerging opportunities in fruit packaging
- Introduce cutting-edge solutions and technologies tailored to tray sealer systems
- Share specialized tips from industry experts to optimize your packaging line

We sincerely hope that the insights presented here will offer a fresh perspective for producers, packers, and food industry stakeholders supporting you on your journey toward business growth and greater value creation.

Join Us in Exploring New Horizons

We invite you to dive into this issue and discover the new capacities that the packaging industry has to offer. Whether you are looking to upgrade your current system or explore innovative approaches, this edition is designed to be your practical guide.

Introducing the Gosealer-VTS200 Automatic Tray Sealer – General Type

An Intelligent Blend of Economic Affordability and Cutting-Edge Technology

Mr. Simon Füllenbach
(CEO of Vormek)

In today's landscape, where the food industry grapples with two fundamental challenges rising production costs and the growing demand for high-quality, long-lasting packaging choosing equipment that is both economical and equipped with modern technology presents an attractive proposition for many manufacturers.

For years, producers have faced the perennial question:

How can one strike the perfect balance between cost and quality?

The answer has now been delivered through the design and production of the Gosealer-VTS200, a semi-automatic tray sealer that redefines expectations in its category. This machine transcends the conventional concept of industrial machinery, positioning itself as a comprehensive solution. It eliminates the dilemma of having to allocate substantial budgets to access advanced technology, or conversely, compromising quality to save costs. The Gosealer-VTS200 stands precisely at the intersection where superior quality meets reasonable and justifiable investment. By choosing this machine, you are not merely purchasing equipment—you are acquiring a tool that enables you to confidently deliver products with impeccable, durable packaging to the market.



Value Creation – What Transforms the Gosealer-VTS200 from a Machine into a Business Partner

Behind every industrial design lies a philosophy. Sometimes, that philosophy is simply to produce a product; other times, it aspires to something far greater. The philosophy governing the design of the Gosealer-VTS200 has been anchored from the outset in a single principle: **Value Creation**.

This machine was not conceived merely to add another option to the market, but to empower manufacturers to achieve superior results at a lower cost. Consequently, every component has been selected and engineered with a dual focus: reducing initial capital expenditure and optimizing ongoing operational costs.

We are all aware that the packaging market is saturated with enticing options low prices that can mislead decision-makers, and high-end quality that may deter them from purchasing. The Gosealer-VTS200, however, proposes a third path: a machine that is neither cheap and inferior, nor exorbitantly priced and unattainable. Instead, it represents a synthesis of state-of-the-art technical knowledge and economic intelligence, empowering producers to compete without compromising on quality, manage their costs efficiently, and achieve tangible profitability.



Three Packaging Methods in One Machine – Unprecedented Flexibility

Arguably the most compelling advantage of the Gosealer-VTS200 is its remarkable ability to perform three distinct packaging methods within a single, unified system. This feature transforms the machine from a single-purpose device into a versatile mini-workstation, capable of addressing the diverse needs of a modern producer. Let us examine each method in detail:

Method 1: Simple Sealing (Standard Heat Seal)

This is the simplest, fastest, and most economical method offered by the machine. In this process, the film is placed over the tray and sealed to its rim using heat and pressure. This approach is ideal for products with a short shelf life that are consumed quickly, providing a clean and hygienic seal at a minimal cost for everyday items.

Method 2: Vacuum Sealing

This is where technology becomes a key differentiator. In this method, prior to sealing the film onto the tray, the air inside the package is completely evacuated. This straightforward yet critical process, by removing oxygen, significantly inhibits the growth of spoilage microorganisms. Consequently, the product's shelf life is notably extended. For manufacturers seeking to enhance the longevity of their products, this is an indispensable and intelligent choice.

Method 3: Modified Atmosphere Packaging (MAP)

This represents the most advanced and impactful method available on the Gosealer-VTS200. In this process, after complete evacuation, a protective gas mixture (such as Nitrogen and Carbon Dioxide) is injected into the tray. The result is a product with maximized shelf life, while its quality including color, aroma, taste, and nutritional value remains impeccably preserved until the package is opened. This method is particularly transformative for sensitive and high-value products, including nuts, specialty cheeses, various meats, sausages, cold cuts, and other protein-based items.

Intelligent Design – Where Hygiene, Efficiency, and Simplicity Converge

Upon closer inspection of the Gosealer-VTS200, the most striking feature is the profound attention to human-centric design. The machine has been crafted with meticulous care, ensuring that the body, frame, and all contact parts are designed for easy and hassle-free cleaning a critical necessity, not merely an advantage, in the food industry. Furthermore, operators do not require complex technical training to work with this machine. The Persian-language touchscreen interface displays all settings and alerts in clear, straightforward language, reducing the entire operation to a few simple touches. This intuitive simplicity translates directly into a significant reduction in human errors on the production line.



Space Efficiency – Practical Productivity

The compact and optimized footprint of the Gosealer-VTS200 is a key feature of its design. Small workshops, food retail outlets, and semi-industrial production lines can all benefit from this machine. It occupies minimal floor space while delivering maximum performance.

Additionally, for enhanced mobility, the machine is available with an optional stainless steel mobile stand, making relocation effortless and significantly boosting operational flexibility.



After-Sales Service – A Commitment Beyond the Point of Sale

Perhaps the most distinctive advantage that sets the Gosealer-VTS200 apart from its competitors is not what you see at the time of purchase, but what happens afterward: dedicated after-sales service provided by the expert team at vormek. We remain by our customers' side at all times, ensuring the highest levels of satisfaction and long-term reliability.

The Gosealer-VTS200 is more than a machine—it is a symbol of genuine commitment to quality, innovation, and value creation.





MAP; The Winning Solution for Dried Fruit Packaging

Extended Shelf Life, Preserved Flavor, and Reduced Waste

Sophia Brown

Dried fruit is one of the most popular and nutritious healthy snacks worldwide. However, once the drying process is complete, the product faces several challenges that can quickly reduce its quality, flavor, and commercial value if they are not properly addressed.

The Main Challenges of Dried Fruit After Drying:

- Oxidation of natural fats, which leads to rancidity, unpleasant odors, and loss of the product's original flavor.
- Moisture absorption, causing the fruit to become soft, sticky, and susceptible to mold growth.
- Infestation by storage pests, such as beetles, moths, and mites, which thrive in the presence of oxygen.

To overcome these challenges, one of the most effective solutions is Modified Atmosphere Packaging (MAP). In this process, the air inside the package which naturally contains about 21% Oxygen is removed using a high-performance vacuum system and replaced with high-purity Nitrogen gas (typically over 99.9%).

Key Benefits of MAP for Dried Fruit

- Effectively prevents oxidation and rancidity.
- Preserves the natural color, aroma, and flavor of dried fruit for an extended period.
- Eliminates storage pests without the need for chemical fumigants or pesticides.
- Significantly reduces product losses while extending shelf life.

Under proper processing and storage conditions, MAP can increase the shelf life of dried fruit from just a few months to more than one year.

Key Requirement	Description	Benefit
Final Moisture Control	Moisture content should be reduced to below 20%.	Prevents stickiness and mold growth.
High-Precision Packaging Equipment	Machines should provide a strong vacuum and uniform gas flushing.	Ensures airtight, leak-free sealing.
Proper Storage Conditions	Products should be stored in a cool, dry environment.	Maintains the modified atmosphere and extends shelf life.

Critical Requirements for Successful MAP Packaging

Why MAP Has Become Essential

Modified Atmosphere Packaging is no longer considered a luxury, it has become a necessity for manufacturers who want to remain competitive in today's market. By preserving the natural aroma, flavor, color, and quality of dried fruit, MAP significantly reduces product waste. In addition, although dried fruit naturally has a high sugar content and low moisture level, which helps delay microbial growth, spoilage can accelerate dramatically if moisture becomes available alongside sugars. Therefore, proper packaging plays a critical role in maintaining product stability and extending shelf life.

MAP not only helps manufacturers reduce waste and production costs but also enables them to export their products to distant markets while maintaining product freshness and quality throughout the distribution chain.

If you are involved in the production or packaging of dried fruit, selecting the right MAP packaging equipment can make a significant difference in your product quality, brand reputation, and long-term profitability.

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Packaging Series

This episode: Dried Fruit



1

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Dried Fruit and Its Properties

Dried fruit is a product produced by removing the natural moisture present in fresh fruit using various drying methods. This process increases shelf life, concentrates nutrients, and facilitates transportation and storage of the fruit.



2

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Types of Contamination in Dried Fruit Due to Improper Packaging

- **Microbial contamination:** Mold, yeast, bacteria
- **Chemical contamination:** Toxins, excess preservatives, contamination from packaging materials
- **Physical contamination:** Stones, plastic, metal, stems, and impurities
- **Pest contamination:** Insect eggs or larvae, pantry moths
- **Contamination caused by poor storage:** Moisture, stale odor, stickiness



3

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How Does a Suitable Packaging Machine Help Reduce Contamination in Dried Fruit?



- Strong sealing and vacuum reduce moisture and air, preventing mold and pests.
- Filters and clean air blower systems remove physical particles such as dust.
- High grade packaging materials prevent the transfer of unwanted chemicals.
- Contamination free contact surfaces (stainless steel, washable) reduce bacterial growth.
- Precision in weighing and product feeding prevents impurities or foreign objects from entering the package.
- Uniform heat sealing keeps the package isolated and increases shelf life.

4

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Comparison of Two Packaging Lines: Conventional Method vs. MAP Method

Choosing the packaging method for dried fruit plays a vital role in maintaining quality, increasing shelf life, and ultimately the success of the product in the market. Understanding the key differences between different approaches helps us make an informed decision.

5

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1. Stretch Wrap Packaging Method

This method involves placing dried fruit in pre-prepared trays. After placing the tray in the machine, the product is packaged manually using a stretch method.

Challenges:

- Higher contamination
- lower speed
- higher labor requirements
- and consequently higher overhead costs and waste
- more errors

2. MAP (MAP Packaging Method):

In this method, the product is filled and then sealed. At this stage, the MAP technique (gas flushing to replace air) or vacuum (complete air evacuation) can be used.

Advantages:

This method typically has a higher production speed, and the cost of packaging materials (bags) is often lower than trays. Variety in bag design also allows for more creative branding. Product shelf life is ensured using MAP or vacuum. This option is highly efficient for high-volume producers and high-traffic markets (such as online sales). It also significantly helps reduce labor and associated costs.

6

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Comparison of Conventional Packaging vs. MAP Packaging

Conventional Packaging (Normal Air Inside the Package):

- High oxygen — Higher likelihood of mold, oxidation, and color change
- Pests remain active more easily
- Shorter shelf life
- Cheaper and simpler, but provides limited protection



MAP Packaging (Air Replaced with Controlled Gases such as Nitrogen):

- Oxygen is reduced — Mold and oxidation drastically reduced
- Quality, color, and flavor remain more stable
- Pests and microbes struggle to grow
- Much longer shelf life than conventional packaging
- Equipment is more expensive, but the result is more professional

7

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Vormek is the knowledge-based company and manufacturer of Tray Sealer packaging machines with a true MAP system in the country, which has been specializing in this field for about 15 years.



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+44 7552 7324 08

+44 7418 3554 99

Revolution in the Fresh and Dried Fruit Industry: The Future of Fruit Marketing in Vacuum Seal Packaging

In recent years, the fruit industry has entered a new phase due to changing consumer expectations and increasing market competition. Today, customers do not only pay attention to product quality, but factors such as hygiene, shelf life, ease of transport, and visual appeal also play an important role in their purchasing decisions. In this context, packaging technology using tray sealer machines has become one of the most important tools for marketing and value creation in the fresh and dried fruit industry.



In modern marketing, packaging is considered the "silent seller" of the product. Research shows that a significant portion of consumers' purchase decisions are made in front of store shelves. Vacuum seal packaging, with its professional and transparent appearance, not only showcases the actual quality of the fruit but also increases consumer trust and enhances the perceived value of the product. This allows brands to position their products at a higher level compared to competitors.

One of the most important advantages of vacuum seal fruit packaging technology is the creation of a tamper-evident seal. This feature assures the customer that the product has remained completely hygienic and untouched from the time of packaging until the moment of purchase. Increased customer trust directly affects brand loyalty and repeat purchases.

Modified Atmosphere Packaging (MAP) and vacuum technologies, by controlling oxygen and moisture inside the package, increase the shelf life of fruit and reduce waste caused by product spoilage. This enables producers to expand their market, export to more distant destinations, and better manage their supply chain.

Furthermore, the surface of the packaging film can serve as a platform for direct communication with the customer. Printing logos, advertising messages, nutritional information, and QR codes on the sealed film transforms packaging from a mere protective tool into an effective marketing medium.



Ultimately, Tray Sealer machines are not just packaging machinery; they are strategic tools for enhancing brand value, improving customer experience, reducing waste, and developing domestic and export markets. The future of fruit marketing depends on the integration of intelligent packaging technology with modern marketing principles where packaging is not the end of the production process, but the beginning of the brand's relationship with the consumer.



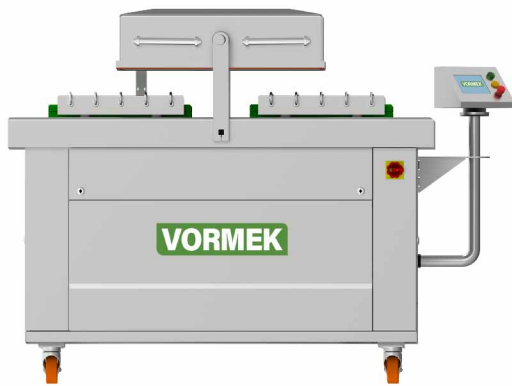
Strong Structure;

The Beating Heart and Secret of Durability & Precision in Vacuum Sealing Machines



Mr. Alexander Hoffmann
(Deputy CEO of Vormek)

The structure (body frame) of a machine is one of the most critical factors determining the performance, precision, durability, and final output quality of vacuum sealing machines. A robust frame goes far beyond a simple technical feature; it is the very foundation of the machine's overall stability.



When the structure is weak, continuous operational pressures cause the machine body to gradually bend or deform over time. This issue leads to misalignment of the conveyor belt, displacement of container-guiding rods and shafts, and consequently, a decline in the final sealing quality.

Furthermore, the strength of the frame has a direct impact on the performance of the vacuum system. The pressure exerted by the cylinders during the sealing and vacuum operations in the absence of a strong structure can create an extremely small gap between the upper and lower sealing jaws.



This results in incomplete vacuum, partial gas leakage, and reduced efficiency of the MAP (Modified Atmosphere Packaging) process. In many similar machines, it has been observed that precisely at the moment of gas injection, a microscopic gap forms between the jaws, which over time impairs the machine's long-term performance.

In summary, the problems arising from the lack of a strong structure include:

- Frame bending, deformation, and component misalignment
- Disruption in movement, reduced speed, and production instability
- Gap formation between jaws, incomplete vacuum, and gas leakage
- Reduced MAP efficiency and compromised sealing quality
- Decreased packaging quality, increased waste, and higher maintenance costs

In essence, a robust and durable structure not only enhances production efficiency, speed, and precision but also ensures that all components remain perfectly aligned, vibration is minimized, and vacuum and gas injection operations are carried out with greater stability and superior quality.

Conclusion:

A high-quality structure is the beating heart of a reliable and long-lasting vacuum sealing machine. Investing in a strong frame reduces long-term maintenance costs, improves packaging quality, and elevates production line productivity to a significantly higher level.



16 Golden Criteria for Selecting the Best Automatic Tray Sealer

Mr. Simon Füllenbach
(CEO of Vormek)

In many food production lines including dairy, protein-based products, ready-to-eat meals, and processed foods packaging goes far beyond aesthetics. A standard packaging solution must fully protect the product, extend its shelf life, and simultaneously maintain production speed. Therefore, selecting the right Tray Sealer is a critical decision that directly impacts final product quality and the operational costs of the production facility.

Unfortunately, many buyers focus solely on production capacity and price when choosing equipment, while overlooking critical factors such as build quality, component selection, control systems, safety standards, and operational precision all of which determine the true long-term value of the machine.

Below, we have summarized the most important considerations to evaluate before making a purchase:

1. Robust Frame – The First Sign of Quality

A strong, well-engineered frame is the first indicator of a high-quality machine. A rigid frame prevents vibration during operation and ensures the precision of all moving components. The use of stainless steel not only extends the machine's lifespan but also enables reliable operation in humid and industrial environments without risk of corrosion.

2. Well-Designed Electrical Panel Placement

The positioning of the electrical panel is of particular importance. Locating it in a cool, safe area away from heat sources reduces wear on electrical components and simplifies maintenance. Additionally, standardized and organized wiring prevents electrical noise and operational interference.

3. Smooth Film Feeding

Proper and smooth operation of the film transport rollers is a key factor in final packaging quality. Industrial-grade bearings and precision rollers ensure smooth film movement without wrinkling, tearing, or stoppages, maintaining the visual quality of packages throughout the production shift.

4. Precise Film Tension Control

Inadequate tension control leads to wrinkling, tearing, and increased waste. An intelligent tension control system continuously adjusts the applied force, preserving packaging quality and optimizing film consumption.

5. Easy Film Roll Replacement

In production lines, every minute of downtime is costly. A well-designed roll holder, featuring a pneumatic shaft and standard braking system, enables quick roll changes and ensures production continuity.

6. High-Precision Photocell Sensor

For printed packaging materials, accurate registration mark detection by the photocell sensor is essential. This precision ensures error-free cutting, preserving visual appeal while minimizing material waste.

7. High-Quality Control Switches and Components

The use of industrial-grade switches and pushbuttons resistant to moisture, dust, and continuous operation extends the machine's service life. Ergonomic design of these components also improves operator efficiency and safety.

8. Advanced Automation

The integration of an industrial PLC (Programmable Logic Controller) and precision control software ensures seamless coordination between all machine components. Touchscreen interfaces with user-friendly operation allow rapid parameter adjustments, while software upgradeability preserves the machine's value over time.



9. Standard Electrical Panel

The electrical panel serves as the machine's command center. The use of certified components, adequate ventilation, and standard protection systems significantly reduces the risk of electrical faults.

10. Intelligent Temperature Control with PID System

Sealing quality depends on uniform and precise temperature control. The PID (Proportional-Integral-Derivative) system prevents temperature fluctuations, enhances seal quality, reduces energy consumption, and extends the lifespan of heating elements.

11. Safety as a Top Priority

An ideal industrial machine must ensure operator safety alongside high efficiency. The presence of safety sensors, emergency stop buttons, warning systems, and standard protective guards minimizes the risk of accidents.

12. Genuine Engineering Design

Machine quality is not limited to its external appearance. Design based on precise engineering calculations ensures long-term performance with minimal wear and no degradation in quality.

13. Precise Pneumatic System

Smooth cylinder operation, precise solenoid valve response, and correct air pressure settings enable fast and stable sealing operations.

14. Standard Bearing System

The use of high-quality industrial bearings with proper lubrication reduces friction and vibration, preventing premature component wear.

15. Packaging Precision

Perfect synchronization between mechanical components and control systems enables consistent, leak-free packaging while maintaining product weight accuracy. This also allows for adjustment to accommodate various container types.

16. Speed That Does Not Compromise Quality

High speed is only valuable when paired with consistent quality. A professional machine must be capable of operating continuously for hours without increased waste or diminished quality.

Conclusion

Selecting a Tray Sealer should not be based solely on price and production capacity. Factors such as build quality, operational precision, automation level, safety, component durability, and technical support are the true criteria for evaluating a machine's value. Investing in equipment designed on sound engineering principles not only reduces maintenance costs but also enhances packaging quality and ensures long-term productivity for the production line.



Vormek – Committed to Quality, Innovation, and Value Creation.

Modified Atmosphere Packaging (MAP); An Effective Solution for Extending Shelf Life and Preserving Food Quality

Ella Brooks

Today, consumers are more conscious than ever about purchasing fresh, high-quality foods free from artificial preservatives. In response to this growing demand, Modified Atmosphere Packaging (MAP) has become one of the most effective preservation technologies in the food industry. By replacing the air inside a package with a carefully controlled mixture of gases such as Carbon Dioxide (CO₂), Nitrogen (N₂), and, in some applications, Oxygen (O₂), MAP slows down spoilage while preserving the product's flavor, color, texture, and nutritional value for a longer period.

Traditionally, packaging served primarily as a means of protecting products during storage and transportation. Today, however, maintaining freshness and quality until the moment of consumption has become one of the industry's highest priorities. At the same time, increasing food waste and the economic losses associated with product spoilage have encouraged manufacturers to adopt advanced packaging technologies. By creating a controlled atmosphere inside the package, MAP effectively inhibits microbial growth and oxidative reactions, significantly extending product shelf life.

The effectiveness of MAP depends on the proper adjustment of the gas composition within the package. Carbon dioxide (CO₂) is the primary antimicrobial gas used in MAP, inhibiting the growth of many bacteria, molds, and yeasts. Nitrogen (N₂), an inert gas, replaces Oxygen to minimize oxidation and maintain product quality. In some applications, a controlled amount of Oxygen (O₂) is intentionally retained to preserve the natural color or other desirable characteristics of specific food products. Therefore, selecting the appropriate gas mixture is critical to the success of the MAP process.

Several types of packaging equipment are commonly used for MAP applications, including tray sealers, Thermoforming machines, and Vacuum Chamber systems. Equally important is the selection of suitable packaging materials. High-barrier packaging films are essential because they maintain the modified atmosphere inside the package and prevent oxygen from entering. For this reason, multilayer barrier films are widely used throughout the food packaging industry.

MAP technology is applied to a broad range of food products, including fresh meat, poultry, seafood, fresh fruits and vegetables, dried fruits and nuts, coffee, snack foods, bakery products, confectionery, and various dairy products. One of its greatest advantages is its ability to significantly extend shelf life without relying on chemical preservatives, allowing manufacturers to meet consumer demand for more natural products.

However, the success of MAP depends on much more than selecting the right gas mixture. Comprehensive quality control throughout the packaging process is equally important. Factors such as temperature management, seal integrity, packaging film selection, and continuous monitoring of the package atmosphere must all be carefully controlled to ensure optimal performance.

Key Factors for Successful MAP Implementation

Critical Factor	Importance
Appropriate gas composition	Extends shelf life while preserving product quality
High-barrier packaging film	Prevents oxygen ingress and maintains the modified atmosphere
Strong and reliable package sealing	Prevents gas leakage and maintains package integrity
Temperature control and cold chain management	Ensures the effectiveness of the modified atmosphere throughout storage and distribution
Regular monitoring of package gas composition	Verifies the proper performance of the packaging system
Operator training	Reduces operational errors and improves packaging consistency

Conclusion:

Modified Atmosphere Packaging has become one of the most valuable technologies in the modern food industry for preserving product quality, reducing food waste, and improving market competitiveness. In addition to extending shelf life, MAP enables manufacturers to access broader domestic and international markets by delivering products that maintain their freshness and quality throughout the supply chain.

Investing in MAP technology is not simply an investment in packaging it is an investment in product quality, operational efficiency, and the future of the food industry.



Arcadia;

A Successful Example of High-Efficiency Production and Long Lasting Packaging. The Result of Combining Vacuum and Gas Injection

Continuing the after sales service unit's interviews, this time we spoke with Ms. Claire Anderson from the technical unit of Arcadia collection. This company, managed by Mr. Michael Thornton, operates in the production and packaging of various types of dried fruits. By utilizing packaging machines from Vormek Company, it has been able to significantly increase its production capacity, shelf life, and product quality. Arcadia collection currently uses three packaging machines and produces and packages approximately 20,000 packages of dried fruit per day in a 9hour work shift. According to Ms. Anderson, during times of increased orders, by extending production hours, the collection's capacity reaches 30,000 packages or even more. This high production capacity allows the company to meet market demand during peak periods.

In the packaging section, products are prepared for distribution using different methods depending on type and weight. Larger packages are sealed with 35–40% vacuum, while for smaller packages, Nitrogen gas injection is used in addition to vacuum. This combination helps maintain product quality, prevent discoloration and texture changes, and preserve the freshness of dried fruits for extended periods.

One of the most important results of using this technology has been a dramatic increase in product shelf life. While the normal shelf life of the company's products is about 6 months, the use of vacuum and Nitrogen gas injection has increased shelf life to over 2 years. This advantage not only preserves product quality but also provides better conditions for storage, distribution, and sales over longer timeframes. Currently, three operators are responsible for operating the three machines, and the packaging process is carried out with high speed, precision, and order. According to Ms. Anderson, using this type of packaging has had a positive impact on the company's profit margin, and the final product quality has noticeably improved.

Arcadia products are currently distributed in various stores. Notably, no returns have been reported due to packaging quality, package seal opening, or product damage. This indicates the stable performance of the machines and high market satisfaction with the final product quality.

In conclusion, Ms. Anderson stated, expressing the company's satisfaction with the machine performance:

"Vacuum and gas injection have had a tremendous impact on preserving the quality of dried fruit. Today, we bring our products to market with greater confidence, and customer satisfaction along with zero product returns is the best result we have received from this type of packaging. Additionally, the high production capacity and stable machine performance allow us to comfortably meet market demand during peak order periods."



2026

June 2-5
Junio 2-5

EXPO SANTA FE
CDMX - MÉXICO

EXPO PACK México 2026;

Shaping the Future of Packaging in Latin America

Every two years, Mexico City becomes the pulsating heart of Latin America's packaging industry. EXPO PACK México 2026, held from June 2–5 at Expo Santa Fe and organized by PMMI, not only solidified its position as the region's premier specialized event but, with a remarkable 15% growth in professional visitors compared to the previous edition (2024), signaled an imminent transformation across the sector.

The event attracted over 20,000 professional visitors and 700 international exhibitors, showcasing an unprecedented diversity of innovative solutions. These solutions are no longer solely focused on speed or waste reduction but address three simultaneous market demands: intelligence, sustainability, and supply chain resilience.

Technological Pillars: From Automation to Circular Economy

This edition saw exhibitors concentrating on system integration, with significant advancements in advanced tray sealers, high-speed thermoforming machines, next-gen vacuum systems, and Modified Atmosphere Packaging (MAP) technology. However, the most notable trend was the extensive presence of Industry 4.0 solutions, including smart sensors, Industrial IoT (IIoT), and real-time data control systems, transforming production lines from reactive to predictive management.

Alongside digitalization, sustainability emerged as a business imperative, not just an ethical choice. Over 30% of exhibitors showcased renewable materials, mono-material packaging, and solutions to reduce petroleum-based polymer consumption—reflecting the industry's commitment to aligning with stringent EU and North American environmental regulations.

A Strategic Platform Amidst Real Challenges

Undoubtedly, EXPO PACK México serves as the gateway to Latin America's high-potential market, offering an unparalleled platform for direct engagement between decision-makers in the food, pharmaceutical, and cosmetic industries and technology providers. However, field reports from the exhibition highlight structural challenges, including currency volatility, complex customs regulations across countries, and a shortage of skilled labor for operating sophisticated machinery. Industry analysts at the event noted that brands offering local technical support and training programs, alongside machinery, are better positioned to capture significant market share.

Carlos Méndez, Sales Director at a leading international packaging firm, told our correspondent: "EXPO PACK México is more than a technology showcase; it's where you truly understand the customer needs in this region. This year, buyers are looking for machinery that is both smart and energy-efficient, delivering maximum output with minimal consumption."

VORMEK's Strategic Presence in Market Development

Among the prominent exhibitors, the VORMEK Group, a world-renowned specialist in MAP technology, tray sealing, thermoforming, and vacuum systems, had a focused and impactful presence. Beyond showcasing their latest IoT-enabled machinery, the company unveiled plans to expand their distribution network across Mexico, Brazil, and Colombia. VORMEK's focus on hybrid solutions machinery combined with eco-friendly consumables garnered particular interest from visitors in the food and pharmaceutical sectors.

Future Outlook: Transitioning from Efficiency to Resilience

With a 15% increase in visitors and a 20% rise in international exhibitors compared to 2024, EXPO PACK México 2026 can be viewed as a macro-economic indicator of the packaging industry's health in the Americas. Yet, the defining trend for the future is the industry's shift from a purely "efficiency-driven" approach to a "resilient and sustainable" model where intelligent packaging not only extends product shelf life but also acts as a key enabler of the circular economy, creating value beyond mere containment. As the event concludes, investment in Industry 4.0 production lines and eco-friendly materials is expected to accelerate across Latin America over the next two years, promising that EXPO PACK México 2028 will set even higher benchmarks for the industry.



Advancing Freeze-Drying Technology for Long-Life Food Products



I am Dr. Adrian Sterling, CEO of NovaFreeze Tech Innovations and founder of the "Onsho" brand.

We started our activity in the field of freeze-dried products since 2017. In this method, products are processed using freeze-drying technology; a process in which the moisture content of the product is reduced to about 2-5%, allowing for long-term shelf life without significant loss of quality.

One of the most important advantages of freeze-dried products is that they retain a significant portion of their nutritional value, color, taste, and aroma. Additionally, these products have rehydration capability, and in many cases, after adding water, they can largely return to their original characteristics.

Over the years of our activity, and we have been able to provide these companies with products and solutions based on freeze-drying technology.

In addition to the domestic market, our products are exported to GCC countries, CIS countries, and the Kurdistan Region of Iraq (Erbil), which reflects the quality and competitiveness of these products in international markets.

Freeze-drying is applicable to a wide range of products including fruits, protein products, ice cream, vegetables, ready-to-eat meals, and many other food products, and is recognized as one of the most advanced methods for extending shelf life and preserving product quality.

In this company, we strive to utilize this technology to produce and offer products with high added value, superior quality, and the ability to be supplied in both domestic and export markets.



From Production Line to Retail Shelf; A Decade of Reliable Packaging Performance with the Vormek Tray Sealer

Jonathan Blake, CEO of Golden Valley

For more than a decade, Golden Valley has specialized in producing and packaging premium dried fruits, vegetables, and herbs. Throughout these years, maintaining consistent product quality, extending shelf life, and delivering attractive retail packaging have remained our highest priorities.

Several years ago, we invested in an automatic Vormek Tray Sealer Machine to modernize our packaging operations. Since then, the machine has become an essential part of our production line, handling the packaging of our dried fruit products with exceptional consistency and reliability.

Our experience with the Vormek system has been highly positive. The machine delivers stable sealing performance, precise packaging quality, and dependable day-to-day operation, enabling us to maintain uninterrupted production while achieving a consistently professional package appearance.

One of the most valuable benefits has been the noticeable improvement in product preservation. By combining precision sealing with Modified Atmosphere Packaging (MAP) technology, our products retain their natural freshness, aroma, texture, and flavor for a significantly longer period than with conventional packaging methods.

This improvement has not only enhanced product quality but has also strengthened customer satisfaction and increased confidence in our brand. The extended product freshness has reduced product returns, minimized waste throughout the supply chain, and provided greater flexibility in distribution and retail operations.

Equally important, the hygienic design, engineering quality, and operational stability of the Vormek Tray Sealer have contributed to higher production efficiency while reducing downtime and routine maintenance requirements.

Looking back, choosing Vormek was more than purchasing a packaging machine; it was a strategic investment in product quality, production reliability, and long-term business growth.

Today, after years of continuous operation, we remain confident in our decision and highly recommend Vormek to food manufacturers seeking a professional, reliable, and future-ready packaging solution.

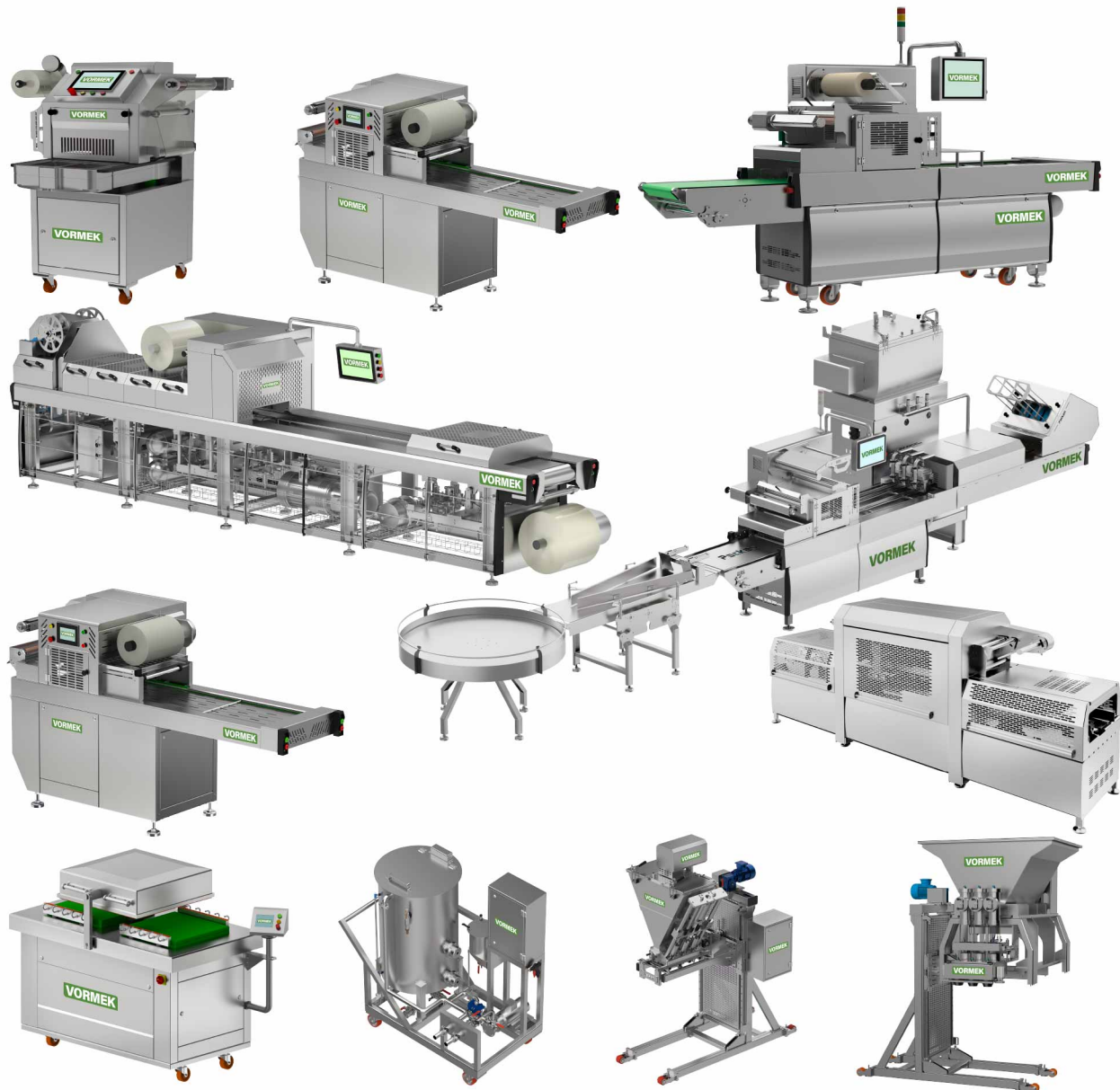


The Importance of Using Tray Sealer, Thermoforming, and Vacuum Chamber Machines in Today's Packaging Industries

Not too long ago, food packaging was simple and inefficient. Products were placed in a container, covered with a layer of film, and it was hoped they would remain safe until consumption. Reality, however, was different: short shelf life, inconsistent quality, an unprofessional appearance, and contamination risks that often went unnoticed by operators. Today, expectations have changed. Consumers no longer buy food based solely on taste and freshness; they also value attractive packaging, hygiene, and extended shelf life. Manufacturers who still rely on traditional packaging methods find themselves at a disadvantage when competing with industries that embrace modern technologies.

Fortunately, today's innovations have addressed these challenges. Tray sealers offer easy operation and simple maintenance while enabling the packaging of a wide range of food products. They help extend shelf life and give products a professional, appealing appearance. Thermoforming machines go a step further by forming containers, filling, and packaging products within a single integrated process. Vacuum chamber systems remove air completely, preserving freshness, enhancing food safety, and significantly extending product shelf life. In addition, packaging lines equipped with these machines and a variety of optional features make the packaging process more efficient, hygienic, and faster.

This technological integration elevates product packaging, modernizes production processes, and positions your brand as a trustworthy and forward thinking business in the minds of customers. Packaging is not merely the final step in production; it is a window through which customers perceive your expertise, commitment to quality, and reliability.



We warmly invite you, our dear audience, to share your topics of interest with us. Your opinions and suggestions not only help enrich our content but also guide us in providing more practical material to meet your needs. **Would you like to read a report about a specific industry or a special technology in the field of packaging?**

Share your thoughts with us so we can cover them in upcoming editions.