

The Impact of Accounting Information Systems on Strategic and Operational Managerial Decisions

Nur Wahyunianti Dahri, Rohsita Amalyah Rasyid, Agus Halim and Muhammad Aqil

Universitas Muhammadiyah Mamuju

Email: nurwd@unimaju.ac.id rhs.rasyid@gmail.com agushalim1510@gmail.com, muh_aqil@unimaju.ac.id

Article Info

Accounting Information Systems, Managerial Decision-Making, Qualitative Research, Public Sector, Bantaeng Regency

Abstract

This study aims to investigate the role of Accounting Information Systems (AIS) in supporting managerial decision-making processes at the Bantaeng Regency Government. The research adopts a qualitative descriptive approach to explore how effectively AIS contributes to decisions at the managerial level. Data were collected through observations, in-depth interviews, and documentation. The data analysis process involved three main stages: data reduction, data presentation, and conclusion drawing or verification. The results show that the AIS implemented in Bantaeng Regency plays a critical role in management decision-making due to its computerized structure and the overall quality of the system, which has proven to be both effective and efficient. The AIS facilitates access to accurate, timely, and relevant information, allowing managers to make more informed and strategic decisions. However, the research also found several challenges in the system's operational implementation, particularly related to network instability, which occasionally disrupts business operations and transaction processing. Despite these technical issues, the overall functionality and purpose of the AIS in supporting managerial decisions remain intact. The study concludes that a reliable and well-integrated accounting information system significantly contributes to the quality and speed of decision-making in public sector organizations. Future research is suggested to explore AIS implementation across different departments and identify strategies to overcome technical barriers. This study provides practical implications for improving AIS infrastructure to enhance managerial performance.

1. Introduction

Management Information Systems (MIS) are one of the five main subsystems of Computer-Based Information Systems (CBIS), designed to meet the general information needs of managers across various organizational units. These subunits may be categorized based on functional areas or management levels. MIS provides information to users in the form of reports and outputs generated from mathematical model simulations, presented in tabular or graphical formats. Behavioral factors significantly influence information system performance, particularly in organizational-level systems such as MIS. Therefore, managers and information specialists must develop programs that transform potentially negative behavioral impacts into positive outcomes. MIS reflects an executive mindset that emphasizes the importance of making computing tools accessible to decision-makers throughout the organization. When properly implemented, MIS

facilitates problem identification and understanding for both internal and external stakeholders.

In parallel, accounting information systems (AIS) are indispensable for organizations in managing daily operational activities, particularly for processing financial data and producing reliable accounting information. A well-functioning AIS can provide a clear and comprehensive overview of organizational performance (Mardiono & Hwihanus, 2022). In this regard, managers require timely and relevant information to ensure efficient and effective decision-making. Given the volume and complexity of organizational data, it is impractical for management to process all information manually; thus, the integration of computerized information systems is essential.

AIS plays a critical role in facilitating managerial decisions, especially with the adoption of computerized systems that enhance

the accuracy, timeliness, and accessibility of financial data. These systems contribute to improved employee performance by simplifying tasks, which in turn enhances overall organizational productivity. According to Adisel & Thadi (2020), a reliable AIS not only minimizes the risk of operational deviations but also supports high productivity and alignment with corporate goals.

In the context of operational procurement, such as the acquisition of office supplies, AIS functions as a vital decision-support tool. Procurement activities, often coordinated through the purchasing department, require efficient information systems to ensure proper inventory control and cost efficiency. A robust AIS helps organizations minimize operational costs while maximizing effectiveness, especially by leveraging Document Management Systems (DMS) for data storage, retrieval, and documentation processing.

Furthermore, technology-driven AIS enable businesses to enhance their competitive advantage by automating business processes, such as purchasing workflows. For instance, purchase requisitions initiated by the warehouse department can be seamlessly processed by the procurement team through integrated systems. Ensuring timely availability of materials avoids inefficiencies that could disrupt operations. The purchasing department thus plays a pivotal role in supply chain management and operational continuity.

Based on the background and relevance of AIS to managerial functions, this study aims to investigate the extent to which accounting information systems support decision-making processes within organizations. The research is conducted under the title: "The Role of Accounting Information Systems in Managerial Decision-Making."

2. Literature Reviews

2.1 . Accounting Information Systems

An **Accounting Information System (AIS)** is a system that collects, records, stores, and processes financial and accounting data to produce information useful for decision-

makers. It comprises people, procedures and instructions, data, software, information technology infrastructure, internal controls, and security measures. According to Romney and Steinbart (2018), "An accounting information system is a system that collects, records, stores, and processes data to produce information for decision-makers. It includes people, procedures and instructions, data, software, information technology infrastructure, internal controls, and security measures."

Turner, Weickgenannt, and Copeland (2017) emphasize that an AIS encompasses the processes, procedures, and systems that capture accounting data from business processes, record it in appropriate ledgers, and process it through classification, summarization, consolidation, and reporting to internal and external users. Manaye (2016) further explains that AIS serves as a system to collect, analyze, and distribute financial and accounting data for decision-makers, including managers, clients, creditors, and tax authorities.

2.2 Principles and Benefits of Accounting Information Systems

An effective AIS must adhere to the following **principles**:

1. **Timeliness** – The system must provide accurate and relevant information in a timely manner to meet organizational needs.
2. **Security** – The system should help safeguard the company's assets and ensure data integrity.
3. **Cost-effectiveness** – The implementation cost should be reasonable and proportionate to the benefits obtained.

The **benefits** of implementing an AIS in an organization include:

- Providing timely and accurate information to support effective value chain activities.
- Enhancing product and service quality while reducing operational costs.
- Improving operational efficiency.
- Facilitating more informed and strategic decision-making.
- Enhancing knowledge sharing across the organization.

- Increasing productivity, especially in financial departments.

2.3 Components, Functions, and Objectives of Accounting Information Systems

AIS is an essential component of organizational infrastructure that manages financial and non-financial information to support decision-making processes. The **six key components** of AIS are:

1. **People** who operate and use the system.
2. **Procedures and instructions** for collecting, processing, and storing data.
3. **Data** related to organizational activities and transactions.
4. **Software** applications that process the data.
5. **IT infrastructure**, including hardware, peripherals, and communication networks.
6. **Internal controls and security measures** to protect data integrity and prevent unauthorized access.

The **functions** of AIS include supporting financial reporting, facilitating internal control, ensuring regulatory compliance, and enabling strategic planning and budgeting. Its **main objective** is to provide relevant, accurate, and timely information for internal and external stakeholders to support effective decision-making.

2.4 Managerial Decision-Making

Managerial decision-making is the process of identifying problems or opportunities and selecting the most optimal solutions to achieve organizational goals. It involves evaluating alternatives based on effectiveness, efficiency, and organizational alignment. Decision-making in management can be **strategic, tactical, or operational**, depending on the scope and impact of the decisions.

1. Decision-Making Process:

- a. **Problem Identification** – Recognizing the need for a decision.
- b. **Information Gathering** – Collecting relevant data and insights.
- c. **Evaluation of Alternatives** – Assessing potential solutions.

- d. **Selection of Best Alternative** – Choosing the most effective and efficient option.
- e. **Implementation** – Executing the chosen decision.
- f. **Outcome Evaluation** – Assessing the impact and making necessary adjustments.

2. Types of Managerial Decisions:

- a. **Strategic Decisions:** Long-term, high-impact decisions such as investments, organizational restructuring, and defining vision/mission.
- b. **Tactical Decisions:** Mid-term decisions related to resource allocation and policy implementation, including marketing, production, and finance.
- c. **Operational Decisions:** Routine, day-to-day decisions such as procurement, employee scheduling, and quality control.

3. Factors Influencing Decision-Making:

- a. **Internal factors:** Values, goals, and organizational resources.
- b. **External factors:** Market conditions, competition, government regulations.
- c. **Information and time constraints.**
- d. **Decision-maker psychology:** Including perception, attitude, and experience.

4. Benefits of Effective Decision-Making:

- a. Enhanced operational effectiveness and efficiency.
- b. Improved organizational competitiveness.
- c. Increased customer satisfaction.
- d. Sustainable growth and long-term organizational success.

3. Research Methodology

This study adopts a **descriptive qualitative research** design. According to Moleong (2017, p. 6), qualitative research aims to understand phenomena experienced by research subjects such as behaviors, perceptions, motivations, and actions in a holistic manner. This is achieved through descriptive narratives expressed in words and

language within a natural context, utilizing various naturalistic methods.

Hendryadi et al. (2019, p. 218) define qualitative research as a **naturalistic inquiry** that seeks to gain an in-depth understanding of social phenomena in their natural settings. This approach emphasizes **quality over quantity**, with data collected not through structured questionnaires but through techniques such as **interviews, direct observation, and relevant official documentation**. Furthermore, qualitative research places greater emphasis on the **process** rather than merely on outcomes, as the interrelationships among various elements under study become clearer when observed throughout the research process.

4. Results and Discussion

4.1 Accounting Information Systems

Accounting Information Systems (AIS) play a critical role in ensuring the continuity and development of companies. AIS facilitate the provision of financial and operational information, particularly in support of managerial decision-making. As such, the implementation of a reliable and efficient AIS is essential for enhancing organizational performance.

The implementation of AIS has been computerized through the use of enterprise resource planning (ERP) systems such as SAP (System Application and Product in Data Processing). SAP enables efficient data processing and provides numerous benefits to organizations, including:

1. Improved customer service by streamlining the sales process through integrated accounting functionalities.
2. Enhanced efficiency in production planning, as real-time market demand and inventory data can be accessed promptly.
3. Accelerated recording and processing of financial data, enabling faster and more accurate decision-making.
4. Increased data security and mitigation of risks related to unauthorized access.

Despite these advantages, organizations may encounter technical constraints, such as

network disruptions, that impede optimal system performance. Nonetheless, AIS that are implemented in accordance with organizational procedures continue to generate high-quality information. This information includes company data and financial reports, which significantly contribute to enhanced employee performance and organizational productivity. According to McLeod (cited in Frisdayanti, 2019), high-quality information should possess the following characteristics:

- **Accuracy:** Information should reflect actual conditions.
- **Timeliness:** Information must be available when needed.
- **Relevance:** Information should be pertinent to the needs of users.
- **Completeness:** Information must be comprehensive and include all necessary details.

4.2 The Role of AIS in Managerial Decision-Making

Decision-making, as defined by Robbins (2007), involves selecting the best option from multiple alternatives. Terry (2003) further explains that it entails choosing a behavioral alternative to resolve a specific issue. Accounting, derived from the term "accounting" (meaning to count or account for), involves recording, classifying, summarizing, managing, and presenting data related to financial transactions. Sugiri and Riyono (2018) describe accounting as a service activity providing quantitative information, especially financial data, to support rational and economic decision-making.

AIS support decision-making by collecting, processing, and producing comprehensive organizational data, including financial transactions, sales, purchases, revenues, expenditures, employee data, and inventory needs. Chusnawati et al. (2019) highlight the roles of accounting information in decision-making as follows:

1. Stimulating management to identify issues.
2. Differentiating among alternative courses of action.

3. Outlining the consequences of each alternative.
4. Assisting in evaluating and selecting the best course of action.

Due to their efficiency and effectiveness, AIS are indispensable for managerial decision-making and employee task performance. Even though strategic planning is typically centralized, branch managers play an integral role in operational execution. They are responsible for guiding various business aspects, setting branch targets, managing budgets, addressing customer satisfaction, and reporting on market trends. Consequently, AIS is vital for enabling informed decisions at all organizational levels.

According to Bukhori Alma (1993), business encompasses activities in agriculture, production, construction, distribution, transportation, communication, services, and government that are involved in producing and marketing goods and services. Boone (2007) views business as the pursuit of profit through the provision of goods and services needed by the economy.

Winwin Yadianti and Ilham Wahyudin (2020) define accounting as an information system that identifies, records, and communicates economic events within an organization to interested stakeholders. The core accounting activities include:

1. **Identification** of economically relevant events such as debt payments or credit sales.
2. **Recording** financial activities systematically and chronologically in monetary units.
3. **Classification and Summarization** of economic events for reporting purposes.

5. Conclusion

1. AIS have been implemented and computerized using SAP software. Although technical challenges such as poor network connectivity occasionally hinder system optimization, these issues are not significant barriers. The system continues to be effectively utilized by both employees and

the organization. The high quality of information generated enhances employee performance and overall company productivity.

2. AIS play a significant role in managerial decision-making. The system provides financial data, sales records, procurement, income, expenditure, inventory requests, and employee information. Consequently, management, particularly at the branch level, can make timely and informed decisions. Despite centralized planning, branch managers are crucial for ensuring operational targets are met effectively.

References

- Adisel, & Thadi, R. (2020). Sistem Informasi Manajemen Organisasi Perannya dalam Pengambilan Keputusan dan Pemecahan Masalah. *Journal of Administration and Educational Management (ALIGNMENT)*, 3(2), 145–150.
- Chusnawati, D., Setiono, H., & Ainiyah, N. (2019). Analisis Akuntansi Diferensial dalam Pengambilan Keputusan Menerima atau Menolak Pesanan Khusus. *Universitas Islam Majapahit Mojokerto*.
- Dewi, U. N., Lawita, N. F., & Puspitasari, D. P. (2021). Pengaruh Pengendalian Internal Sistem Informasi Akuntansi Dan Profesionalisme Auditor Internal Terhadap Upaya Pencegahan Fraud. *HUMMANSI*, 4(1).
- Dani, S. D., & Ramli, M. (2022). Pengaruh Strategi Pemasaran Terhadap Keputusan Penggunaan Jasa Transportasi Online. *Jurnal Ekonomi Revolusioner*, 7(9).
- Dangkeng, A., Ramli, M., & Nurfaisah, N. (2022). Cost of Production to Determine Selling Price in Gowa Jaya Cake. *Invoice: Jurnal Ilmu Akuntansi*, 5(1), 17–23.
- Frisdayanti, A. (2019). Peranan Brainware dalam Sistem Informasi Manajemen. *Jurnal Ekonomi dan Manajemen Sistem Informasi*, 1(September), 63. <https://doi.org/10.31933/JEMSI>
- Habibie, S., & Ramli, M. (2022). Analisis Faktor-Faktor Yang Mempengaruhi Minat Masyarakat Dalam Berwirausaha. *Jurnal Ekonomi Revolusioner*, 7(9).
- Harnengsih, S., Indupurnahayu, & Hurriyaturrohman. (2018). Peranan Sistem Informasi Akuntansi Berbasis Teknologi. *Neraca Keuangan: Jurnal*

Ilmiah Akuntansi dan Keuangan, 13(2), 1–13.

- Mardiono, V. E. P., & Hwihanus. (2022). Peranan Sistem Informasi Akuntansi Terhadap Pengambilan Keputusan. *MRI: Jurnal Manajemen Riset Inovasi*, 1(1), 210.
- Mariana, L., & Ramli, M. (2022). The Effect of Communication and Motivation on Employee Performance. *Economos: Jurnal Ekonomi dan Bisnis*, 5(3), 259–267.
- Ramli, M., et al. (2022). Analysis of Factors that Influence Student Interest in Entrepreneurship. *Point of View Research Economic Development*, 5(1).
- Ramli, M., Ichsan, N., & Pirman, P. (2022). The Effect of Production Costs on Weaving Craftsmen's Income. *Jurnal Ekonomi Balance*, 18(2), 208–220.
- Syahrman. (2020). Peranan Sistem Informasi Akuntansi dalam Mengambil Keputusan Manajemen. *Jurnal Bisnis Net*, 3, 185–191.
- Tahir, S., & Ramli, M. (2022). Pengaruh Job Description dan Sistem Kerja terhadap Produktivitas Kerja Karyawan. *Management and Accounting Research Statistics*, 4(3), 33–43.