

Analyzing the Impact of ERP System Integration on Customer Satisfaction in Puregold Monumento

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Date Submitted:

April 8, 2026

Date Accepted:

May 10, 2026

Date Published:

May 20, 2026

DOI:

10.5281/zenodo.20312535

ABSTRACT

Enterprise Resource Planning (ERP) systems are increasingly used in retail to improve service efficiency, accuracy, and responsiveness through integrated and automated processes. In large supermarkets, ERP integration can influence the customer experience at critical touchpoints such as inventory visibility, cashiering reliability, transaction speed, and issue resolution. This study examined how ERP system integration shapes customer satisfaction in Puregold Monumento. A quantitative descriptive–correlational design was utilized. Data were collected through a structured survey questionnaire distributed via Google Forms to Puregold Monumento customers (N = 357). Descriptives summarized perceptions and satisfaction, while regression analyses tested the predictive influence

of ERP integration and its dimensions on customer satisfaction. Customers generally agreed that ERP integration is evident across dimensions—data accuracy (M = 3.94), system reliability (M = 3.72), user training (M = 3.88), and process automation (M = 3.83). Overall satisfaction was also high (M = 3.95), though respondents strongly noted that the system could still be improved (M = 4.08), particularly regarding service speed consistency. ERP integration significantly predicted customer satisfaction (R = .874, R² = .763, p < .001). In the dimension-level model, process automation was the strongest predictor (β = .355), followed by data accuracy (β = .229), user training (β = .204), and system reliability (β = .172). ERP integration is a central driver of customer satisfaction in Puregold Monumento, with automation-related convenience contributing most strongly. However, gaps in stock visibility, occasional system freezes, and complex transaction handling suggest that integration benefits are not uniformly experienced. The supermarket should improve real-time inventory synchronization, strengthen POS stability, enhance scenario-based staff training, and align automation with queue management to ensure consistent speed. Future research may extend the model across branches and use mixed methods to explain variation across customer segments.

Keywords: *Enterprise Resource Planning (ERP), Customer Satisfaction, Process Automation, Data Accuracy, System Reliability, User Training, Puregold Monumento.*

INTRODUCTION

According to Kumar & Van Hillegersberg, (2020) The Enterprise Resource Planning (ERP) systems have become essential tools for organizations seeking to integrate business processes and enhance

operational efficiency in the digital era. ERP systems are integrated software platforms that manage core organizational functions such as finance, human resources, supply chain, manufacturing, and customer relations within a unified database. These systems provide real-time access to information, improve interdepartmental coordination, and support strategic decision-making.

With the advancement of digital technologies such as cloud computing, artificial intelligence, and big data analytics, ERP systems have evolved to become more flexible and scalable. Cloud-based ERP solutions, in particular, have reduced infrastructure costs and implementation complexity, making them accessible not only to large enterprises but also to small and medium-sized enterprises (SMEs) (Haddara & Elragal, 2021).

On the other hand, as stated by Zheng and Seongdok (2023) due to constraints in resources and managerial capabilities, SMEs may face notable risks during the implementation of ERP initiatives, such as unreliable demand forecasting and insufficient organizational transformation. Compared to large corporations, SMEs often encounter greater financial burdens when allocating resources for ERP implementation, including costs related to software acquisition, hardware infrastructure, employee training, and other associated expenses. In addition, because of differences in local and international market conditions, SMEs are more likely to require ERP system localization, such as adaptable tax regulations and sector-specific features.

Nonetheless, with the growing popularity of technologies such as cloud computing, an increasing number of SMEs are beginning to adopt affordable and lightweight ERP solutions to enhance their competitiveness. Therefore, with this information and current studies this paper aims to explore the factors that will influence customer satisfaction in relation to using ERP systems at service-oriented businesses.

Literature Review

The integration of Enterprise Resource Planning (ERP) systems has transformed retail service delivery by balancing operational efficiency with rising consumer expectations. In high-volume environments like supermarkets, the transition from fragmented processes to centralized data management is essential for maintaining a competitive edge. This review explores the critical dimensions of ERP implementation - spanning technical attributes and human-centric factors - to establish how streamlined back-end operations ultimately drive enhanced front-end customer satisfaction.

Data Accuracy

The cornerstone of any effective ERP system is the integrity of the information it processes. According to Catalina Marcuta & Moldstud Research Team (2024), Enhancing Data Accuracy ERP systems can help businesses track customer interactions and preferences, allowing them to personalize their marketing efforts and provide better customer service. By analyzing customer data, businesses can identify trends and anticipate customer needs, leading to higher customer satisfaction and loyalty.

Further supporting this, Kaya & Tuncay (2020) found that data accuracy significantly improves business intelligence outcomes in ERP systems. Accurate transactional data helped companies reduce errors in financial reporting and enhance decision effectiveness, which positively influenced customer service quality. The importance of the cleanliness of this data is echoed by Al-Sharo, Dahiyat & Osman (2021) reported that data accuracy directly predicts ERP success. Their empirical study showed that organizations with robust data validation and cleansing procedures experienced fewer data inconsistencies, leading to better operational planning and user trust. Moreover, Lin & Chen (2022) observed that real-time data accuracy enhances cross-departmental visibility, reducing delays and discrepancies in order processing. This improved coordination contributed to higher customer satisfaction and fewer service failures in manufacturing firms.

System Reliability

Beyond the data itself, the technical stability of the platform is vital for maintaining service continuity. Nguyen, Ngo & Ruël (2020) found a strong positive relationship between ERP system reliability and user satisfaction. Organizations with stable, high-availability systems reported less downtime and greater user confidence, which translated into improved customer responses. In the context of supermarket operations, where downtime can lead to significant revenue loss and customer frustration, Khan et al. (2021) emphasize that ERP systems with robust reliability features (e.g., error handling, uptime guarantees, redundancy) experienced higher operational continuity and fewer disruptions. The study concluded that reliability is critical for building customer trust and service consistency. This is further validated by Hu, Gong & Wu (2023), who argue that ERP reliability reduces transaction processing errors, leading to increased process efficiency. Their findings show that high reliability significantly improves performance metrics across supply chain and service units.

User training

While the technical architecture of an ERP system provides the framework for efficiency, the human element remains a decisive factor in its success. Iqbal & Aziz (2020) demonstrated that structured ERP training greatly increases user proficiency, reducing errors and resistance to change. Training strengthened users' confidence in handling ERP tasks, ultimately improving organizational responsiveness.

This need for competence is not a one-time requirement. AlMansour & Alshaikh (2021) highlighted that ongoing training programs increased user competence and system utilization rates. Their findings indicate that employees who receive continuous support and refresher courses use ERP functionalities more effectively, contributing to higher operational stability. Furthermore, Rana, Dwivedi & Alsharari (2022) found that training positively affects user acceptance and performance efficiency. When users are confident, errors decrease and process flows improve — factors that enhance customer satisfaction metrics.

Process Automation

The final pillar of ERP integration involves the transition from manual workflows to automated systems. Chen, Zhang & Xu (2020) found that automation of routine tasks significantly reduced cycle times and human error. Their study concluded that automated processes helped firms respond faster to customer needs and improve overall service quality.

According to Olatunji & Amzat (2021), organizations with high levels of ERP automation achieved enhanced coordination across business units, leading to fewer operational redundancies and more timely service delivery. Finally, Singh & Saini (2023) showed that automation positively influences end-to-end process consistency. Fully integrated workflows enabled by automated ERP modules resulted in higher reliability and customer satisfaction due to predictable outcomes and shorter response times.

Problem Statement

This study aims to evaluate the Customer Satisfaction of Service Delivery under Enterprise Resource Planning (ERP) system integration in Puregold Monumento.

The following objectives are sought to be answered by the researchers:

1. What is the demographic profile of the respondents in terms of:
 - 1.1. Age (18–24, 25–34, 35–44, 45–54, 55 and above); and
 - 1.2. Sex (Male, Female, rather not to say)?
2. How do the respondents perceive the ERP integration in Puregold Monumento in terms of:
 - 1.1 Data Accuracy (e.g., price consistency, receipt precision);
 - 1.2 System Reliability (e.g., uptime at payment terminals, transaction stability);
 - 1.3 Staff Competency/Training (e.g., speed of cashier navigation, troubleshooting); and
 - 1.4 Process Automation (e.g., checkout speed, digital payment option)?

3. How do customers assess their satisfaction with the integration of the ERP system in Puregold Monumento?
4. Does ERP system integration significantly impact customer satisfaction in Puregold Monumento?

Hypothesis

Null Hypothesis (H₀):

ERP system integration has no significant impact on customer satisfaction in Puregold Monumento.

Alternative Hypothesis (H₁):

ERP system integration has no significant impact on customer satisfaction in Puregold Monumento.

Theoretical Framework

The SERVQUAL model, which compares what consumers expect with what they receive in five categories. It aids in measuring service quality. Tangibility, assurance, responsiveness, dependability, and empathy are the five domains (Parasuraman, 1985). The SERVQUAL model, which compares customers' expectations with their actual experiences to measure service quality, forms the theoretical basis of this study. These dimensions are frequently used to assess how successfully businesses fulfill or surpass the expectations of their clients.

Customers have basic needs, and according to expectation confirmation theory, they expect particular products to meet those needs. Customers develop negative attitudes (disconfirmation) and beliefs about the product when it does not live up to their expectations (Yang, Lu & Chau, 2013). Consumers are more likely to have their expectations met if they believe that ERP-enabled services (such as quicker checkout, precise inventory, and customized offers) are useful (Oliver, 1980). Berry (1980) established the Relationship Marketing Theory, which facilitates quantitative study of the relationship between ERP-enabled personalization and retention indicators such as participation in loyalty programs, subscription renewals, and repeat purchases.

Conceptual Framework

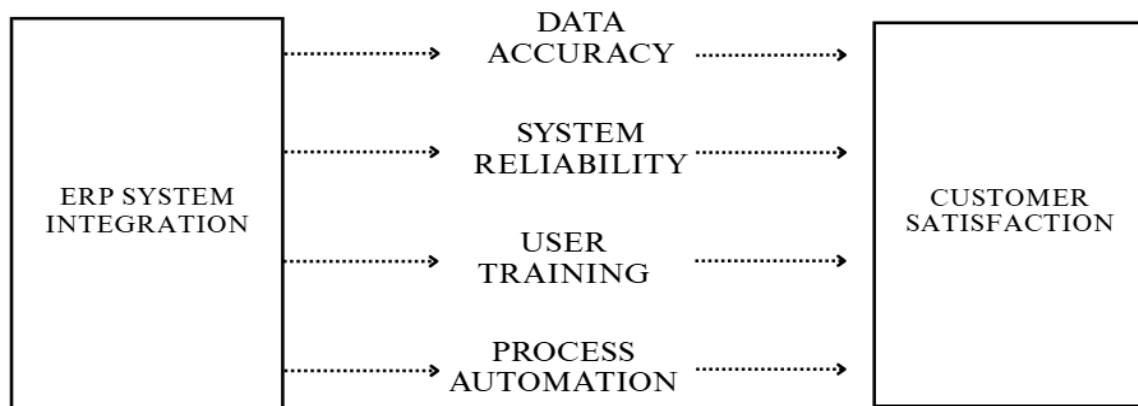


Figure 1. *Conceptual Framework*

This is the conceptual framework which shows the hypothesis that the independent variable, “ERP System Integration”, affects the dependent variable “Customer Satisfaction”. The independent variable is further explained by the following four main factors: data accuracy, system reliability, training of users, and automation process. All these factors are essential for the efficiency and effectiveness of the ERP system.

This implies that by allowing data that is both correct and reliable, and facilitated by a reliable system and competent users, better and more efficient business processes are accomplished when those processes are automated. This is expected to result in fewer service delays, fewer service transaction errors, and an improvement in service performance. This means that all arrows pointing towards Customer Satisfaction indicate an expected causal process among variables, wherein better ERP system integration causes an increase in customer satisfaction.

METHODS

Research Design

The quantitative descriptive-correlational research design will be used in this study which is suitable for analyzing current circumstances and finding correlations without changing variables. This is consistent with Creswell's (2014) assertion that correlational designs are appropriate for investigating relationships between quantifiable constructs. In order to carry out this investigation, researchers will also employ survey questionnaires. Researchers will utilize a correlational approach in this study to investigate the relationship between ERP system integrations and customer experience at Puregold Monumento.

Research Locale

The study will be conducted at Puregold Monumento in Caloocan City, a busy retail location where ERP integration has a direct impact on cashiering, inventory accuracy, and customer service responsiveness. Retail-based ERP studies in similar situations illustrate the usefulness of assessing ERP impacts at the shop level (Kimberling, 2024). This location was chosen as the research site to examine how customer experience is affected by the integration of Enterprise Resource Planning (ERP) systems. Puregold Monumento is a large supermarket chain that actively uses ERP systems to streamline its operations, making it a suitable setting that is highly relevant to the study's goals. Puregold Monumento's accessibility and convenience for OLFU Valenzuela students further support the decision to use it as the study site. This accessibility guarantees that data gathering may be completed in a reasonable amount of time. The location offers a useful setting to investigate how ERP system integration affects customer satisfaction and the overall shopping experience because of Puregold's large customer base and its position as a top retail chain in the Philippines.

Population and Sampling

The study's population comprises customers of Puregold Monumento who have directly engaged with the store's services and point-of-sale procedures. These customers give useful feedback about their service experience, which is important for figuring out how satisfied customers are with the business.

To collect data, the researchers will use a convenience sampling method, which means they will choose customers who are available and willing to take part in the data collection period. This method is suitable because of time limits, ease of access, and a lack of resources. The sample size for this study consists of 357 respondents, a figure determined using Slovin's Formula based on a total population of 3,337 and a 5% margin of error. This specific sample size is deemed statistically sufficient for the rigorous analysis and interpretation of direct customer feedback regarding the ERP system's integration.

Convenience sampling is useful and practical for this study, but it could lead to some problems, like sampling bias. The only customers who can be included are those who are present and willing to

respond. This may limit the range of views that are captured. Even with this limitation, the chosen sampling method is still appropriate because it effectively gathers direct customer feedback that is needed to measure satisfaction levels and find ways to make things better.

Research Instrument

To gather the information needed for this study, a structured survey questionnaire developed by the researchers will be used as the data-gathering instrument to investigate the relationship between ERP system integrations and customer experience, consistent with the descriptive-correlational design. The questionnaire will consist of two main parts:

- I. ERP System Integration Indicators that aim to quantify respondents' perceptions regarding the efficiency and effectiveness of the ERP system's visible impacts on service delivery. This includes the assessment of key operational areas such as cashiering speed, inventory visibility, and overall service responsiveness. To measure the level of agreement with statements related to these ERP indicators, a 4-point or 5-point Likert scale will be employed.
- II. Customer Experience that will measure the overall customer satisfaction and the subjective quality of the shopping experience. This section covers aspects such as perceived convenience, transaction ease, and the perceived quality of service received. This will also utilize a similar 4-point or 5-point Likert scale to quantify the customers' level of satisfaction or quality perception at Puregold Monumento.

Instrument Validation

Prior to its distribution, the questionnaire will undergo a pilot testing process with a small group of customers from a similar Puregold branch that is not the research locale to check for clarity, relevance, and time required for completion. The instrument will also be subjected to content validation by at least three experts in the fields of Retail Management, Information Systems, or Research Methods to ensure the items accurately measure the intended constructs. This process will help establish the reliability and validity of the research instrument.

Ethical Consideration

The researchers are committed to upholding the highest ethical standards throughout the study to safeguard the rights and welfare of all participants. Informed consent serves as the foundation of participation; potential respondents will receive a clear and concise explanation of the study's purpose, procedures, time commitment, and their right to withdraw at any point without penalty. Only those who provide their explicit consent will be included.

DATA PRIVACY ACT 2012

In compliance with the Data Privacy Act of 2012 (Republic Act No. 10173), the researchers assure you that all information collected in this survey will be treated with the highest level of confidentiality. Your responses will be used solely for academic research purposes related to the study titled "Analyzing the Impact ERP System Integration on Customer Satisfaction in Puregold Monumento". Participation in this survey is voluntary, and you may choose to withdraw at any time without penalty. No personal or sensitive information will be disclosed, shared, or published in any form that could identify you. All data will be stored securely and accessed only by the researchers involved in this study.

Regarding the data lifecycle management, all electronic information will be stored in an encrypted, password-protected cloud environment accessible only to the research team, while any physical records will be kept in a secure, locked filing cabinet. These data will be retained for the duration of the study and for a maximum of one year following the successful completion and defense of the research to allow for verification and final academic requirements. Upon the expiration of this period, the researchers will ensure

the permanent disposal of all data; electronic files will be wiped from all drives and cloud storage, and any hard copies will be destroyed via cross-cut shredding to prevent any unauthorized recovery. Through these measures, the researchers pledge to report findings honestly and accurately, reflecting the gathered data without manipulation or bias while ensuring long-term data security and integrity.

Data Gathering

The researchers utilized a structured survey questionnaire as the primary instrument for data collection, deployed through Google Forms for efficient distribution to customers of Puregold Monumento. The instrument was designed to capture essential demographic profiles, specifically age and gender, to provide a contextual backdrop for the respondent's feedback. To ensure the validity of the data, a screening process was implemented at the start of the survey to confirm that each participant met the predefined inclusion criteria, specifically having experienced service delivery within a supermarket utilizing an integrated Enterprise Resource Planning (ERP) system.

The core of the data collection focused on the impact of ERP system integration on three key pillars of service delivery: customer satisfaction, retention, and loyalty. Respondents were asked to rate the effectiveness of the system's implementation and its direct influence on their shopping experience. To capture a more nuanced perspective, the questionnaire included open-ended questions, allowing participants to qualitatively express their personal experiences and ideas regarding the system's integration. Additionally, the survey gathered specific data on how the ERP system supports the supermarket operations in providing expedited service and addressing customer needs promptly.

Following the collection of primary data, the researchers performed a comprehensive process of examination, counting, and interpretation to extract valuable insights. To further strengthen the study's findings, secondary data were gathered from reliable academic and industry sources. This secondary information served as a benchmark to validate the results of the primary data, allowing the researchers to observe any significant trends or discrepancies. By synthesizing both primary feedback and secondary evidence, the researchers were able to provide a robust analysis of how ERP system integration ultimately shapes customer satisfaction in the supermarket sector.

RESULTS

Research Question 1. What is the demographic profile of the respondents in terms of age and sex?

In terms of age, most respondents were 18–24 years old ($n = 284$, 79.55%), followed by those aged 25–34 years ($n = 56$, 15.69%), while only a small portion belonged to the older age groups: 45–54 years ($n = 11$, 3.08%) and 55 years old and above ($n = 6$, 1.68%). For sex, the majority identified as male ($n = 221$, 61.90%), followed by female respondents ($n = 130$, 36.41%), with a small number choosing “rather not to say” ($n = 6$, 1.68%).

Overall, the sample is heavily skewed toward younger respondents, indicating that the findings on ERP system integration and customer satisfaction will largely reflect the experiences and expectations of customers in early adulthood, who may prioritize service speed, convenience, and digital efficiency during transactions.

The sex distribution also shows higher male participation, which may shape overall satisfaction ratings if perceptions of service quality and technology-enabled processes vary by gender.

Given the limited representation of older customers and those who withheld sex disclosure, interpretations of ERP-related satisfaction were generalized cautiously in this chapter, particularly when extending conclusions to older shopper segments who may interact differently with ERP-enabled services (e.g., checkout systems and customer support processes).

Table 1. *Presents the demographic profile of the respondents in terms of age and sex.*

Demographics	Frequency	Percent (%)
Age		
18 – 24 years old	284	79.55
25 – 34 years old	56	15.69
45 – 54 years old	11	3.08
55 years old and above	6	1.68
Sex		
Male	221	61.90
Female	130	36.41
Rather not to say	6	1.68
Total	357	100.00

Research Question 2. How do the customers perceive the service delivery of the supermarket as driven by ERP integration in terms of data accuracy, system reliability, user training, and process automation?

Data Accuracy

Across the indicators, respondents generally agreed that data accuracy is evident in their transactions, with an overall mean of $M = 3.94$ ($SD = 0.91$). The highest-rated item was that the total bill at checkout is usually accurate ($M = 4.14$, $SD = 1.02$), followed by the perception that the shelf price usually matches the receipt ($M = 4.00$, $SD = 1.06$). The lowest-rated item was the accuracy of item availability information (in stock/out of stock) ($M = 3.75$, $SD = 1.05$), although it still fell within the “Agree” range, suggesting minor but noticeable inconsistencies.

These results indicate that customers more consistently experience ERP-enabled accuracy in pricing and billing, which are highly visible touchpoints that shape trust during checkout. This pattern supports Kimberling’s (2024) claim that ERP systems can enhance customer service by enabling more accurate tracking and faster issue resolution through integrated data, as accurate billing and pricing reduce disputes and transaction friction. However, the comparatively lower rating for stock availability suggests a potential gap that slightly contrasts with Talend’s (2025) assertion that ERP centralizes data and provides real-time insights—implying that inventory visibility may not be fully synchronized at the customer-facing level (e.g., shelf/assistant queries vs. actual stock movement), which can affect perceived reliability consistent with the reliability/dependability emphasis in SERVQUAL (Parasuraman, 1985).

Practically, Puregold may strengthen customer satisfaction by prioritizing inventory data accuracy and real-time stock updates, since availability information showed the greatest room for improvement. Maintaining strong performance in billing and price consistency is also essential because these accuracy indicators are likely to reinforce customer trust and reduce service delays during peak shopping hours.

Table 2. *presents respondents’ perceptions of ERP system integration in Puregold Monumento in terms of data accuracy, using item means and standard deviations.*

Statements	Mean	Standard Deviation	Verbal Interpretation
The price displayed on the shelf usually matches the price on my receipt.	4.00	1.06	Agree
My total bill at checkout is usually accurate.	4.14	1.02	Agree
Information about item availability (e.g., “in stock/out of stock”) is usually accurate.	3.75	1.05	Agree

When staff check item details in the system, I receive information quickly that helps me decide what to buy	3.87	1.06	Agree
Overall	3.94	0.91	Agree

System Reliability

Overall, respondents agreed that the ERP-enabled system is reliable ($M = 3.72, SD = 0.89$). The strongest agreement was observed for the statements that system reliability contributes to a smooth shopping experience ($M = 4.01, SD = 1.06$) and that reliable systems make transactions feel secure and dependable ($M = 4.00, SD = 1.06$), indicating that customers link system stability with trust and service quality. In contrast, the item stating that the cashiering system breaks down or freezes during transactions received a neutral rating ($M = 3.02, SD = 1.21$), suggesting that while reliability is generally perceived positively, system interruptions are still encountered by a meaningful portion of customers.

These results imply that customers recognize the ERP system as a key contributor to transaction security and service smoothness, which aligns with Avally’s (2024) claim that ERP enhances customer experience by unifying backend operations and enabling seamless service that builds trust and satisfaction. The positive perception of smooth cashless/card/e-wallet payment processing ($M = 3.84, SD = 1.11$) also supports NetSuite’s (2025) point that ERP-driven automation and real-time capabilities help improve operational efficiency, which customers may experience as faster, more dependable checkout processes. However, the neutral response regarding system freezing indicates operational gaps that partly challenge the expectation of consistent agility and collaboration enabled by ERP systems (Wrike, n.d./year not specified), as intermittent breakdowns can disrupt service flow and reduce perceived dependability—an essential dimension of service quality emphasized in SERVQUAL (Parasuraman, 1985).

Puregold may benefit from strengthening system uptime and cashiering stability (e.g., preventive maintenance, network redundancy, rapid IT support at peak hours) to minimize freezes that interrupt customer transactions. Sustaining reliable payment processing and reinforcing customer trust through visible system dependability can further enhance overall customer satisfaction and loyalty outcomes.

Table 3 .Presents respondents’ perceptions of ERP system integration in Puregold Monumento in terms of system reliability, as reflected by item means and standard deviations.

Statements	Mean	Standard Deviation	Verbal Interpretation
The cashiering system breaks down or freezes during my transaction.	3.02	1.21	Neutral
Payment processing (cashless/card/e-wallet) works smoothly at the cashier.	3.84	1.11	Agree
Reliable systems make transactions feel secure and dependable.	4.00	1.06	Agree
System reliability contributes to a smooth shopping experience at Puregold Monumento.	4.01	1.06	Agree
Overall	3.72	0.89	Agree

User Training

Overall, respondents agreed that employee user training and system handling are effective ($M = 3.88, SD = 0.91$). The highest-rated indicator was that staff respond calmly and effectively when system problems occur ($M = 3.92, SD = 1.02$), closely followed by the perception that staff handle customer concerns smoothly during checkout ($M = 3.91, SD = 1.00$). The lowest (but still “Agree”) rating was for the statement that staff can resolve transaction issues efficiently using the system (e.g., returns, discounts, price checks; $M = 3.83, SD = 1.00$), suggesting a small area where operational efficiency can still be strengthened.

These findings suggest that customers generally observe competent and composed system use among employees, which likely reduces friction at checkout and supports a more positive service encounter. This supports Sunrise Technologies’ (2025) emphasis that successful ERP outcomes depend partly on proactive change management and ensuring organizational readiness—customers appear to be experiencing the benefits of prepared and capable frontliners. The results also align with the Technology Acceptance Model (Davis, 1989; Davis, 1993), as effective training and confident system use function as enabling conditions that strengthen perceived ease of use and usefulness, which can translate into smoother actual system-supported service delivery. From a service-quality lens, staff confidence and issue-handling reinforce assurance and responsiveness components of perceived service quality (Parasuraman, 1985), meaning trained employees may help protect customer satisfaction even when minor system issues arise.

Puregold may further improve customer satisfaction by enhancing advanced scenario-based training for complex transactions (e.g., returns, discount overrides, and price-check workflows) since this area showed the lowest mean among the indicators. Continuous refresher training and coaching during peak hours may also help sustain staff confidence and ensure consistent service quality across all cashier lanes.

Table 4. *Presents respondents’ perceptions of ERP system integration in Puregold Monumento in terms of user training, based on item means and standard deviations.*

Statements	Mean	Standard Deviation	Verbal Interpretation
Store employees appear confident in using the checkout system.	3.87	0.96	Agree
Staff can resolve transaction issues (e.g., returns, discounts, price checks) efficiently using the system.	3.83	1.00	Agree
Staff handle customer concerns smoothly during checkout (e.g., corrections, voids, returns).	3.91	1.00	Agree
Staff respond calmly and effectively when system problems occur.	3.92	1.02	Agree
Overall	3.88	0.91	Agree

Process Automation

Overall, respondents agreed that process automation is evident and beneficial ($M = 3.83$, $SD = 0.95$). The highest-rated indicator was that the service process feels streamlined and convenient ($M = 3.88$, $SD = 1.01$), followed closely by the perception that automated features (e-receipts/loyalty tracking) are easy to use and effective ($M = 3.85$, $SD = 1.01$). The lowest (though still “Agree”) rating was for the statement that the checkout process is fast and efficient ($M = 3.76$, $SD = 1.08$), suggesting that speed improvements are present but may be moderated by situational factors (e.g., peak-hour volume, lane availability, occasional system delays).

These findings indicate that customers generally experience ERP-driven automation as improving convenience, streamlining, and waiting-time reduction, which supports NetSuite’s (2025) claim that ERP automation and real-time capabilities enhance operational efficiency in service delivery. The positive rating for automated features also aligns with Davis’ (1989; 1993) Technology Acceptance Model, implying that when automation is perceived as easy and useful, it contributes to smoother service encounters and more favorable customer evaluations. However, the comparatively lower mean for perceived checkout speed suggests that automation alone may not fully eliminate bottlenecks, which partially contrasts with the expectation that ERP-enabled integration consistently produces agile, seamless workflows in practice (Talend, 2025), especially in high-traffic retail environments where staffing, queue management, and system load also shape outcomes.

Puregold may enhance customer satisfaction further by pairing automation with operational queue controls (e.g., sufficient open lanes during peak periods, quick escalation support, and optimized POS

workflows) to translate “streamlined processes” into consistently faster checkout times. Sustaining user-friendly automated features such as loyalty tracking and e-receipts can also strengthen perceived value and encourage repeat patronage through a more convenient shopping experience.

Table 5. *Presents respondents’ perceptions of ERP system integration in Puregold Monumento in terms of process automation, as reflected by the item means and standard deviations.*

Statements	Mean	Standard Deviation	Verbal Interpretation
The checkout process at Puregold Monumento is fast and efficient.	3.76	1.08	Agree
The service process feels streamlined, making my shopping convenient.	3.88	1.01	Agree
When available, automated features (e-receipts/ loyalty tracking) are easy to use and effective.	3.85	1.01	Agree
Automation helps reduce my waiting time at checkout.	3.84	1.07	Agree
Overall	3.83	0.95	Agree

Research Question 3. What is the level of customer satisfaction regarding the overall service delivery?

Overall, respondents agreed that they are satisfied with the shopping experience and ERP-enabled service delivery (M = 3.95, SD = 0.87). The highest-rated statement was that the system could still be improved to enhance the customer experience (M = 4.08, SD = 1.00), indicating strong recognition of remaining service gaps despite generally favorable perceptions. The lowest-rated item was satisfaction with the speed of service (M = 3.82, SD = 0.99), while trust in dependable customer service (M = 3.94, SD = 0.96) and the perception that the overall shopping experience is excellent (M = 3.98, SD = 0.96) remained high.

These findings suggest that customers largely experience ERP integration as supportive of dependable and positive service encounters, consistent with Avally’s (2024) claim that ERP improves customer experience by unifying operations and enabling smoother, trust-building service. However, the strong agreement that the system still needs improvement reflects the idea that satisfaction is not only about current performance but also about whether services consistently meet evolving expectations, which aligns with Expectation Confirmation Theory (Oliver, 1980; Yang, Lu, & Chau, 2013). The comparatively lower rating for speed implies that efficiency gains may be uneven across situations (e.g., peak hours), reinforcing that post-implementation performance must be continuously strengthened—supporting Foshee’s (2025) emphasis on ongoing optimization and monitoring to sustain ERP value.

Puregold may prioritize continuous system and process refinement (e.g., streamlining checkout workflows and strengthening service speed consistency) since customers already perceive clear benefits but still expect further improvements. Regular customer feedback loops and routine system performance checks can help maintain trust while pushing service experience from “agree” toward stronger excellence and loyalty outcomes.

Table 6 . *Presents the respondents’ assessment of customer satisfaction and perceived ERP system integration outcomes in Puregold Monumento using mean scores and standard deviations*

Statements	Mean	Standard Deviation	Verbal Interpretation
The system could still be improved to enhance my experience.	4.08	1.00	Agree
I am generally satisfied with the speed of service at Puregold Monumento.	3.82	0.99	Agree
I trust Puregold Monumento to provide dependable customer service.	3.94	0.96	Agree

Overall, the shopping experience at Puregold Monumento is excellent.	3.98	0.96	Agree
Overall	3.95	0.87	Agree

Research Question 4. Is there a significant relationship between the perceived ERP-driven service delivery and the level of customer satisfaction?

The model showed a strong positive relationship between ERP system integration and customer satisfaction ($R = .874$), with ERP integration explaining a substantial proportion of the variance in satisfaction ($R^2 = .763$, adjusted $R^2 = .762$).

R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics					
				R Square Change	F Change	df1	df2	Sig. Change	F Change
.874	.763	.762	.42494	.763	925.079	1	287	.000	

The regression model was statistically significant, $F(1, 287) = 925.08$, $p < .001$, indicating that ERP system integration reliably predicts customer satisfaction. The slope coefficient was also significant, such that ERP system integration positively predicted customer satisfaction ($B = 0.914$, $SE = 0.030$, $\beta = .874$), $t(287) = 30.42$, $p < .001$, leading to the rejection of the null hypothesis.

	Unstandardized Coefficients B	Std. Error	Standardized Coefficients Beta	t	Sig.	Interpretation	Decision
(Constant)	.439	.118		3.716	.000	Significant	
ERP System Integration	.914	.030	.874	30.415	.000	Significant	Reject Ho

Dependent Variable: Customer Satisfaction

Higher perceived ERP system integration is associated with higher customer satisfaction, and the magnitude of prediction suggests ERP integration is a major driver of customers' overall experience in the store. This supports Avally's (2024) claim that ERP enhances customer experience by unifying operations to enable smoother, more dependable service, which customers often interpret as better overall service quality. The findings also align with Oliver's (1980) expectation-confirmation perspective: when ERP-enabled service benefits (e.g., accuracy, reliability, convenience) meet or exceed customer expectations, satisfaction tends to increase, consistent with ERP value claims emphasizing real-time, streamlined operations (Talend, 2025).

Puregold may prioritize strengthening and sustaining ERP performance (e.g., system uptime, accurate data flow, and workflow automation) because improvements in integration are likely to translate into meaningful gains in customer satisfaction. Extending these ERP-enhancement practices across branches and continuously monitoring integration outcomes can help maintain a consistently positive shopping experience.

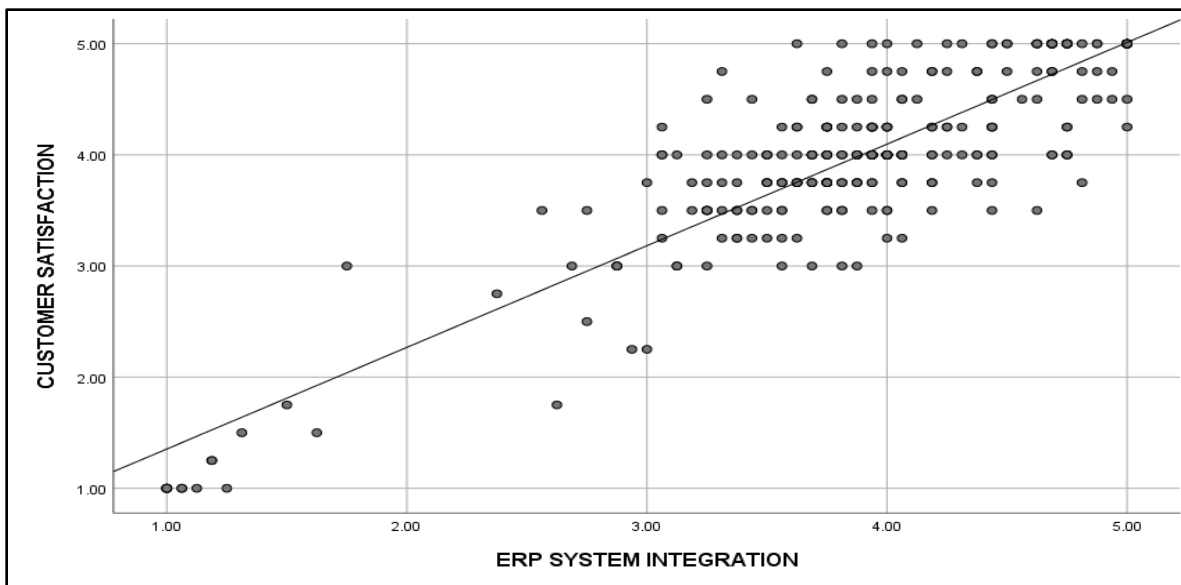


Figure 2. The simple linear regression results testing whether ERP system integration significantly predicts customer satisfaction in Puregold Monumento.

From the coefficients, all four dimensions were statistically significant positive predictors of customer satisfaction, meaning that improvements in any of these areas are associated with higher customer satisfaction when the other variables are held constant. Specifically, process automation emerged as the strongest predictor ($B = 0.324$, $SE = 0.052$, $\beta = .355$, $t = 6.29$, $p < .001$), indicating it contributes the largest unique effect to satisfaction compared with the other ERP components. The next strongest predictors were data accuracy ($B = 0.219$, $SE = 0.048$, $\beta = .229$, $t = 4.53$, $p < .001$) and user training ($B = 0.195$, $SE = 0.053$, $\beta = .204$, $t = 3.70$, $p < .001$), followed by system reliability ($B = 0.169$, $SE = 0.048$, $\beta = .172$, $t = 3.49$, $p = .001$).

Table 8. Presents the multiple regression results showing how the four ERP integration dimensions—data accuracy, system reliability, user training, and process automation—jointly predict customer satisfaction in Puregold Monumento (dependent variable).

	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	Interpretation	Decision
	B	Std. Error	Beta				
(Constant)	.466	.119		3.918	.000	Significant	
Data Accuracy	.219	.048	.229	4.527	.000	Significant	Reject Ho ₁
System Reliability	.169	.048	.172	3.493	.001	Significant	Reject Ho ₂
User Training	.195	.053	.204	3.696	.000	Significant	Reject Ho ₃
Process Automation	.324	.052	.355	6.290	.000	Significant	Reject Ho ₄

Interpreting the unstandardized coefficients (B) in practical terms, a one-unit increase in perceived process automation is associated with a 0.324-unit increase in customer satisfaction, assuming the other ERP dimensions remain constant—highlighting that streamlined workflows and automation-driven convenience (e.g., reduced waiting time, smoother service flow) matter most to customers. Similarly, increases in data accuracy (+0.219) and user training (+0.195) predict meaningful gains in satisfaction, suggesting that customers value correct pricing/billing and competent staff handling of transactions and

issues. Although system reliability had the smallest standardized effect ($\beta = .172$), it remained significant, implying that stable systems still play an essential supporting role—reliability issues may be less visible when things work well, but they still shape customer trust and smooth service encounters.

In relation to the composite model (where ERP system integration was treated as a single predictor), this expanded regression explains why ERP integration predicts satisfaction strongly: the overall effect is driven by multiple reinforcing components, with automation carrying the greatest unique contribution, while accuracy, training, and reliability provide additional independent improvements to the customer experience. This aligns with the idea that ERP value is not one feature but a service bundle—customers feel satisfied when the system produces fast, convenient processes and accurate information and competent service support. Based on the hypothesis testing results, the null hypotheses H_{01} – H_{04} are rejected, confirming that each ERP integration dimension has a significant positive impact on customer satisfaction in Puregold Monumento.

Since process automation shows the strongest unique effect, Puregold may gain the biggest satisfaction improvements by prioritizing automation outcomes customers directly feel (e.g., faster queue movement, smoother checkout flow, easy-to-use loyalty/e-receipt functions). At the same time, sustaining data accuracy, staff capability, and system stability remains critical because each independently contributes to satisfaction and strengthens customers' trust in the overall shopping experience.

DISCUSSION

This chapter shows the summary of the research, the findings of the study, discussing and interpreting the significance of this research on the Implementation of ERP systems in customer's overall satisfactions in Puregold Monumento. The respondent group was dominated by young adults aged 18–24 years (79.55%), with fewer respondents from older age brackets, and the sample was mostly male (61.90%) compared with female (36.41%). This distribution indicates that the succeeding results largely reflect the service expectations of younger shoppers who typically prioritize speed, convenience, and smooth technology-enabled transactions, while perspectives from older customers are underrepresented. As such, interpretations of ERP-related satisfaction are best generalized to the active, younger customer segment and should be extended cautiously to older groups who may experience ERP-supported processes differently.

In the perceived extent of ERP system integration in Puregold Monumento, respondents consistently rated ERP integration positively across the four dimensions—data accuracy ($M = 3.94$, $SD = 0.91$), system reliability ($M = 3.72$, $SD = 0.89$), user training ($M = 3.88$, $SD = 0.91$), and process automation ($M = 3.83$, $SD = 0.95$)—all interpreted as “Agree,” indicating that customers generally perceive ERP-enabled service delivery as functional and beneficial. For data accuracy, the most salient strengths were accurate billing and price consistency (highest on checkout bill accuracy, $M = 4.14$), while the key improvement point was item availability accuracy (lowest, $M = 3.75$), implying minor inconsistencies in customer-facing inventory information. For system reliability, customers strongly linked reliability with secure, smooth transactions (items around $M \approx 4.00$), yet the neutral rating for cashiering freezes ($M = 3.02$) highlights intermittent breakdowns that can disrupt service flow. For user training, customers observed staff confidence, calmness, and effective handling of concerns (highest, $M = 3.92$), but slightly lower efficiency in resolving transaction issues ($M = 3.83$) suggests room for strengthening advanced scenario-based system use. For process automation, customers agreed that automation supports streamlined and convenient shopping (highest, $M = 3.88$), though perceived gains in checkout speed were comparatively lower ($M = 3.76$), implying that automation benefits may be moderated by peak-hour congestion, lane availability, or system load.

Regarding customers' assessment of satisfaction and ERP-enabled service outcomes, respondents reported generally high satisfaction with Puregold Monumento's shopping experience and ERP-supported

service delivery (overall $M = 3.95$, $SD = 0.87$, “Agree”), suggesting that customers view the current service environment positively. Notably, the strongest agreement was that the system can still be improved ($M = 4.08$), indicating that customers simultaneously acknowledge benefits while recognizing remaining gaps in the service experience. Satisfaction with speed of service was the lowest among the satisfaction indicators ($M = 3.82$), while trust in dependable service ($M = 3.94$) and an excellent overall shopping experience ($M = 3.98$) remained high, reflecting that customers feel confident in-service dependability even as they desire more consistent efficiency.

In terms of the impact of ERP system integration on customer satisfaction regression results showed that ERP system integration is a strong and statistically significant predictor of customer satisfaction ($R = .874$; $R^2 = .763$; $F(1, 287) = 925.08$, $p < .001$), indicating that perceived ERP integration explains a substantial share of the differences in customers’ satisfaction ratings. In practical terms, higher perceptions of ERP integration are associated with higher customer satisfaction, confirming that ERP integration is a major driver of customer experience in the store ($B = 0.914$, $SE = 0.030$, $\beta = .874$, $p < .001$), leading to the rejection of the overall null hypothesis. When ERP was disaggregated into its four dimensions, all predictors remained significant, with process automation emerging as the strongest unique driver of satisfaction ($\beta = .355$), followed by data accuracy ($\beta = .229$), user training ($\beta = .204$), and system reliability ($\beta = .172$), confirming that customer satisfaction is shaped by a bundle of reinforcing ERP-enabled service features rather than a single factor.

CONCLUSION

The researchers conclude that Enterprise Resource Planning (ERP) system integration is a primary and significant driver of customer satisfaction at Puregold Monumento. While customers generally perceive the system as functional and beneficial - particularly in ensuring billing accuracy and price consistency - there is a clear indication that the system’s potential is not yet fully maximized.

Specifically, the integration dimensions of process automation, data accuracy, user training, and system reliability all positively impact satisfaction, with process automation emerging as the most influential factor. This suggests that customers most value the convenience and streamlined workflows provided by automated features like e-receipts and loyalty tracking. However, the “neutral” perception regarding occasional system freezes and the slower service speed during busy times highlight that technical stability and real-time efficiency remain critical areas where current performance does not always meet high consumer expectations. Ultimately, while the ERP system provides a strong foundation for a positive shopping experience, its success is dependent on maintaining high system uptime and ensuring that process automation consistently translates in service speed - the requirement that the supermarket’s internal digital efficiency must result in a faster, more responsive experience for the customer.

RECOMMENDATIONS

For Supermarket Management, the team should prioritize practical speed improvements, not just focusing solely on broad automation. Instead of adding more automated systems everywhere, prioritize solutions that directly reduce checkout time—such as optimizing the number of open lanes during peak hours. Use existing sales and foot traffic data to identify busy periods and adjust staffing schedules accordingly. In addition to these operational shifts, the management team should track a small set of meaningful Key Performance Indicators (KPIs), such as average checkout time, queue length, and system downtime. Avoid overcomplicating dashboards—keep it simple so managers can act quickly. Regarding customer feedback, low-effort tools like QR codes can be implemented at exits but expect limited participation. To make this effective, keep surveys extremely short (e.g., 1–2 questions) and review responses daily to address recurring issues promptly.

For IT and Operations, the team should prioritize system reliability over adding new features.

Schedule regular maintenance during off-peak hours and ensure a basic backup network or offline mode is available in case of system failure—this doesn't have to be complex, but it should allow transactions to continue. Furthermore, efforts should be made to improve inventory accuracy incrementally. Full real-time synchronization between shelves and the system may not always be feasible, so start with high-demand or fast-moving items to reduce mismatches at checkout. Parallel to this, it is crucial to ensure payment systems are consistently reliable by regularly testing card and digital wallet transactions. Focus on minimizing delays rather than introducing new payment options.

For Staff Training and Development, training programs should shift toward handling real-world situations rather than just technical tasks. Use simple, scenario-based exercises (e.g., system lag, incorrect pricing, returns) to build confidence. To supplement formal training, the store should introduce informal mentoring where experienced staff guide newer employees during shifts instead of relying solely on formal programs, which can be difficult to sustain. Moreover, a concise troubleshooting guide should be provided at each register covering the most common issues. This should be quick to read and easy to follow, reducing dependence on supervisors.

For Future Researchers, expand the sample to include a wider range of customers, particularly older shoppers who may interact differently with technology. Additionally, complement surveys with short interviews or focus groups to better understand why certain features (such as e-receipts) improve satisfaction. Finally, it is recommended to compare system performance across different conditions—such as peak weekend hours versus quieter weekdays—to identify where improvements will have the most impact.

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