

# DATA ANALYSIS REPORT

July 2022 to April 2024



Prepared in April 2025 by:

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# Table of Contents

## [Introduction](#)

## [Key Revenue Streams Analysis](#)

### [Key Customers](#)

### [Key Products](#)

### [Key Categories](#)

### [Revenue Hotspots](#)

## [Customer and Product Dynamics](#)

### [Customer Loyalty](#)

#### [New Customers](#)

#### [Non-Returning Customers](#)

#### [Dormant Customers](#)

#### [Regular Customers](#)

### [Product Lifecycle](#)

### [Price Point Analysis](#)

## [Operational Efficiency](#)

### [Inventory Management](#)

#### [Immediate Reorder Needed](#)

#### [Risking Stockout: Adequate Stock](#)

#### [Risking Stockout: On Order](#)

#### [Excess Inventory: Discontinued Products](#)

#### [Excess Inventory: Adequate Stock in Excess of 90 days](#)

#### [Recommendations](#)

### [Shipping Carrier Performance](#)

#### [Fastest Shipping Carrier](#)

#### [Most Cost-Effective Shipping Carrier](#)

#### [Balanced Performance](#)

## [Trends and Forecasting](#)

### [Profitability Trend](#)

### [Sales Volume](#)

### [Operational Costs](#)

### [Demand Forecasting](#)

## [Strategic Recommendations](#)

# Introduction

Snack Attack Shack is a family-run business, specializing in the import and export of exotic snacks from around the globe. As the business continues to grow, leveraging data-driven insights is critical for understanding performance, optimizing operations, and identifying new opportunities. The primary objectives of this analysis are to:

- **address specific business questions** aimed at enhancing revenue, profitability, and operational efficiency.
- **uncover patterns and trends** in the data that provide actionable insights.
- **support strategic decision-making** for long-term growth and success.

This report focuses on analyzing Snack Attack Shack's sales and operations data from July 2022 to April 2024. For accuracy, May 2024 data, consisting only of partial records, has been excluded from this analysis to ensure time-based calculations remain consistent and reliable.

## Key Revenue Streams Analysis

Understanding the drivers of revenue is essential for focusing strategic efforts on the most impactful areas of the business. In this section, I examine the distribution of revenue across customers, products, categories and location to identify the top contributors and opportunities for growth.

### Key Customers

Through detailed analysis, I have uncovered that a subset of 25 customers, making up just 28.1% of the total 89 customers, accounts for 69.63% of total revenue. This highlights a strong concentration of business among a select group of high-value customers:

	Customer	Revenue	% of Total	Cumulative
1	QUICK-Stop	110,277.31€	8.84%	8.84%
2	Save-a-lot Markets	100,031.55€	8.02%	16.86%
3	Ernst Handel	99,656.98€	7.99%	24.85%
4	Hungry Owl All-Night Grocers	49,979.91€	4.01%	28.86%
5	Rattlesnake Canyon Grocery	49,842.08€	4.00%	32.85%
6	Hanari Carnes	32,841.37€	2.63%	35.49%
7	Königlich Essen	30,908.38€	2.48%	37.97%
8	Folk och fä HB	29,567.56€	2.37%	40.34%
9	Mère Paillard	28,872.19€	2.31%	42.65%

	Customer	Revenue	% of Total	Cumulative
10	Frankenversand	26,656.56€	2.14%	44.79%
11	White Clover Markets	26,434.86€	2.12%	46.91%
12	Berglunds snabbköp	24,927.58€	2.00%	48.91%
13	Suprêmes délices	24,088.78€	1.93%	50.84%
14	Queen Cozinha	23,690.42€	1.90%	52.74%
15	Piccolo und mehr	23,128.86€	1.85%	54.59%
16	HILARION-Abastos	22,768.76€	1.83%	56.42%
17	Bon app'	21,170.50€	1.70%	58.11%
18	Bottom-Dollar Markets	20,801.60€	1.67%	59.78%
19	Richter Supermarkt	18,845.68€	1.51%	61.29%
20	Blondesddsl père et fils	18,534.08€	1.49%	62.78%
21	Great Lakes Food Market	18,507.45€	1.48%	64.26%
22	Lehmanns Marktstand	17,631.44€	1.41%	65.68%
23	Simons bistro	16,585.01€	1.33%	67.01%
24	LINO-Delicateses	16,476.57€	1.32%	68.33%
25	Seven Seas Imports	16,215.33€	1.30%	69.63%
<b>Total</b>		<b>868,440.79€</b>	<b>69.63%</b>	

Focusing on this core group of customers presents an opportunity to develop tailored retention strategies and maximize their value to the business.

## Key Products

In analyzing the product portfolio of Snack Attack Shack, I discovered a clear concentration of revenue among a subset of high-performing products. The top 25 products, making up just 32.47% of the total 77 products, account for 68.20% of total revenue. This highlights the importance of strategically managing these key products to maximize profitability. The top 25 products are:

Product	Revenue	% of Total	Cumulative
Côte de Blaye	141,396.74€	11.34%	11.34%
Thüringer Rostbratwurst (discontinued)	80,368.67€	6.44%	17.78%
Raclette Courdavault	71,155.70€	5.70%	23.48%
Tarte au sucre	47,234.97€	3.79%	27.27%
Camembert Pierrot	46,761.56€	3.75%	31.02%
Gnocchi di nonna Alice	42,593.06€	3.41%	34.44%
Manjimup Dried Apples	41,819.65€	3.35%	37.79%
Alice Mutton (discontinued)	29,995.68€	2.40%	40.19%
Carnarvon Tigers	29,171.88€	2.34%	42.53%

Product	Revenue	% of Total	Cumulative
<i>Rössle Sauerkraut (discontinued)</i>	25,386.56€	2.04%	44.57%
Mozzarella di Giovanni	24,900.13€	2.00%	46.56%
Sir Rodney's Marmalade	22,485.60€	1.80%	48.37%
Ipoh Coffee	22,119.10€	1.77%	50.14%
Gudbrandsdalsost	21,942.36€	1.76%	51.90%
Uncle Bob's Organic Dried Pears	21,588.30€	1.73%	53.63%
Ikura	20,836.34€	1.67%	55.30%
NuNuCa Nuß-Nougat-Creme	19,849.14€	1.59%	56.89%
<i>Perth Pasties (discontinued)</i>	19,836.17€	1.59%	58.48%
Flotemysost	19,551.03€	1.57%	60.05%
Boston Crab Meat	17,910.63€	1.44%	61.49%
Lukas' leckere Sauerteigweggla	17,570.96€	1.41%	62.89%
Pâté chinois	17,292.00€	1.39%	64.28%
Vegie-spread	16,701.10€	1.34%	65.62%
Pavlova	16,452.51€	1.32%	66.94%
Lakkalikööri	15,729.84€	1.26%	68.20%
<b>Total</b>	<b>850,649.67€</b>	<b>68.20%</b>	

By optimizing inventory management, pricing strategies, and marketing efforts for these core products, Snack Attack Shack can further strengthen its position in the exotic snack market.

## Key Categories

Analyzing Snack Attack Shack's product categories reveals a notable concentration of revenue among its top contributors. The top 3 categories—Beverages, Dairy Products, and Confections—account for 53.12% of total revenue, while extending the analysis to include Meat/Poultry raises this to 65.89%. This highlights the critical importance of these categories to the business's success. Top 4 categories are:

Category	Revenue	% of Total	Cumulative
Beverages	259,397.12€	20.80%	20.80%
Dairy Products	233,711.17€	18.74%	39.53%
Confections	169,430.17€	13.58%	53.12%
Meat/Poultry	159,335.51€	12.77%	65.89%
<b>Total</b>	<b>821,873.96€</b>	<b>65.89%</b>	

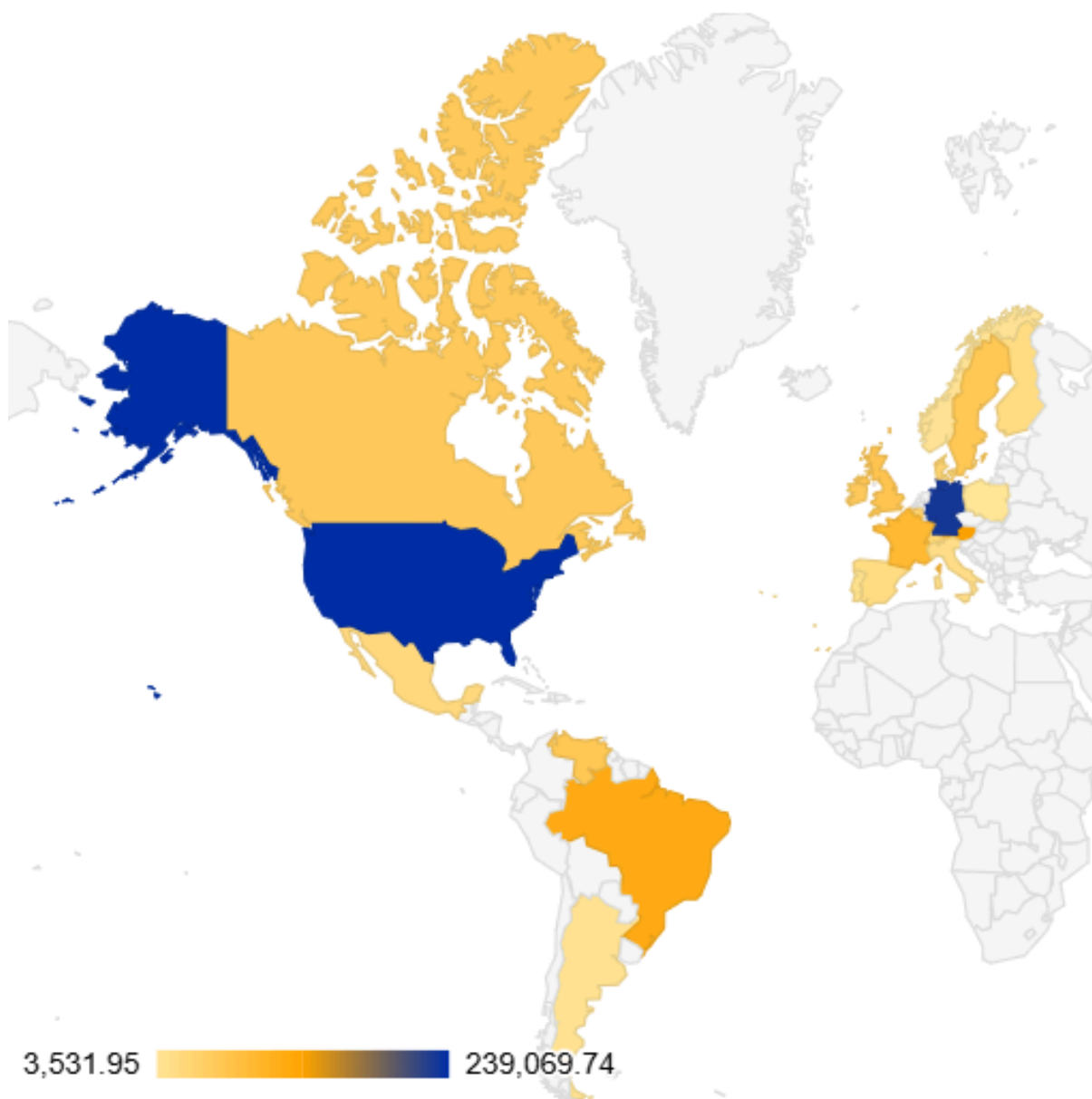
By focusing on these top-performing categories, Snack Attack Shack has an opportunity to further expand its product offerings. Introducing new and innovative

products within these categories could attract additional customers, increase market share, and ultimately drive higher revenue.

## Revenue Hotspots

Snack Attack Shack is represented in 21 countries worldwide. Analyzing country-level performance reveals that a select group of six countries dominates revenue generation, collectively contributing 66.92% of total revenue while accounting for just 28% of the countries. This disproportionate concentration highlights the strategic importance of these markets.

The below heat map illustrates the significance of the USA, Germany, Austria, Brazil, France, and the UK driving revenue:



The top-performing cities within each of these countries further reveal key urban centers driving revenue:

Country	Top City	City Market Share	Country Revenue (€)	% of Total Revenue
USA	Boise	41.84%	239,069.74€	19.17%
Germany	Cunewalde	48.25%	228,567.81€	18.33%
Austria	Graz	81.16%	122,785.84€	9.84%
Brazil	Rio de Janeiro	49.53%	104,898.70€	8.41%
France	Marseille	26.28%	80,397.57€	6.45%
UK	London	89.58%	58,971.31€	4.73%

This illustrates the dual concentration of revenue, both at the country and city levels. Notably:

- **Graz in Austria** accounts for an overwhelming **81.16% of Austria's revenue**, indicating a potential dependency on this single market.
- **London in the UK** similarly dominates with **89.58% of UK revenue**, showcasing its critical importance.

Focusing on these Revenue Hotspots—both at the country and city level—presents opportunities to:

1. Deepen penetration in these key cities with tailored product offerings and marketing strategies.
2. Diversify within countries to mitigate risks associated with over-reliance on a single city.
3. Expand to underperforming cities with untapped potential.

## Customer and Product Dynamics

Understanding the interplay between customer behavior and product performance is crucial for driving revenue growth and sustaining long-term business success. This section delves into the dynamics that shape Snack Attack Shack's operations, focusing on product lifecycle patterns, customer loyalty trends, and pricing strategies. By analyzing discontinued products, evaluating the contribution of repeat versus new customers, and assessing the performance of various price points, I uncover actionable insights that can guide strategic decisions and unlock new growth opportunities.

## Customer Loyalty

To analyze customer behavior and identify loyalty patterns, I used a classification system based on purchase frequency, engagement recency, and order history. Each customer was categorized into one of four classes using the following logic:

- **New:** Customers whose first order was placed within the 120 days preceding the end of the range (30 April 2024), regardless of the total orders placed.
- **Non-Returning:** Customers who placed up to 2 orders, with their most recent order more than 180 days before the end of the range (30 April 2024).
- **Dormant:** Customers with multiple orders:
  - who had at least one gap between orders exceeding 365 days, and
  - who did not make a purchase in the 180 days preceding the end of the range (30 April 2024).
- **Regular:** Customers with multiple orders:
  - who maintains consistent activity, with all order gaps less than or equal to 365 days, and
  - who made at least one purchase in the 180 days preceding the end of the range (30 April 2024).

This classification framework allowed me to segment customers based on their behavior over time, providing insights into loyalty trends and activity levels.

## New Customers

**Finding:** One new customer, ***La corne d'abondance***, who generated a total revenue of 1,992.05€ across 4 orders in the last 120 days. This customer shows promising engagement, with an average revenue per order of 498.01€ and a short purchase frequency of 49 days.

**Recommendation:** Focus on nurturing this customer to establish long-term loyalty, leveraging targeted engagement strategies such as personalized communications or loyalty programs.

## Non-Returning Customers

**Finding:** There are 2 non-returning customers:

- ***Lazy K Kountry Store***: Placed 2 orders totaling 357.00€, with an average revenue per order of 178.50€ and an elapsed period of 344 days since the last order.
- ***Centro comercial Moctezuma***: Placed a single order valued at 100.80€ over 652 days ago.



**Recommendation:** Assess the reasons for disengagement among these customers and explore reactivation opportunities.

## Dormant Customers

**Finding:** There are 4 dormant customers with varying levels of revenue and engagement:

- **Mère Paillarde:** High-value customer with total revenue 28,872.19€ across 13 orders, averaging 2,220.94€ per order, but with a purchase gap of 183 days.
- **Familia Arquibaldo:** Total revenue of 4,107.55€ over 7 orders, averaging 586.79€ per order, with a frequency of 162 days.
- **Hungry Coyote Import Store:** Total revenue of 3,063.20€ across 5 orders, averaging 612.64€ per order, with an elapsed period of 235 days.
- **GROSELLA-Restaurante:** Generated 1,488.70€ from 2 orders. After a purchase gap of 1,012 days, a new order was placed within the last 180 days.

**Recommendation:** Prioritize reactivating high-value customers like **Mère Paillarde** with tailored offers or incentives to renew engagement. Although **GROSELLA-Restaurante** aligns more closely with the criteria for Non-Returning customers due to their extended inactivity, the recent order suggests that efforts to re-engage dormant customers may have been successful. Consider analyzing what specific actions contributed to their renewed activity.

## Regular Customers

**Finding:** Of the 82 regular customers who drive significant revenue through consistent engagement, the top three are particularly noteworthy and loyal:

- **QUICK-Stop:** Top contributor with a total revenue of 110,277.31€ across 28 orders, averaging 3,938.48€ per order, with a short purchase gap of 77 days.
- **Save-a-lot Markets:** Revenue of 100,031.55€ from 30 orders, averaging 3,334.39€ per order, with a purchase frequency of 68 days.
- **Ernst Handel:** Revenue of 99,656.98€ over 29 orders, averaging 3,436.45€ per order, with a frequency of 80 days.

**Recommendation:** Continue nurturing regular customers as the backbone of the business by maintaining strong engagement strategies such as loyalty programs, tailored offers, and rewards for frequent purchasing.

The analysis reveals that regular customers overwhelmingly account for the majority of the revenue (96.79%), underscoring their critical role in sustaining the business. The new customer, **La corne d'abondance** stands out with promising engagement despite initial contributions being comparatively small. This highlights the potential for growth in cultivating new customer relationships.

Additionally, reactivating dormant customers remains a valuable opportunity, especially for high-value contributors like **Mère Paillarde**, who have shown strong revenue potential in the past but exhibit waning engagement. Targeted reactivation strategies could help tap into this segment and bolster overall customer loyalty.

Interestingly, very regular customers with short order frequencies do not always correspond to higher total or average revenue, as some high-value customers display fewer, more sporadic orders with significant gaps, yet contribute substantial revenue overall.

## Product Lifecycle

Snack Attack Shack has discontinued 8 of its 77 products, including a mix of high-performing and lower-performing items. This indicates that lifecycle decisions are influenced by factors beyond performance alone.

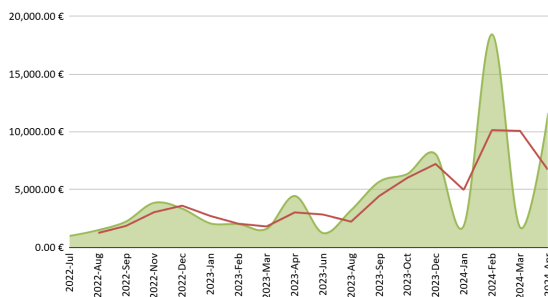
Among the discontinued products, the top four products are notable for being in the top 25 overall revenue earners (refer to [Key Products](#)):

Product	Finding
<b>Thüringer Rostbratwurst</b>	The decline in its moving average occurred only in April, amidst an otherwise upward trend that reflected increasing popularity. Despite being the second-highest revenue generator overall, the product was retired
<b>Alice Mutton</b>	Sales have shown a steady decline since December 2023, with the moving average reflecting a gradual decrease in customer demand.
<b>Rössle Sauerkraut</b>	After a slow February 2024, the product saw a sharp increase in sales, reaching its highest revenue month in April 2024. Its

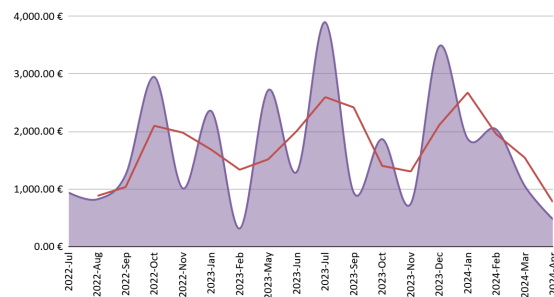
Product	Finding
	moving average is on the rise, suggesting renewed interest before discontinuation.
<b>Perth Pasties</b>	Similar to <b>Rössle Sauerkraut</b> , February 2024 was a slow month, but sales have been steadily increasing since then, indicating resilience in demand.

The following graphs depict the revenue trends over time, showing a decline in the moving average for **Alice Mutton** and a brief dip in April for **Thüringer Rostbratwurst** despite overall popularity:

Product Revenue: Thüringer Rostbratwurst

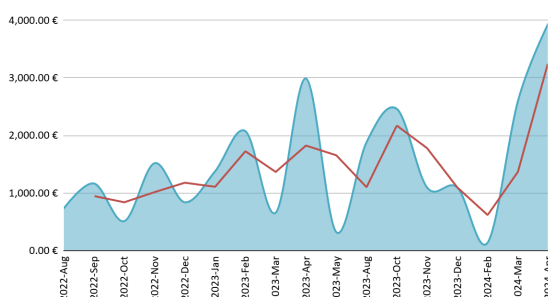


Product Revenue: Alice Mutton

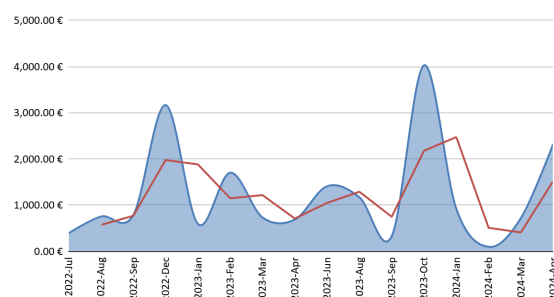


The graphs illustrate stable or increasing trends, with **Rössle Sauerkraut** and **Perth Pasties** showing growth in revenue and an upward moving average:

Product Revenue: Rössle Sauerkraut



Product Revenue: Perth Pasties



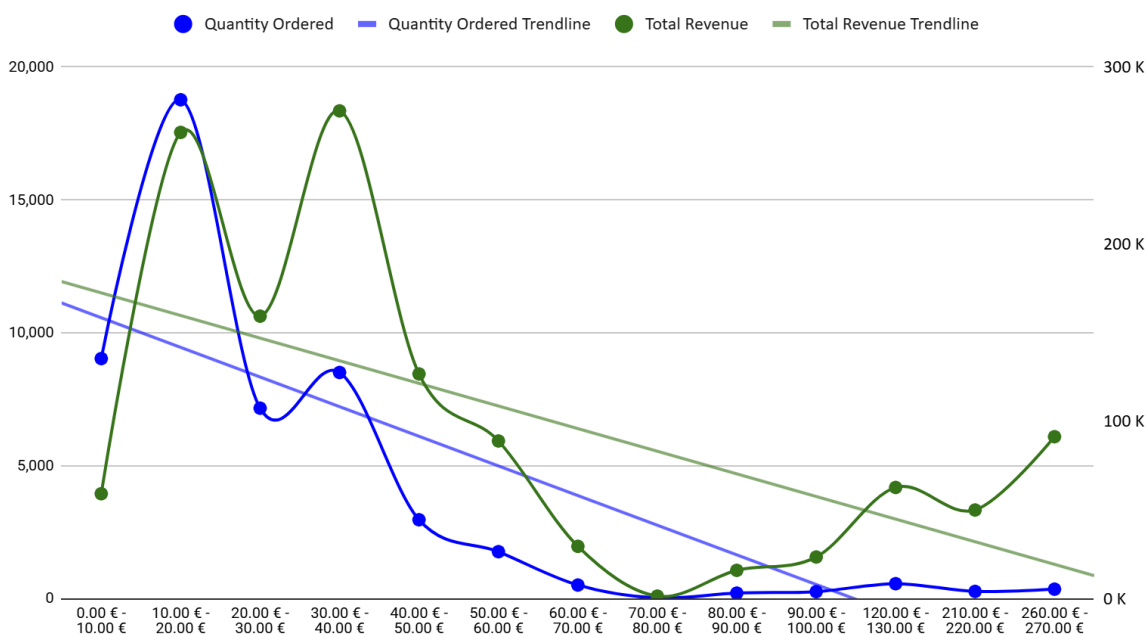
In light of the findings, it is essential to reassess the decision-making framework for product discontinuation to ensure it aligns with demand trends, customer preferences, and operational capabilities. Products like **Rössle Sauerkraut** and **Perth Pasties**, which exhibit stable or increasing sales trends, might merit reconsideration if operational challenges can be resolved, offering potential opportunities to capitalize on sustained customer interest.

## Price Point Analysis

The graph below illustrates the relationship between price brackets, order quantities, and revenue totals. It highlights significant trends across different price ranges:

- **Price Ranges €10.00-20.00 and €30.00-40.00** dominate both revenue and order quantities, emerging as the most successful brackets overall. Together, they capture the sweet spot of customer demand and profitability.
- **Lower Price Brackets (€0.00-10.00)** show high order quantities but modest revenue contributions, indicating reliance on bulk sales.
- **Higher Price Brackets (€40.00+)** exhibit declining order quantities and revenue totals, suggesting limited customer demand for premium-priced products. However, occasional high-revenue outliers within premium ranges may represent niche opportunities.

### Price Point Analysis



This analysis confirms that the **€10.00-40.00 range** balances strong demand with high revenue potential, positioning it as a key focus area for pricing strategies. I recommend conducting a deeper analysis of specific product categories within the €10.00-20.00 and €30.00-40.00 price brackets to better understand demand patterns and identify opportunities for expansion or optimization.

## Operational Efficiency

In this section, I focus on optimizing the processes that drive business performance and reduce costs. Efficient operations are key to maximizing profitability while maintaining customer satisfaction. By analyzing inventory management strategies, I

aim to address stockout risks, excess inventory challenges, and sales velocity for seamless product availability. Additionally, the evaluation of shipping carrier performance highlights opportunities to improve delivery speed, cost-effectiveness, and reliability. Together, these insights contribute to building a streamlined and sustainable operational framework.

## Inventory Management

Efficient inventory management is vital for maintaining consistent product availability and avoiding operational bottlenecks. The analysis conducted focuses on stock levels, sales velocity, and reorder patterns to highlight areas requiring immediate attention.

### Immediate Reorder Needed

Some products have surpassed critical thresholds and require urgent replenishment:

- *Nord-Ost Matjeshering* is already overdue for reorder.
- *Outback Lager's* stock levels will, even with new stock on order, remain below the reorder threshold and a reorder needs to be scheduled within the next week.

### Risking Stockout: Adequate Stock

Several products have sufficient stock but are nearing depletion due to high sales velocity. Reorder actions should be prioritized to maintain availability:

- *Northwoods Cranberry Sauce*
- *Camembert Pierrot*
- *Uncle Bob's Organic Dried Pears*
- *Tarte au sucre*
- *Manjimup Dried Apples*
- *Mozzarella di Giovanni*
- *Cold Brew Nitro*
- *Konbu*
- *Flotemysost*
- *Gudbrandsdalsost*
- *Côte de Blaye*
- *NuNuCa Nuß-Nougat-Creme*
- *Ikura*

To prevent potential stockouts, prioritize initiating replenishment orders for these products immediately.

## Risking Stockout: On Order

Several products awaiting incoming shipments risk stockout within the coming week:

- *Gorgonzola Telino*
- *Sir Rodney's Scones*
- *Longlife Tofu*
- *Scottish Longbreads*
- *Rogede sild*
- *Maxilaku*
- *Chang*
- *Gnocchi di nonna Alice*
- *Mascarpone Fabioli*
- *Queso Cabrales*

Expedite follow-up actions with suppliers to ensure prompt delivery and monitor for shipment delays to avoid extended stockout periods.

## Excess Inventory: Discontinued Products

Discontinued products with ample stock levels should be cleared to optimize storage:

- Consider running promotional campaigns for *Mishi Kobe Niku*, *Singaporean Hokkien Fried Mee*, and *Rössle Sauerkraut*.
- Focus on reducing inventory of *Mishi Kobe Niku*, which is projected to remain in stock for over two months based on current sales trends.

## Excess Inventory: On Order

A few products flagged with excess inventory also have new shipments on order, raising questions about the rationale for reordering. This includes:

- *Chocolade*
- *Gravad lax*

*Chocolade* and *Gravad lax* are particularly noteworthy, as they currently have stock that exceeds 70 and 88 days to stockout, respectively. Incoming shipments will increase the days to stockout period even more. I recommended investigating the reasons behind these reorders to address potential inefficiencies in inventory practices. Areas to explore include:

- Automatic replenishment systems and reorder triggers.
- Forecasting errors or anticipated demand increases that did not materialize.
- Supplier agreements involving minimum order quantities.

## Excess Inventory: Adequate Stock in Excess of 90 days

The following products have stock levels that can last over 90 days at current sales velocity:

- *Grandma's Boysenberry Spread*
- *Röd Kaviar*
- *Valkoinen suklaa*

Being perishable, these products are at great risk of not being sold before or too close to their expiration date. I recommend introducing a system to keep track of and effectively manage expiration dates to minimize the risks associated with expiration. In addition, consider running targeted promotions or marketing campaigns on the overstocked products to increase sales.

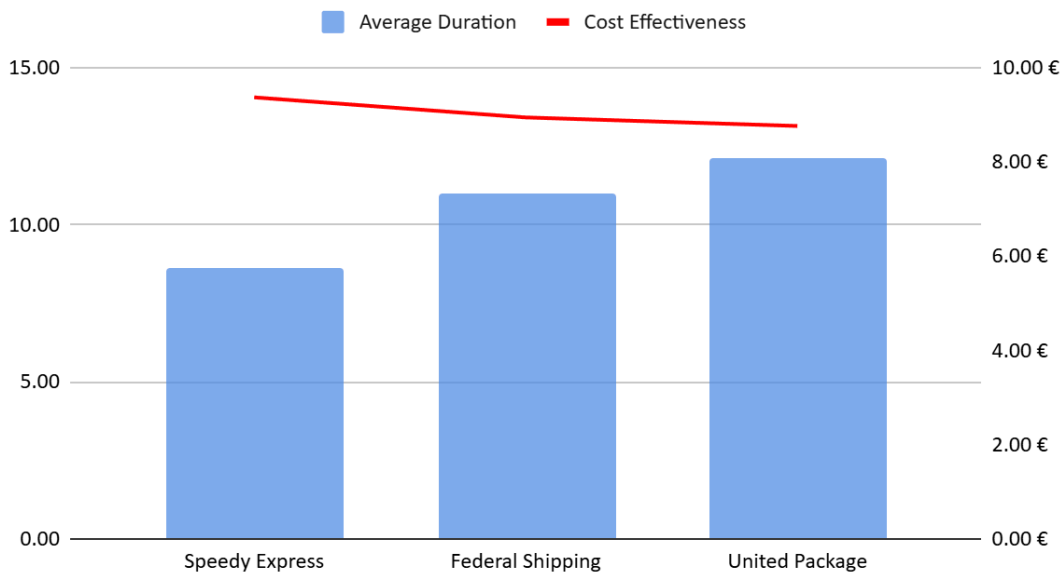
## Recommendations

- Implement priority-based stock replenishment to address high-demand products nearing stockout thresholds.
- Maintain close communication with suppliers to mitigate risks associated with delayed shipments.
- Strategize clearance campaigns for discontinued products and those with over 90 days of stock to free up storage space and optimize cash flow.
- Adjust reorder triggers for products, considering both demand trends and expiration dates to minimize waste.

## Shipping Carrier Performance

The shipping performance analysis evaluates the speed and cost-effectiveness of carriers based on historical shipping data. By comparing average delivery durations and freight costs, I got a visual snapshot of their strengths highlighting the balance between speed and cost, aiding in identifying the most efficient and economical shipping options for various logistics needs:

## Shipping Carrier Performance vs Cost



### Fastest Shipping Carrier

**Speedy Express** with an average delivery duration of 8.64 days is the fastest shipping carrier. Their efficiency makes them an ideal choice for orders requiring quick delivery.

### Most Cost-Effective Shipping Carrier

**United Package** is the most cost-effective carrier, with an average cost of 8.76€ per delivery. Their competitive pricing makes them a practical option for cost-sensitive shipments.

### Balanced Performance

**Federal Shipping** offers a good balance of cost-effectiveness (8.94€) and delivery speed (11 days) and can be considered for shipments where delivery time is less critical.

## Trends and Forecasting

This analysis aims to enhance decision-making by examining historical profitability patterns, profit margins, and growth trends. By uncovering actionable insights into financial performance, the analysis identifies opportunities for optimization and informs future strategies to sustain profitability and growth.

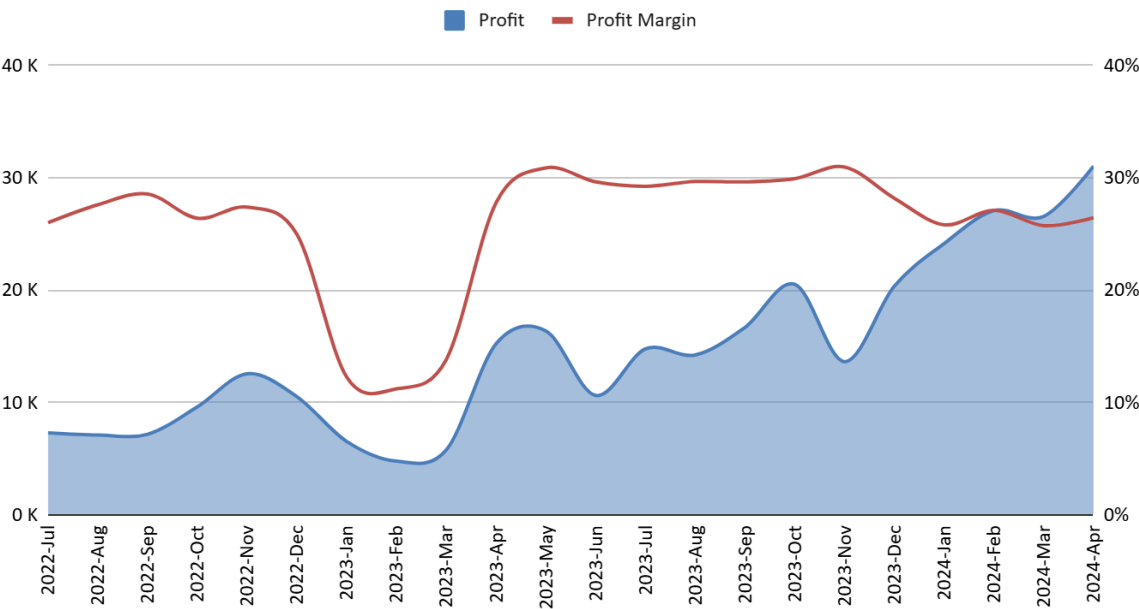


## Profitability Trend

The profitability trend analysis highlights how profit and profit margins have evolved over time. By visualizing fluctuations in financial performance, the analysis uncovers periods of significant growth, areas of concern, and correlations between profit levels and margins. This helps evaluate the effectiveness of operational strategies and pricing decisions.

Below is a visualization of the profit and profit margins from from July 2022 to April 2024. May 2024 has been excluded from this analysis due to partial data availability, ensuring the accuracy and integrity of the trends presented:

Profit and Profit Margin



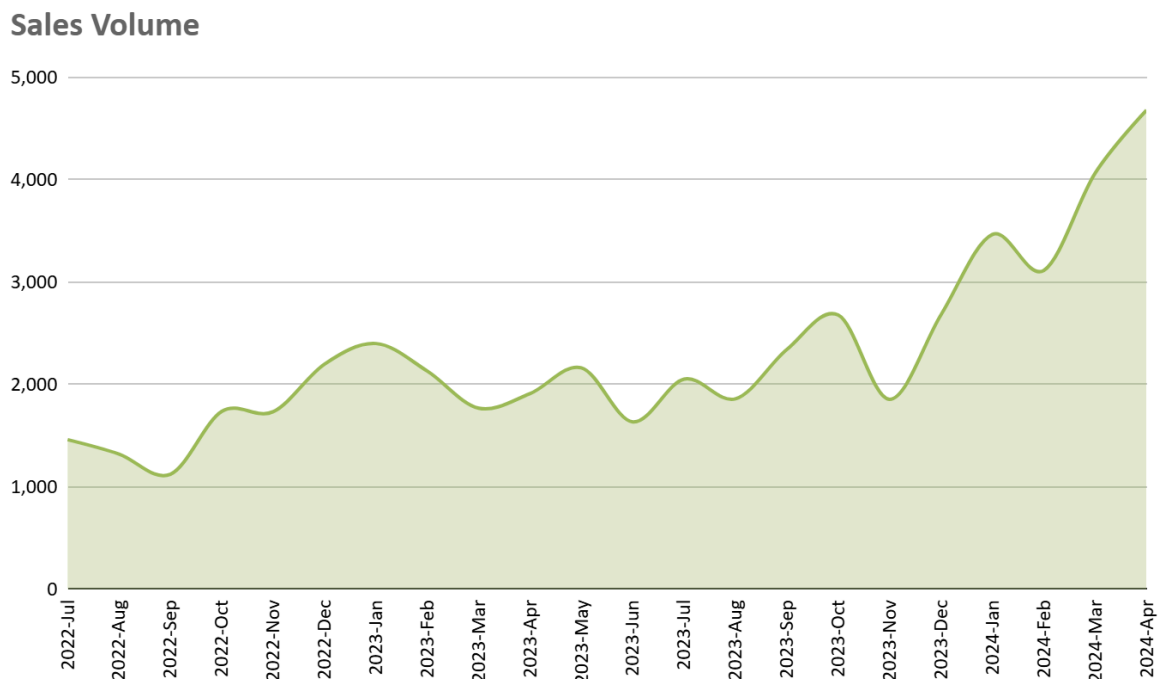
The profitability analysis highlights significant fluctuations in profit and profit margin over time. A sharp decline in profit margins occurred from January to March 2023, reaching a low of 11.23% in February 2023, despite steady profits in the prior months. The profit margin recovered by April 2023, peaking at 30.95% in November 2023.

Profit levels followed a general upward trajectory, culminating in April 2024, which saw the highest recorded profit of 31,028.62€. However, periods of increased revenue and profit, such as January 2023 and the period January to April 2024, appear to correlate with lower profit margins, indicating potential cost pressures or pricing adjustments. These findings highlight the importance of reviewing how the business operates and manages its costs during busy sales periods to ensure it stays profitable.

## Sales Volume

Understanding sales volume trends is critical to uncovering the factors driving changes in profitability. By analyzing sales performance over time, periods of strong or weak demand can be identified and their impact on profit levels and margins evaluated.

The graph below illustrates sales volume trends from July 2022 to April 2024, highlighting fluctuations in unit sales over time:

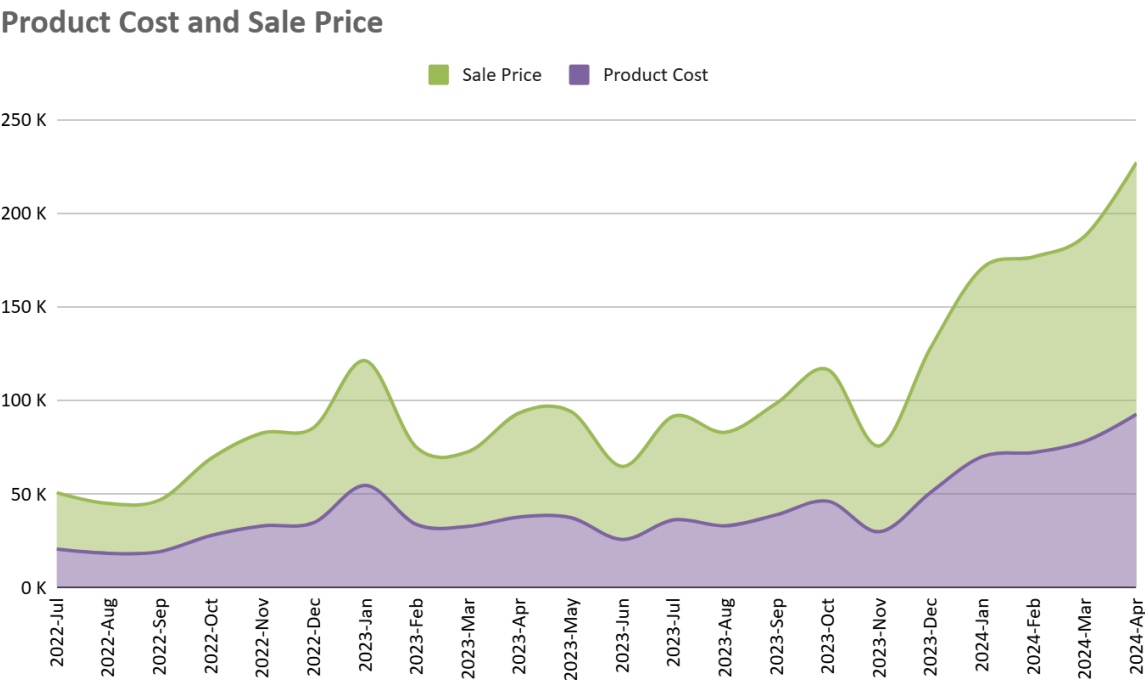


The analysis reveals that while February and March 2023 displayed stable sales volumes, the corresponding decline in profit margins during this period suggests that increased costs or pricing adjustments, rather than sales fluctuations, impacted profitability. In contrast, the significant increase in sales volume starting January 2024 aligns with higher profit levels, indicating that strong sales performance contributed positively to profitability. Additionally, notable periods such as June 2023 and November 2023, which saw dips in sales volumes, may require further investigation to address potential operational or market-related challenges.

## Operational Costs

This analysis explores the relationship between product costs and sale prices over time to understand their impact on profitability. By tracking cost trends alongside revenue, I aim to identify periods of improved cost efficiency, potential challenges, and opportunities for sustaining profitability growth.

The graph below visualizes product cost and sale price trends from July 2022 to April 2024, emphasizing key fluctuations and their role in driving profitability:



The analysis of operational costs reveals several significant findings. From January to April 2024, there is a clear and consistent widening of the gap between product cost and sale price. This trend has contributed significantly to the rise in both profit levels and profit margins, suggesting improved cost management practices and effective pricing strategies. By contrast, the earlier period of January to March 2023 shows a much narrower gap between cost and sale price, which aligns with the observed decline in profit margins during this time. This indicates that higher costs or inefficiencies likely exerted pressure on profitability, even though sales remained relatively stable.

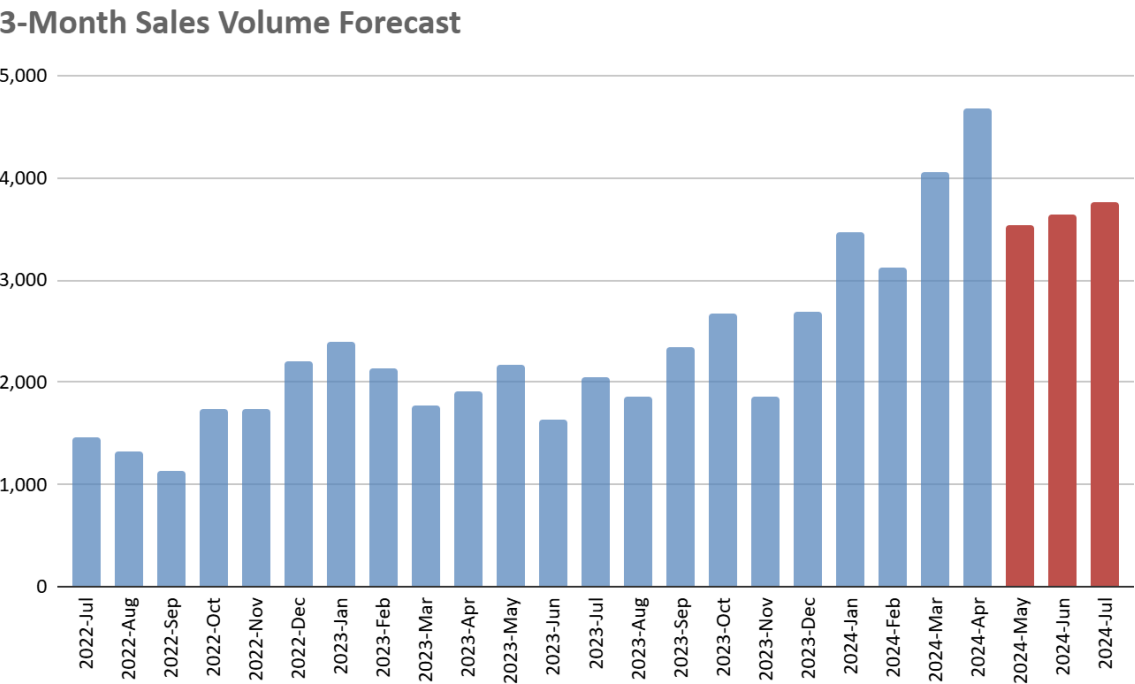
Additionally, seasonal trends are evident in periods like December 2022 and December 2023, where sale prices were notably high compared to product costs, reflecting strong demand during the holiday seasons. However, certain months, such as June and November 2023, show dips in both product cost and sale price, suggesting potential challenges with demand or operations during those times. These fluctuations highlight the importance of understanding both the external market conditions and internal cost efficiencies to maintain consistent profitability.

### Demand Forecasting

Accurately predicting future demand is essential for effective inventory management, production planning, and meeting customer expectations. By analyzing historical sales data and projecting upcoming trends, demand forecasting helps businesses

ensure they have the right stock levels to meet demand while minimizing waste. This approach also identifies potential risks and opportunities, enabling proactive decision-making to optimize resources and maintain profitability.

The sales volume forecast graph below illustrates projected demand for May to July 2024, based on historical trends:

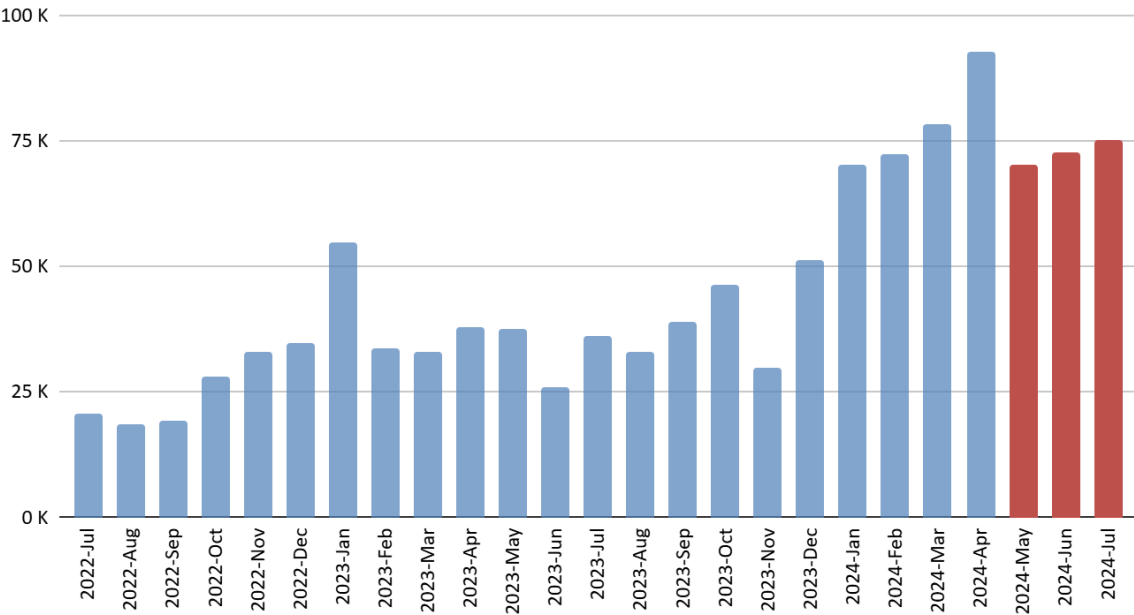


The forecast shows a steady increase in sales volume over the three months, underscoring the importance of scaling inventory and production to meet anticipated growth. This upward trend highlights continued growth and provides valuable insights for planning efforts.

Understanding product cost trends is essential for maintaining profitability and ensuring efficient inventory and production planning. By forecasting future costs based on historical data, businesses can anticipate challenges, optimize operations, and refine pricing strategies to mitigate cost pressures while maximizing profit margins.

The product cost forecast graph below illustrates projected demand for May to July 2024, based on historical trends:

### 3-Month Product Cost Forecast



The forecast reveals an upward trend, with costs steadily rising month-on-month. The trend highlights the importance of proactive cost management to ensure profitability during periods of increased demand. Comparing historical and forecasted costs, it's evident that mid-2024 projections are significantly higher than previous years, reinforcing the need for streamlined production and inventory strategies.

## Strategic Recommendations

Based on the analysis of key revenue streams and demand forecasting, several strategic recommendations emerge to drive sustainable growth and profitability. Firstly, leveraging the strong upward trends in sales volumes observed in early 2024, businesses should optimize inventory levels and production schedules to meet rising demand efficiently. By anticipating seasonal peaks and integrating safety stock strategies, operations can remain agile while avoiding overstocking or supply shortages.

Secondly, proactive cost management is critical, as the forecasted increase in product costs highlights the need to renegotiate supplier contracts, streamline production, and explore opportunities for efficiency gains. Lastly, aligning pricing strategies with projected demand patterns and improving operational efficiencies during high-demand periods can protect profit margins and sustain momentum. By combining demand insights with cost control measures, businesses can seize growth opportunities while mitigating risks to maintain a competitive edge in the evolving market landscape.