

Cek 189

Fecha de entrega: 28-jul-2026 04:09a. m. (UTC-0500)

Identificador de la entrega: 3004648190

Nombre del archivo: Cek_189.docx (45.21K)

Total de palabras: 3432

Total de caracteres: 22115

Enhancing Fashion Inventory Reporting: How Accounting Information Systems Improve Report Effectiveness in Bandung

ABSTRACT

Standardized inventory management often fails to meet the dynamic demands of the fast-fashion industry, leading to inefficiencies. This study investigates the critical challenges surrounding inventory effectiveness within a prominent fashion company based in Bandung, Indonesia. This research aims to examine and evaluate the specific extent to which an Accounting Information System (AIS) for inventory influences overall inventory effectiveness. The study utilized a quantitative survey approach. The researchers collected primary data from a targeted sample of warehouse staff, production administrators, and supply chain personnel using a simple random sampling technique.

The study employed simple linear regression analysis to analyze the quantitative data and test the hypothesis regarding the relationship between the two variables. The statistical analysis reveals that the implementation of an inventory AIS exerts a significant positive impact on inventory effectiveness. Well-integrated information systems directly optimize stock control and reduce operational errors. While previous studies often focus on general corporate retail, this research isolates the unique operational ecosystem of a Bandung-based fashion hub. It highlights how localized supply chain dynamics adapt to modern digital accounting frameworks. These findings imply that fashion enterprises must prioritize investments in robust, tailored AIS modules. Doing so will streamline supply chain communication, minimize stock discrepancies, and ultimately enhance market competitiveness.

Keywords: Accounting Information System (AIS), Inventory Effectiveness, Fashion Industry.

INTRODUCTION

Implementing a technically sound AIS does not automatically guarantee success; instead, human and cultural factors heavily influence the final outcomes. Qatawneh (2023) highlights that organizational culture—specifically elements like employee involvement, adaptability, corporate mission, and internal consistency—directly governs how effectively an organization utilizes its AIS. When management introduces a new AIS, they often encounter cultural resistance. Employees routinely push back against automated workflows because they fear job displacement or resent changes to their established routines. If an organization fosters a rigid, unadaptable culture, it stifles user engagement. Consequently, this cultural friction undermines system outcomes, rendering expensive software investments ineffective simply because the workforce refuses to embrace the new systemic behavior.

Macroeconomic shocks and global crises expose hidden weaknesses in an organization's digital infrastructure. Al-Okaily (2024) explores these vulnerabilities by evaluating AIS ¹⁶performance during the disruptions of the COVID-19 pandemic. When crises force organizations into abrupt shifts—such as transitioning overnight to remote work setups—management struggles to maintain system quality, information quality, and collaboration quality. Remote environments

complicate data validation and disrupt standard service delivery. If the AIS lacks the resilience to handle sudden operational shifts, data silos emerge, collaboration between accounting teams breaks down, and individual performance plummets. This reality demonstrates that organizations face a continuous struggle to maintain data integrity and seamless collaborative workflows when external shocks disrupt physical business structures.

To remain competitive, modern firms aggressively adopt advanced tools like Business Intelligence and Analytics (BI&A). However, integrating these cutting-edge innovations into legacy frameworks presents a steep technical hurdle. Yoshikuni et al. (2023) investigate how North and South American firms attempt to leverage emerging technologies within their AIS to achieve strategic flexibility and superior decision-making. The challenge does not lie in merely purchasing advanced software, but in successfully achieving Information Systems Infrastructure Integration (ISII). When organizations fail to unify their disparate data platforms, they create fragmented environments. These disjointed setups prevent systems from supporting Strategic Enterprise Management (SEM) practices. Without seamless architectural integration, emerging technologies fail to deliver real-time insights, thereby crippling leadership's ability to make agile, data-driven decisions during rapid market shifts.

An AIS cannot operate safely in a vacuum; it requires a robust Internal Control System (ICS) to safeguard financial assets and verify data accuracy. Jarrah et al. (2023) examine this dynamic within Jordan Islamic banks, demonstrating that internal controls actively mediate the relationship between AIS utilization and ultimate employee performance. Organizations face serious trouble when they deploy a sophisticated AIS without reinforcing their internal control mechanisms (such as risk assessment, control environments, and segregation of duties). Weak internal controls create loopholes for data manipulation, operational errors, and fraud. When employees operate within a loose control environment, their operational performance deteriorates because the system lacks clear accountability and checks and balances. Therefore, balancing systemic automation with rigid internal oversight remains a critical corporate tightrope.

Internal control systems do not merely serve as bureaucratic speed bumps; instead, they actively propel an organization toward its strategic goals. Otoo, Kaur, and Rather (2023) evaluate this dynamic by demonstrating how robust internal control systems directly enhance overall organizational effectiveness. When management establishes clear control activities, rigorous risk assessments, and transparent information channels, they create a reliable operational environment. This structured framework prevents the mismanagement of resources and optimizes

the utility of the AIS. By enforcing strict protocols, the internal control system ensures that the AIS captures accurate, timely, and complete financial data. Consequently, this reliable data stream allows managers to make informed decisions, minimize operational waste, and ultimately boost the organization's capacity to achieve its core objectives.

The relationship between accounting information and corporate success depends heavily on the strength of internal oversight. Ghahramani (2024) analyzes this connection, revealing that internal control systems validate accounting data, which leadership then leverages to secure commercial and operational triumphs. Crucially, this research introduces a modern dimension: the mediating role of organizational ethics, particularly within non-financial reporting (such as sustainability and corporate social responsibility metrics). When an organization enforces a strong internal control system, it fosters an ethical corporate culture. This ethical environment prevents compliance teams from "greenwashing" or manipulating non-financial disclosures. Because the internal controls guarantee the integrity of both financial and non-financial data, stakeholders develop deeper trust in the company's reports. This trust directly translates into enhanced market reputation, investor confidence, and sustained corporate success.

In the fashion sector, an AIS paired with strong internal controls does not simply log clothing sales or calculate margins. Together, they form a

vital navigation system. By stabilizing inventory management (Otoo et al., 2023), enforcing ethical transparency in sustainability reporting (Ghahramani, 2024), and protecting financial workflows during rapid market shifts (Al-Okaily, 2024), this integration transforms accounting data into a powerful shield that protects both the company's profits and its public reputation.

In the manufacturing and industrial sectors—such as garment production and pharmaceuticals—managing raw materials efficiently dictates a company's financial health. Uncontrolled inventory ties up vital capital, whereas inventory shortages paralyze production lines. Managing raw materials in a large-scale manufacturing environment requires seamless coordination between data tracking and physical oversight. Ernawati, Afif & Melani (2024) demonstrating that both the ¹² Accounting Information System and internal control mechanisms significantly dictate the effectiveness of raw material inventory management.

When a garment manufacturer deploys a dedicated inventory AIS, the system automates the tracking of fabric, thread, and accessories from the moment they enter the warehouse until they hit the production floor. However, the system achieves maximum utility only when management pairs it with strict internal controls. Internal controls validate the data entering the AIS, preventing human errors, unauthorized stock withdrawals, and material theft. By establishing this dual-layered defense, the organization

minimizes raw material waste, avoids costly production delays, and ensures that the factory floor always operates with optimal stock levels. Inventory management does not begin at the warehouse gates; rather, it starts at the point of purchase. Adawiah (2018) proving that a robust raw material purchasing AIS combined with internal purchasing controls directly elevates inventory effectiveness.

In precision-heavy industries like pharmaceuticals, a specialized purchasing AIS streamlines the procurement workflow by automating purchase requisitions, generating accurate purchase orders, and matching supplier invoices against receiving reports. When internal controls govern this purchasing system, they prevent unauthorized ordering, eliminate vendor favoritism, and ensure that the company procures materials at the best possible prices. This systematic automation ensures that the pharmaceutical firm maintains an uninterrupted supply of high-quality raw materials, which in turn stabilizes the entire production schedule and keeps inventory holding costs to a minimum. When reinforced by internal controls, this integrated system eliminates data discrepancies, reduces material shrinkages, and transforms standard inventory tracking into a powerful engine for operational efficiency and cost reduction.

¹⁴ Based on the occurring phenomena, this study aims to determine how an Accounting Information System (AIS) for inventory influence the Effectiveness of Inventory Reports.

METHOD

²² This study adopts a quantitative approach to investigate the relationship between the operational variables. The primary data collection method utilizes a structured survey distributed to employees at a selected fashion company in Bandung City. The target population yields a sample size of 37 employees, to ensure equal opportunity and eliminate selection bias, the study ¹⁰ employs a simple random sampling technique to select participants. This sample comprises professionals directly involved in inventory operations, specifically drawing respondents from the warehouse department, production administration, and the supply chain staff.

¹³ The study evaluates two main categories of variables: the independent variable and the dependent variable. Independent Variable: Inventory Accounting Information System (Inventory AIS). The research measures the capability and deployment of this system across five core dimensions: Database structures; Computer hardware; Computer software; Communication networks and Operational documentation. Dependent Variable: Effectiveness of Inventory Reports, the study assesses the quality and utility of these reports based on three strategic metrics: The ability to meet demand independently without relying on suppliers; The capacity to reduce per-unit costs by leveraging bulk-purchasing economies and the

successful anticipation of market demand fluctuations.

Before running the final structural models, the researcher subjects the gathered survey data to strict quality controls. The study utilizes classical assumption tests to verify that the dataset satisfies all required statistical parameters for parametric analysis. And validity and reliability test. These diagnostics include testing for data reliable, and statistically valid. After the dataset successfully passes all classical assumption criteria, the study applies ²³ Simple Linear Regression Analysis as the primary statistical technique. This method ⁸ allows the researcher to measure the precise impact of the independent variable (Inventory AIS) on the dependent variable (Effectiveness of Inventory Reports). Through this regression model, the analysis calculates the coefficient of determination (R^2) to determine how much variance in reporting effectiveness the accounting system explains, while the t -test evaluates the overall statistical significance of the hypothesis.

RESULTS and DISCUSSION

Before executing the primary statistical analysis, the researcher subjected the dataset to rigorous data quality checks using classical assumption tests. The diagnostic evaluation focused on two critical criteria: the normality of data distribution and the absence of multicollinearity.

The researcher used the Kolmogorov-Smirnov test to evaluate whether the residuals of the

variables followed a normal distribution. The analysis generated a Significance (Sig.) value of 0.748 for the Inventory Accounting Information System (AIS) variable and a Sig. value of 0.778 for the Effectiveness of Inventory Reports variable. Because both values comfortably exceed the standard statistical threshold of 0.05, the dataset satisfies the assumption of normality. This confirms that the data is free from severe skewness and is suitable for parametric regression analysis.

⁶ The Variance Inflation Factor (VIF) to detect whether high correlations between independent variables might distort the regression results. The calculation produced a VIF value of 1.000. Since this value sits perfectly below the standard critical threshold of 10, the model exhibits zero multicollinearity. Consequently, these robust results prove that the gathered data meets all necessary statistical assumptions, ensuring that the subsequent regression analysis will yield unbiased, valid, and highly reliable estimates.

Table 1. Result of validity and reliability

Item	X	Y
Quest1	0,392	0,606
Quest2	0,501	0,413
Quest3	0,424	0,582
Quest4	0,380	0,432
Quest5	0,545	0,481
Quest6	0,472	0,661
Quest7	0,528	0,582

Quest8	0,690	0,673
Quest9	0,313	0,688
Quest10	0,440	0,674
Quest11	0,751	0,400
Quest12	0,598	0,611
Quest13	0,377	0,502
Quest14	0,790	0,591
Quest15	0,573	0,385
Cronbach's Alpha	0.866	0.844

The validity and reliability tests yield robust results for both research variables. For the AIS for Inventory variable, item-total correlation values range from 0.313 to 0.790, while the Inventory Effectiveness variable shows correlation values between 0.385 and 0.688. Because all correlation coefficients exceed the 0.30 threshold, we consider all measurement items valid. Furthermore, Cronbach's alpha coefficients reach 0.866 for AIS for Inventory and 0.844 for Inventory Effectiveness. Since both values significantly surpass the 0.60 benchmark, the instruments demonstrate high ² reliability and strong internal consistency.

⁷ The regression analysis demonstrates a strong, statistically significant relationship between the Inventory Accounting Information System (AIS) and the Effectiveness of Inventory Reports.

The statistical model establishes the linear equation as follows:

$$Y = 3.066 + 0.878X$$

The constant value (a) of 3.066 indicates that if the company leaves the Inventory AIS completely unused ($X = 0$), the Effectiveness of Inventory Reports (Y) will maintain a baseline score of 3.066 units. When the company activates and improves the system, the unstandardized coefficient Beta of 0.878 dictates the rate of improvement. This positive coefficient means that for every one-unit increase in the quality and deployment of the Inventory AIS, the Effectiveness of Inventory Reports increases by 0.878 units.

The analysis proves that this positive impact is highly reliable, as the system generates a Significance (Sig.) value of 0.000, which falls well below the standard statistical threshold of 0.05. Therefore, the researcher rejects the null hypothesis and confirms that the Inventory AIS significantly predicts reporting effectiveness.

Finally, the model calculates an R-Square value of 0.752. This coefficient of determination reveals that the Inventory AIS accounts for 75.2% of the variance in the Effectiveness of Inventory Reports. The remaining 24.8% of the variance depends on other external factors outside the scope of this specific model. This high R-Square value proves that investing in a robust Inventory AIS serves as a highly successful strategy for the fashion company to maximize the accuracy and utility of its inventory data.

The empirical findings of this study confirm that the Inventory Accounting Information System (AIS) exerts a positive and statistically significant

influence on the Effectiveness of Inventory Reports within the selected Bandung fashion company. By generating a high R-Square value of 0.752 and a significance value of 0.000, the statistical model proves that the deployment of a structured AIS directly dictates the quality, accuracy, and strategic utility of inventory data.

This significant relationship strongly aligns with and reinforces prior academic literature. Specifically, the results corroborate the findings of Ernawati, Afif & Melani (2024), who demonstrated that advanced accounting systems radically optimize raw material management on the garment factory floor by digitizing data tracking and eliminating manual communication gaps. Similarly, this study supports the conclusions of Adawiah (2018), who proved that automating procurement through a purchasing AIS prevents stockouts and stabilizes resource availability. By validating these frameworks within the fast-paced Bandung fashion sector, this research confirms that digital accounting infrastructures consistently eliminate operational bottlenecks across various manufacturing and retail environments.

Furthermore, the high predictive power of our model expands upon the broader operational theories established by Otoo, Kaur & Rather (2023). Their research highlights that robust data-driven frameworks directly maximize overall organizational effectiveness by streamlining internal communication and reducing resource waste. By supplying precise, real-time metrics on demand fluctuations and bulk-purchasing

economies, the Inventory AIS provides managers with the exact insights required to make agile decisions. This integration also introduces the structural discipline advocated by Ghahramani (2024), who emphasizes that accurate accounting information safeguards corporate success and builds stakeholder trust. When a fashion firm utilizes an automated system to generate honest, verifiable inventory data, it eliminates reporting manipulation and positions the brand to secure long-term market competitiveness.

Inventory plays a multi-dimensional role that goes far beyond simple storage. It acts as a primary protector of corporate capital through internal audit oversight (Khairunisa et al., 2023), functions as the engine of supply chain stability through real-time information control (Putra et al., 2023), and serves as a vital benchmark for controlling operational expenditures (Yeni et al., 2023). By mastering these roles, a company transforms its physical stock from an operational burden into a powerful driver of financial success.

This study enriches the existing literature on management information systems by demonstrating the specialized value of an AIS in high-volatility retail environments. The findings prove that an AIS does not merely function as a passive ¹⁸ record-keeping tool. Instead, it acts as a dynamic ¹⁸ strategic asset that directly enhances data transparency, reduces inventory holding costs, and enables firms to navigate rapid market changes.

CONCLUSION

²¹ This study investigates the relationship between digital ¹⁹ accounting infrastructure and data quality within the volatile retail sector, confirming that the ³ Inventory Accounting Information System (AIS) exerts a positive and statistically significant influence on the Effectiveness of Inventory Reports at the selected Bandung fashion company. The empirical results prove that the Inventory AIS serves as a primary driver of reporting quality, accounting for 75.2% of the variance in reporting effectiveness. By upgrading database structures, hardware, software, and communication networks, the company directly improves its capacity to anticipate market demand fluctuations, reduce per-unit costs through bulk purchasing, and satisfy consumer demand independently without relying heavily on supplier lead times. Ultimately, this research concludes that an automated Inventory AIS transforms passive record-keeping into a dynamic operational asset, allowing the fashion firm to maintain financial discipline and supply chain agility simultaneously.

This study enriches the field of management information systems by validating the specific utility of an AIS within high-volatility, trend-driven environments like the fashion industry. It provides empirical proof that a specialized inventory system goes beyond basic accounting; it acts as a critical strategic framework that enhances data

transparency, eliminates information silos, and protects the integrity of corporate reports.

The researcher gathered data exclusively from a single fashion company in Bandung City. Consequently, these findings may not fully represent smaller boutique labels or larger multinational retail corporations operating under different supply chain structures. This study focuses solely on the direct relationship between the Inventory AIS and reporting effectiveness. By limiting the scope to a single independent variable, the regression model excludes other vital internal mechanisms—such as organizational culture, corporate ethics, and internal control systems—which prior literature identifies as powerful contributors to systemic success. Future research should introduce multi-variable frameworks that incorporate mediating elements, such as internal control systems or employee training programs. Investigating how organizational culture moderates the success of an AIS will provide a more comprehensive blueprint for corporate ¹optimization.

CONFLICTS OF INTEREST

The authors declare no conflict of interest. The funders had no role in the design of the study; in the collection, analyses, or interpretation of data; in the writing of the manuscript, or in the decision to publish the results.

REFERENCES

- Adawiah, H. R. (2018). Pengaruh sistem informasi akuntansi pembelian bahan baku dan pengendalian intern pembelian bahan baku terhadap efektivitas persediaan bahan baku pada PT. IPHA Laboratories. *JASa (Jurnal Akuntansi, Audit dan Sistem Informasi Akuntansi)*, 2(2), 9-22.
- Al-Okaily, M. (2024). Assessing the effectiveness of accounting information systems in the era of COVID-19 pandemic. *VINE Journal of Information and Knowledge Management Systems*, 54(1), 157-175.
- Ernawati, L., Afif, N., & Melani, M. M. (2024). Pengaruh Sistem Informasi Akuntansi dan Pengendalian Internal Terhadap Efektivitas Pengelolaan Persediaan Bahan Baku Pada PT. Yongjin Javasuka Garment II. *Innovative: Journal Of Social Science Research*, 4(4), 1364-1375.
- Ghahramani, B. (2024). Analyzing the relationship between internal control systems and accounting information with company success: the mediating role of organizational ethics in non-financial reporting. *Ethics in Science and Technology*, 19, 84-90.
- Jarah, B. A. F., Zaqeeba, N., Al-Jarrah, M. F. M., Al Badarin, A. M., & Almatarneh, Z. (2023). The mediating effect of the internal control system on the relationship between the accounting information system and employee performance in Jordan Islamic

- banks. *Economies*, 11(3), 77.
- Khairunisa, H., Yusup, M., Sholihah, S., & Ramdani, A. (2023). Internal Audit Effect on Inventory Control: Study at One of The Garment Companies in The City of Bandung. *Acman: Accounting and Management Journal*, 3(1), 49-54.
- Otoo, F. N. K., Kaur, M., & Rather, N. A. (2023). Evaluating the impact of internal control systems on organizational effectiveness. *LBS Journal of Management & Research*, 21(1), 135-154.
- Putra, L. A. B. H., Komara, A. T., Sidharta, I., Roslina, N. Y., & Megawati, I. (2023). Information Control on Inventory Study at In One of The Garment Companies in Bandung. *Informatics Management, Engineering and Information System Journal*, 1(1), 66-76.
- Qatawneh, A. M. (2023). The role of organizational culture in supporting better accounting information systems outcomes. *Cogent Economics & Finance*, 11(1), 2164669.
- Yeni, N., Komara, A. T., Suzanto, B., & Rusjiana, J. (2023). The effect of cost accounting information systems on operational cost control: Study at a consulting company in the city of Bandung. *Acman: Accounting and Management Journal*, 3(1), 28-34.
- Yoshikuni, A. C., Dwivedi, R., Dutra-de-Lima, R. G., Parisi, C., & Oyadomari, J. C. T. (2023). Role of emerging technologies in accounting information systems for achieving strategic flexibility through decision-making performance: an exploratory study based on North American and South American firms. *Global Journal of Flexible Systems Management*, 24(2), 199-218.

INFORME DE ORIGINALIDAD

9%	6%	5%	2%
INDICE DE SIMILITUD	FUENTES DE INTERNET	PUBLICACIONES	TRABAJOS DEL ESTUDIANTE

FUENTES PRIMARIAS

1	www2.mdpi.com Fuente de Internet	1%
2	Bogere George Kipaalu, Nazarious Rukanyangira, Richard Mwirumubi. "Internal Control System and Public Funds Management in Uganda: A Case of Local Governments in the Busoga Sub-Region", Open Journal of Social Sciences, 2025 Publicación	1%
3	so06.tci-thaijo.org Fuente de Internet	1%
4	Submitted to Cairns State High School Trabajo del estudiante	<1%
5	Submitted to Adtalem Global Education, Inc. Trabajo del estudiante	<1%
6	journal2.uad.ac.id Fuente de Internet	<1%
7	www.sciencepublishinggroup.com Fuente de Internet	<1%
8	Harish L. Reddy, M. S. Nagakumar. "Chapter 19 Modeling the Impact of Delay Causal Factors Using PLS-SEM Approach in the Context of Highway Projects in India", Springer Science and Business Media LLC, 2024 Publicación	<1%
9	api-kwasuspace.kwasu.edu.ng Fuente de Internet	<1%
10	epu.edu.iq Fuente de Internet	<1%
11	ethicsjournal.ir Fuente de Internet	<1%
12	media.neliti.com Fuente de Internet	<1%
13	www.coursehero.com Fuente de Internet	<1%

14	Hamood Mohammed Al-Hattami, Nabil Ahmed Mareai Senan, Mohammed A. Al-Hakimi, Syed Azharuddin. "An empirical examination of AIS success at the organizational level in the era of COVID-19 pandemic", Global Knowledge, Memory and Communication, 2022 Publicación	<1 %
15	journal.lemlit.org Fuente de Internet	<1 %
16	Manaf Al-Okaily. "Assessing the effectiveness of accounting information systems in the era of COVID-19 pandemic", VINE Journal of Information and Knowledge Management Systems, 2021 Publicación	<1 %
17	Nathanya Abigail Hery Pengsin, Ola Meyasa. "Determinants of Breast Self-Examination Practices Among Female Vocational High School Students", SIGn Journal of Public Health, 2025 Publicación	<1 %
18	banglajol.info Fuente de Internet	<1 %
19	international.areai.or.id Fuente de Internet	<1 %
20	mgmt.cmb.ac.lk Fuente de Internet	<1 %
21	rbgn.emnuvens.com.br Fuente de Internet	<1 %
22	www.lse.ac.uk Fuente de Internet	<1 %
23	jurnal.stiepas.ac.id Fuente de Internet	<1 %

Excluír citas
Excluír bibliografía

Apagado
Activo

Excluír coincidencias

Apagado