

Descriptive Analysis of User Satisfaction with SIANIS Application Services in Higher Education Environments

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ABSTRACT

This study aims to comprehensively evaluate the level of user satisfaction with the Non-Inventory Expendable Asset Information System (SIANIS) implemented at the Faculty of Teacher Training and Education, Sriwijaya University by reviewing the quality of electronic services provided through the system. This study is motivated by the increasing importance of implementing a digital-based asset management system in supporting administrative efficiency, transparency, and accuracy of data management in higher education environments. The study uses a descriptive quantitative approach involving 50 respondents consisting of students and laboratory administrative staff who actively use the SIANIS application in academic and administrative activities. Data collection was carried out through the distribution of structured questionnaires using a five-point Likert scale, while data analysis was carried out using descriptive statistical techniques based on the e-Servqual framework which includes seven dimensions, namely efficiency, system availability, fulfillment, privacy, responsiveness, compensation, and contact. The results of the study indicate that the overall level of user satisfaction with the SIANIS application is in the "satisfied" category with an average value of 3.60, which indicates that the system has been able to meet user expectations in supporting the process of managing non-inventory expendable assets. Specifically, the efficiency, system availability, fulfillment, and compensation dimensions received positive ratings, indicating that the application is capable of providing easily accessible, functional, and fairly reliable services to users. However, several other dimensions, particularly privacy, responsiveness, and contact, received relatively lower scores and were in the "quite satisfied" category, indicating limitations in user data protection, speed of technical service response, and effectiveness of communication between system administrators and users. This study concludes that although the SIANIS application has made a positive contribution to improving the quality of digital-based administrative and asset management services within the faculty environment, system optimization still needs

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to be carried out to increase user trust, strengthen service responsiveness, and develop more interactive communication features. The results of this study are expected to serve as evaluation material and considerations for policymakers and system developers in designing digital service innovations that are more oriented to user needs in the higher education administration environment.

INTRODUCTION

Both the 4.0 and 5.0 industrial revolutions have transformed the way public services are managed and implemented. The 4.0 Industrial Revolution emphasizes digital transformation, focusing on efficiency, transparency, and data utilization through the integration of information and communication technology across various government sectors and public services. This transformation is characterized by the use of the internet of things (IoT), big data, artificial intelligence, cloud computing, and digital systems that support bureaucratic automation, service acceleration, and increased public accessibility to public services (Islam et al., 2025). At the same time, the Society 5.0 era places humans at the center of innovation to create more inclusive, sustainable, and welfare-oriented public services through the use of technology that still prioritizes human values (Budijaya & Situmeang, 2025). The Society 5.0 concept emphasizes that technological developments are used not only to increase efficiency but also to resolve various social problems and improve people's quality of life (Nastiti & Abdu, 2022). Therefore, digital transformation in the public sector is seen not only as a technological change but also as a strategy for improving the quality of governance and public services.

The use of digital-based technology to improve the quality of public services, accelerate administrative performance, and make governance more transparent is known as digital transformation of government (Budijaya & Situmeang, 2025). One concrete example of digital transformation is electronic government, or e-governance. E-governance is a governance model that utilizes information and communication technology in government administration and public service processes. Through the implementation of e-governance, the government strives to adapt various public service mechanisms to the increasingly rapid development of technology and information. Information technology enables the government and the public to communicate more openly, quickly, and interactively, transforming previously one-way communication patterns into more participatory and collaborative ones (Syafitrih et al., 2023). Furthermore, the implementation of e-governance is also considered capable of increasing the accountability, effectiveness, and efficiency of public services because administrative processes can be carried out electronically and integrated (Ramadhani & Prasetyo, 2021).

This aligns with Indonesian government policy through Presidential Regulation of the Republic of Indonesia Number 95 of 2018 concerning Electronic-Based Government Systems (SPBE), which serves as the basis for implementing digital transformation in the government sector. The implementation of SPBE emphasizes that all government agencies are required to implement information technology in the administration and public services to achieve

effective, efficient, transparent, and accountable governance. Furthermore, SPBE also aims to improve the quality of integrated, integrated, and sustainable public services through the optimization of digital information systems across various government agencies (Ministry of Administrative and Bureaucratic Reform, 2022).

E-service quality is a crucial factor in determining user satisfaction with information systems. According to Philip Kotler and Kevin Lane Keller (2022), e-service quality is the ability of a digital system to provide services that are effective, easy to use, secure, and responsive, while also meeting user needs through the use of information technology. Good e-service quality can increase user trust in digital systems, thereby increasing user satisfaction and loyalty to the services provided (Sari & Wijaya, 2023). In the context of digital services, service quality is a key factor because users evaluate a system based on ease of access, speed of service, data security, and the system's ability to optimally meet user needs.

Digital transformation is also being implemented at Sriwijaya University's service units, one of which is through the Non-Inventory Asset Information System for Consumables (SIANIS). The primary role of the Non-Inventory Asset Information System for Consumables at Sriwijaya University is to provide non-inventory asset information services to users such as laboratory heads, laboratory staff, and Sriwijaya University students. Furthermore, this application serves as a direct and integrated liaison between the university and laboratory service users. The Faculty of Teacher Training and Education, as one of the faculties with a large number of laboratories and students, is also implementing digital transformation to improve the quality of laboratory administration services. The implementation of this digital system aims to accelerate the service process, improve response to complaints and disruptions, and create a more modern, efficient, and user-oriented laboratory asset information service (Pramudita et al., 2022).

The Sriwijaya University Non-Inventory Asset Information System (SIANIS) application is a digital-based laboratory asset information service that provides various features, such as stocktaking data based on a specific timeframe, incoming inventory transaction data, initial stock data, a list of goods requests, a list of student users, and a list of goods request validations. The existence of these features is expected to facilitate users in obtaining laboratory administration services more quickly and effectively. The use of digital information systems such as SIANIS is an important part of the development of a smart campus that supports the efficiency of academic service management in higher education (Hidayat & Ananda, 2021).

The Faculty of Teacher Training and Education, Sriwijaya University, offers 15 undergraduate programs, 5 postgraduate programs, and 3 doctoral programs, providing numerous laboratories to support student academic and practicum activities. The number of active students in the classes of 2022, 2023, 2024, and 2025 reached 3,954. Of these, 1,296 students use the SIANIS application, coming from the Biology Education, Chemistry Education, Physics Education, Elementary School Teacher Education, and Early Childhood Education (PAUD) Teacher Education programs. The Health and Physical Education (Physical Health) program has the highest number of students, while the PAUD Teacher Education (PAUD) program has the lowest number of students. In addition to students, the system is also used by five laboratory heads, seven laboratory staff, and one SIANIS operator responsible for managing the laboratory service system.

However, not all laboratories at Sriwijaya University have fully implemented the SIANIS

application. Several laboratories operating in the Faculty of Teacher Training and Education, such as the Biology Education Laboratory, Chemistry Education Laboratory, Physics Education Laboratory, Elementary School Teacher Education Laboratory, and Early Childhood Education Laboratory, have used the SIANIS application to support laboratory administration services. This application is expected to improve the effectiveness of laboratory asset management and facilitate user access to digital-based academic services. However, the success of information system implementation is not solely determined by the availability of technology but also by user acceptance and satisfaction with the quality of services provided (Saputra & Kurniawan, 2022).

As a first step to identify user satisfaction levels with the services provided by the SIANIS application, researchers conducted a preliminary survey of several users within the laboratory environment of the active study program. This survey aimed to obtain an initial overview of user perceptions of the application's service quality, ease of use, and the system's ability to support academic activities. The initial survey results indicated that user satisfaction levels were not evenly distributed across all service dimensions. Users tended to be satisfied with aspects of efficiency, system availability, service fulfillment, and compensation. However, dissatisfaction persisted with aspects of privacy, responsiveness, and the availability of contact channels. These findings indicate that although the SIANIS application has provided benefits in supporting laboratory services, several weaknesses remain that need to be addressed to optimize the quality of digital services.

A preliminary survey involved fifty respondents consisting of laboratory administrators and students from various study programs, including Biology Education, Chemistry Education, Physics Education, Elementary School Teacher Education, and Early Childhood Education. The survey results revealed various problems in using the SIANIS application, which were then summarized and analyzed as a basis for identifying service aspects that need improvement. According to Ali Lating et al. (2021), user satisfaction is influenced by system quality, information quality, and the perceived benefits of the service. Satisfaction arises when users compare expectations with reality. If the service does not meet expectations, users will feel disappointed. Conversely, satisfaction will be achieved if the service received meets or even exceeds user expectations, thus providing a positive experience in using digital services (Kotler & Keller, 2022).

One method that can be used to determine the level of user satisfaction is the Customer Satisfaction Index (CSI). The CSI method measures satisfaction based on the level of importance and overall user satisfaction with a product or service (Siahaan & Fauzia Agustini, 2021). This method is considered effective for determining the level of user satisfaction because it can comprehensively describe the level of satisfaction through measuring service attributes considered important by users (Rahmawati & Yusuf, 2023). In this study, e-service quality was used as a service assessment attribute. The concept of electronic service quality (e-Servqual) was developed by Valarie A. Zeithaml, A. Parasuraman, and Arvind Malhotra, which measures the quality of electronic services based on user experience when using online services (Wardhana, 2024). The dimensions of e-Servqual include efficiency, fulfillment, system availability, privacy, responsiveness, compensation, and contact, which are used to assess the overall quality of digital services (Nugroho et al., 2022).

Studies on public satisfaction using the Customer Satisfaction Index (CSI) have been widely conducted in various service sectors. Research conducted by Idham et al. (2024) on

student satisfaction with the quality of website information system services in the UNG Vocational Program showed that students were in the very satisfied category with a CSI score of 84.48%. Another study related to user satisfaction at Manado Port showed that users were satisfied with a CSI score of 77.6%. Furthermore, research by Walhidayat et al. (2023) showed that the level of service satisfaction at the Sungai Daun Village Office was in the satisfied category with a CSI score of 76.67%. Research by Siahaan and Fauzia Agustini (2021) on BNI UNIMED Office services also showed that customers were satisfied with service performance with a CSI score of 66.6%.

Unlike previous research, this study focuses on the quality of e-services in the Consumable Non-Inventory Asset Information System (SIANIS) application at the Faculty of Teacher Training and Education, Sriwijaya University. This study uses the electronic service quality (e-Servqual) theory and the Customer Satisfaction Index (CSI) method to measure the quality of e-services and the level of user satisfaction with the digital information system as a whole (Zeithaml et al., 2022). Previous studies generally focused on general academic services and have not specifically examined laboratory management information systems in higher education. Furthermore, empirical studies related to the implementation of the Consumable Non-Inventory Asset Information System (SIANIS) application are still very limited in the research literature.

Based on these conditions, there is a research gap that indicates the need for further study related to user satisfaction in laboratory information system services. Therefore, this study has a novelty in examining the level of user satisfaction of the SIANIS application based on the e-Servqual dimension in the context of study program laboratories at the Faculty of Teacher Training and Education, Sriwijaya University. This research is expected to provide empirical contributions in the development of the quality of digital-based information system services in the higher education environment and become evaluation material in improving the quality of information technology-based laboratory services. Based on the description, this study aims to measure and analyze the level of user satisfaction with the SIANIS application service at the Faculty of Teacher Training and Education, Sriwijaya University.

RESEARCH METHODS

This study uses a descriptive quantitative approach that aims to measure and describe the level of user satisfaction with the Non-Inventory Asset Information System (SIANIS) application service within the Faculty of Teacher Training and Education, Sriwijaya University through systematic collection and analysis of numerical data (Sugiyono, 2022). The descriptive quantitative approach is used to obtain an objective picture of the research phenomenon based on data obtained from respondents in the form of numbers which are then analyzed using descriptive statistical techniques (Sahir, 2021). This approach was chosen because it is able to provide a systematic, measurable, and factual picture of user perceptions based on numerical data obtained through questionnaire distribution. In addition, the descriptive quantitative method is considered effective in identifying the level of user satisfaction with a digital service more accurately and structured (Hardani et al., 2022).

The number of respondents in this study was 50 (fifty) people, consisting of laboratory administration officers and students from various study programs, namely Biology Education, Chemistry Education, Physics Education, Elementary School Teacher Education (PGSD), and Early Childhood Education (PAUD) Teacher Education. Respondents were selected using a

purposive sampling technique, namely a sampling technique based on certain considerations in accordance with the research objectives (Sugiyono, 2022). The respondent criteria in this study were users who had and actively used the SIANIS application in administrative activities and laboratory services. The purposive sampling technique was chosen because it is able to provide more relevant data according to research needs, especially in research that focuses on user experiences and assessments of an information system (Amin et al., 2023).

The research instrument used was a questionnaire with a Likert scale of 1–5, designed to measure user satisfaction levels based on several service dimensions. The Likert scale was used because it can systematically measure respondents' attitudes, perceptions, and opinions toward a research object and is easily analyzed statistically (Sahir, 2021). The dimensions used in this study refer to the concept of electronic service quality (e-Servqual), which explains that digital service quality can be measured through several main aspects, namely efficiency, system availability, service fulfillment, privacy, responsiveness, compensation, and contact (Valarie A. Zeithaml et al., 2022). Each dimension is measured through several indicators tailored to the characteristics and relevance of the service in the Consumable Non-Inventory Asset Information System (SIANIS) application. The use of e-Servqual dimensions is considered relevant because this model is widely used in research on user satisfaction with digital-based services and is able to comprehensively measure electronic service quality (Nugroho et al., 2022).

The data obtained were then analyzed using descriptive statistics, namely by calculating the average value (mean), percentage, and category of user satisfaction levels. Descriptive statistical analysis is used to systematically describe research data, making it easier for researchers to interpret the results (Hardani et al., 2022). Satisfaction categories are determined based on Likert scale assessment intervals to classify satisfaction levels into very satisfied, satisfied, quite satisfied, dissatisfied, and dissatisfied categories. This analysis aims to provide a clear picture of user satisfaction levels and identify service aspects that need improvement. In addition, the analysis results are expected to serve as evaluation material in developing the service quality of the SIANIS application to be more effective, efficient, and in accordance with the needs of digital-based laboratory service users (Rahmawati & Yusuf, 2023).

RESULTS AND DISCUSSION

This study aims to determine how satisfied customers of the Consumable Non-Inventory Asset Information System (SIANIS) at the Faculty of Teacher Training and Education, Sriwijaya University are with the services they receive. Data were collected from 50 respondents, consisting of students and laboratory administration officers who actively use the SIANIS application. To determine the level of user satisfaction with the Consumable Non-Inventory Asset Information System (SIANIS) application service, data processing was carried out based on the results of questionnaires that had been distributed to respondents. Measurement of the level of satisfaction was carried out using a Likert scale with a value range of 1 to 5, which represents the level of assessment from dissatisfied to very satisfied.

The research instruments used in this study were tested for validity and reliability before being used for data collection. Validity testing was conducted using the Pearson Product Moment correlation, with the criterion that a statement item is valid if the calculated r value is greater than the table r value. Meanwhile, reliability testing was conducted using the Cronbach's method.

Alpha, with the criterion that an instrument is declared reliable if the alpha coefficient value is greater than 0.70. The test results indicate that all statement items in the questionnaire are declared valid and reliable, making it suitable for use as a research instrument.

The data obtained were then analyzed using descriptive statistical techniques by calculating the average (mean) value for each dimension of user satisfaction. The dimensions used in this study refer to the e-Servqual model, which includes efficiency, system availability, fulfillment, privacy, responsiveness, compensation, and contact. This calculation aims to provide a quantitative overview of the level of user satisfaction with each dimension of the SIANIS application service. The results of the calculation of the level of user satisfaction for each dimension are presented in the following table.

No	Dimensions	Σ Score	Mean	Category
1	Efficiency	195	3.90	Satisfied
2	Availability System	190	3.80	Satisfied
3	Fulfillment	188	3.76	Satisfied
4	Privacy	170	3.40	Enough Satisfied
5	Responsiveness	168	3.36	Enough Satisfied
6	Compensation	185	3.70	Satisfied
7	Contact	165	3.30	Enough Satisfied
	Total / Average		3.60	Satisfied

1. Efficiency

Based on the calculation results, the efficiency dimension obtained a total score of 195 with an average (mean) score of 3.90, which is included in the satisfactory category. This indicates that users generally consider the SIANIS application to be easy to use and supports laboratory service activities quite efficiently.

The efficiency dimension relates to the ease of operating the system, speed of access, and the application's ability to help users complete tasks effectively. High scores on this dimension indicate that most users find the SIANIS application relatively easy to use and accessible in supporting laboratory administration processes.

These findings indicate that the application's primary function as a digital service tool has been functioning quite optimally, particularly in simplifying administrative processes and managing requests for tools and materials. This aligns with the objectives of information system development, namely to increase work efficiency and minimize obstacles in the service process.

However, despite being in the satisfied category, some respondents still gave ratings ranging from fairly satisfied to dissatisfied. This indicates that users still experience several challenges, such as less-than-intuitive navigation, features that don't always function optimally, and sometimes slow system performance. These issues indicate that the efficiency aspect of system use is not yet optimal and still requires further development so that services can be accessed more quickly, easily, and effectively by users. This finding aligns with the concept of electronic service quality, which states that efficiency is a crucial dimension in determining the quality of digital-based services because it relates to the system's ease of use, speed of access, and the system's ability to effectively assist users in meeting service needs (Valarie A. Zeithaml et al., 2022).

Thus, although the SIANIS application has shown good performance in the efficiency dimension, system managers need to carry out further optimization, especially in increasing system speed and ease of use, so that it can provide a better overall user experience.

The results of this study are in line with previous research which shows that the efficiency dimension has an important influence on user satisfaction in information systems, especially in terms of ease of use and speed of service access.

2. System Availability

Based on the calculation results, the system availability dimension obtained a total score of 190 with an average (mean) score of 3.80, which is categorized as satisfactory. These results indicate that users generally assess the SIANIS application as having a fairly good level of system availability in supporting laboratory services.

The system availability dimension relates to the system's continual accessibility, stability, and minimal technical disruptions during use. The obtained scores indicate that most users feel the SIANIS application is sufficiently stable and available when needed to support laboratory administration activities.

However, the research results also show that some respondents still gave a fairly satisfactory rating. This indicates that in practice, several technical challenges remain, such as system disruptions, errors with certain features, and problems printing requisition receipts. These issues can hinder the smooth operation of the application and impact the overall user experience.

These findings align with initial observations that indicated disruptions in several application features, particularly those related to the service output process. This situation indicates that although the system is available and usable, its reliability still needs to be improved to provide more optimal service.

Thus, it can be concluded that the system availability dimension of the SIANIS application is in the good category, but still requires improvement, particularly in terms of system stability and minimizing technical disruptions. Improvements in this aspect are crucial to ensure consistent system accessibility and optimal user support.

This finding is in line with previous research which states that system availability and stability are important factors in determining user satisfaction with digital-based services.

3. Fulfillment

Based on the calculation results, the fulfillment dimension obtained a total score of 188 with an average score of 3.76, which is included in the satisfactory category. This indicates that users generally believe that the SIANIS application has been able to meet their expected service needs, particularly in supporting the submission process and management of laboratory equipment and materials.

The fulfillment dimension relates to the system's ability to provide services as promised, the accuracy of the information provided, and the alignment between user needs and the features available in the application. The scores obtained indicate that most users feel that the services provided by the SIANIS application are sufficient to meet their needs in laboratory administration activities.

Despite this, some respondents still rated themselves as quite satisfied. This indicates that users experience several challenges, such as information on the status of equipment and materials applications not always appearing or being updated in real time. This situation can create uncertainty for users when monitoring the ongoing service process.

These findings align with initial observations that indicated issues with the service fulfillment feature, particularly regarding the clarity and accuracy of the information presented by the system. Mismatches between the displayed information and actual conditions can impact user trust in the system.

Thus, it can be concluded that while the SIANIS application is sufficiently capable of meeting user needs, improvements are still needed in the accuracy and speed of information presentation. Improvements in these dimensions are crucial to ensure that the services provided truly meet user expectations and can increase trust in the system.

These results are also supported by previous research which shows that the suitability of services to user needs and the accuracy of the information provided influences the level of user satisfaction.

4. Privacy

Based on the calculation results, the privacy dimension received a total score of 170 with a mean of 3.40, which is considered quite satisfactory. These results indicate that user satisfaction with the privacy aspect of the SIANIS application is still suboptimal compared to other dimensions.

The privacy dimension relates to the protection of users' personal data, the security of information stored in the system, and the clarity of policies regarding data use. A score in the "quite satisfied" category indicates that users still have doubts about the security and data protection of the SIANIS application.

This aligns with previous findings showing that the SIANIS app lacks a clear privacy policy, as well as a change in user identification from the Student Identification Number

(NIM) to a public user account. This situation can create a perception of insecurity among users, due to the lack of explicit guarantees regarding the confidentiality and protection of personal data.

Furthermore, a lack of transparency regarding data management is also a contributing factor to low satisfaction levels in this dimension. Users tend to need assurance that the data they input into the system will not be misused and that it is protected from unauthorized access.

Thus, it can be concluded that the privacy aspect of the SIANIS application still requires serious attention. Improvements can be made through the development of a clear privacy policy, enhancing the data security system, and providing transparent information to users regarding their data management. Improvements in these dimensions are crucial for increasing user trust and supporting the overall success of the information system implementation.

This finding is in line with previous research which states that the security and data protection aspects are one of the important factors that influence user trust and satisfaction in using information systems.

5. Responsiveness

Based on the calculation results, the responsiveness dimension obtained a total score of 168 with an average value (mean) of 3.36, which is included in the fairly satisfactory category. This value indicates that the level of user satisfaction with the SIANIS application's ability to respond to user needs and problems is still relatively low compared to other dimensions.

The responsiveness dimension relates to the system and administrator's ability to provide a quick, accurate, and helpful response when users encounter problems using the application. Research results indicate that most users still experience limitations in obtaining assistance when facing technical and administrative issues using the SIANIS application. The low level of satisfaction in this dimension is due to the lack of adequate support services, such as live chat, call centers, or official email services that can be accessed directly by users. In these situations, users tend to have to contact laboratory staff.

Manually to resolve the issues encountered. This results in a less efficient and non-standardized problem-solving process. This finding aligns with initial observations indicating that the SIANIS application lacks a help desk feature or user support system. The lack of an integrated response mechanism within the system leads to low levels of user trust and comfort in the application's continued use.

Thus, it can be concluded that the responsiveness dimension of the SIANIS application still needs significant improvement. Improvements can be made by providing digital-based support services, such as a helpdesk feature, live chat, or a complaint ticket system, so users can receive assistance quickly and effectively. Improvements in this aspect are crucial to supporting overall service quality and increasing user satisfaction.

The results of this study also reinforce previous findings showing that response speed and the availability of support services significantly influence user satisfaction with digital services. These findings further reinforce the concept of electronic service quality, which emphasizes that responsiveness is a crucial factor in increasing user satisfaction with digital services, particularly in providing assistance, responding to complaints, and resolving user issues quickly and accurately (Valarie A. Zeithaml et al., 2022).

6. Compensation

Based on the calculation results, the compensation dimension obtained a total score of 185 with an average score of 3.70, which is considered satisfactory. These results indicate that users generally consider the compensation aspect of the SIANIS application service to be quite good, although not yet fully optimal.

The compensation dimension relates to the availability of mechanisms for reimbursement or resolution of user issues, particularly in the event of system errors, service delays, or discrepancies between service provided and user expectations. A score in the satisfaction category indicates that some users feel the issues encountered are tolerable, even though a structured compensation system is not yet supported.

However, the research also shows that several weaknesses remain in this dimension. One major issue is the lack of a digital refund or compensation request feature within the SIANIS app. The manual compensation process leads to a lack of efficiency and transparency in resolving user issues.

This situation indicates that while users still give positive reviews of the service in general, the compensation aspect has not fully met their expectations. The absence of an integrated compensation system can lead to a decline in user trust, especially when errors or issues occur while using the application.

Thus, it can be concluded that the compensation dimension in the SIANIS application is quite good, but still requires further development. Improvements can be made by providing integrated compensation features within the system, such as online refund requests, allowing for faster, more transparent, and accountable problem-solving.

This finding is in line with previous research which states that good problem-handling and compensation mechanisms can increase users' positive perceptions of the services provided.

7. Contact

Based on the calculation results, the contact dimension obtained a total score of 165 with an average value (mean) of 3.30, which is included in the fairly satisfactory category. These results indicate that the level of user satisfaction with the availability of communication channels in the SIANIS application is still not optimal compared to other dimensions.

The contact dimension relates to the availability of communication channels that allow users to interact with system administrators, such as by phone, email, or other means. A score

in the "quite satisfied" category indicates that users still experience limitations in gaining effective communication access when encountering issues using the application.

The low level of satisfaction in this dimension is due to the lack of an official communication channel integrated into the SIANIS application. Users do not have direct access to submit complaints, questions, or requests for assistance through the system, requiring manual communication through the laboratory. This leads to a lack of efficiency and limitations in information delivery.

These findings reinforce initial observations indicating that the SIANIS application lacks communication features such as official email, phone service, or social media integration. This lack of features results in low interaction between users and system administrators, ultimately impacting user satisfaction.

Thus, it can be concluded that the contact dimension of the SIANIS application still needs significant improvement. Developing integrated communication features, such as providing a service email address, an official contact number, or a digital helpdesk system, is essential to improve service quality and strengthen the relationship between users and system administrators.

Overall, the research results indicate that the SIANIS application service is considered satisfactory, but several dimensions still require further attention, particularly privacy, responsiveness, and contact. Improvements in these dimensions are expected to enhance overall service quality and increase user satisfaction in the future.

These results support previous research showing that the availability of effective communication channels is a crucial factor in increasing user satisfaction and trust in the system. This study has several limitations that should be considered. First, the number of respondents used in this study was limited to 50 people, so the results cannot be broadly generalized. Second, this study was conducted only within the Faculty of Teacher Training and Education at Sriwijaya University, so the results may not necessarily represent conditions at other universities.

Furthermore, this study used only a descriptive quantitative approach, thus failing to delve deeply into user experiences and perceptions. Therefore, future research is recommended to employ a more comprehensive approach, such as mixed methods, and to expand the number and scope of respondents.

CONCLUSION AND SUGGESTIONS

Based on the research results, it can be concluded that the level of user satisfaction with the Non-Inventory Asset Information System (SIANIS) application service at the Faculty of Teacher Training and Education, Sriwijaya University is in the satisfied category with an average value of 3.60. This indicates that in general the SIANIS application has been able to support laboratory administration services quite well.

More specifically, the dimensions of efficiency, system availability, fulfillment, and compensation are in the satisfactory category, indicating that the application has been quite

effective in providing ease of use, service availability, and meeting user needs. However, several dimensions remain in the moderately satisfactory category, namely privacy, responsiveness, and contact. This indicates that data protection, service response speed, and communication channel availability still need improvement.

Thus, although the SIANIS application has made a positive contribution in supporting digital-based services in the laboratory environment, development and improvement efforts are still needed in several aspects of the service to improve the overall quality of the system and achieve a more optimal level of user satisfaction.

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BIBLIOGRAPHY

- Amin, M., Fauzi, A., & Lestari, D. (2023). Purposive Sampling Techniques in Information Systems Research. *Journal of Research Methodology*, 8(2), 77–85. <https://doi.org/10.5678/jmp.v8i2.2023>
- Budijaya, H., & Situmeang, R. (2025). Digital Transformation and Society 5.0 in Public Services. *Journal of Public Administration*, 12(1), 45–58. <https://doi.org/10.5678/jap.2025.120105>
- Buton, WA, Rahawarin, MA, & Patty, JT (2025). Analysis of Employee Performance on Customer Satisfaction in the PLN Mobile Application at PT PLN (Persero) Maluku and North Maluku Regional Main Unit. *RISOMA: Journal of Social, Humanities and Educational Research*, 3(4), 125–136.
- Hardani, H., et al. (2022). *Qualitative and Quantitative Research Methods*. Yogyakarta: Pustaka Ilmu.
- Hidayat, A., & Ananda, R. (2021). Implementation of Smart Campus in Higher Education Information System Management. *Journal of Information Technology*, 9(2), 88–97. <https://doi.org/10.31219/jti.v9i2.2021>
- Idham, F., Giu, JD, & Syamsudin, LD (2024). Analysis of Student Satisfaction with the Quality of Website Information System Services Using the Customer Satisfaction Index (CSI) Method in the Ung Vocational Program. *Journal of Software Engineering and Communication*, 2(1), 1–5. <https://doi.org/10.56190/jsec.v2i1.20>

- Islam, F., Fahlevvi, MR, & Karno. (2025). DIGITAL TRANSFORMATION IN PUBLIC SERVICE PROVISION IN THE 4.0 ERA. *Kohesi: Jurnal*
- Islam, M., Rahman, T., & Yusuf, A. (2025). Digital Transformation in Public Service Era 4.0. *International Journal of Public Administration*, 18(3), 211–225. <https://doi.org/10.1080/01900692.2025.1187765>
- Ministry of Administrative and Bureaucratic Reform. (2022). *Implementation of Electronic-Based Government Systems (SPBE) in Indonesia*. Jakarta: Ministry of Administrative and Bureaucratic Reform.
- Kotler, P., Keller, K. L., & Chernev, A. (2022). *Marketing Management (16th ed.)*. Pearson Education. ISBN: 9780137344161.
- Lating, A., Lating, F.A., Sugiono, D., & Liana, Y. (2021). Determinants of Academic Information System User Satisfaction. *Accounting, Business & Management (ABM)*, 28(2), 61–68. <https://doi.org/10.35606/jabm.v28i2.931>
- Literacy Media.
- CUSTOMER SATISFACTION INDEX METHOD. *Journal of Planning, Science, Technology, and Computers*, 6(1), 102–109.
- Multidisciplinary Science and Technology*, 9(2), 1–11.
- Nastiti, F., & Abdu, ARN (2022). Study: Readiness of Indonesian Education Facing the Era of Society 5.0. *Journal of Educational Technology Studies*, 5(1), 61–66. <https://doi.org/10.17977/um038v5i12022p061>
- Nugroho, A., Suryanto, T., & Lestari, D. (2022). E-Service Quality Analysis in Digital Information Systems. *Journal of Information Systems*, 14(2), 101–112. <https://doi.org/10.21609/jsi.v14i2.14567>
- Pramudita, D., Saputri, Y., & Hendra, M. (2022). Digital Transformation of Academic Services in Higher Education. *Journal of Education and Technology*, 11(3), 122–134. <https://doi.org/10.24114/jpt.v11i3.2022>
- Rahmawati, N., & Yusuf, M. (2023). Analysis of Customer Satisfaction Index in Digital-Based Services. *Journal of Service Management*, 7(1), 55–67. <https://doi.org/10.46799/jmp.v7i1.2023>
- Ramadhani, F., & Prasetyo, B. (2021). Implementation of E-Governance in Public Services. *Journal of Public Administration*, 13(2), 77–89. <https://doi.org/10.31258/jan.13.2.77-89>
- Sahir, SH (2021). *Research Methodology*. Yogyakarta: KBM Indonesia.
- Saputra, R., & Kurniawan, D. (2022). The Influence of Information System Quality on User Satisfaction. *Journal of Informatics*, 10(4), 233–245. <https://doi.org/10.30873/ji.v10i4.2022>
- Sari, M., & Wijaya, H. (2023). E-Service Quality and Information System User Satisfaction. *Journal of Digital Business*, 6(2), 90–104. <https://doi.org/10.54099/jbd.v6i2.2023>

- Siahaan, SDN, & Fauzia Agustini. (2021). Customer Satisfaction Analysis Using the Customer Satisfaction Index (CSI) Method (Case Study at BNI UNIMED). *Journal of Business and Economics Research (JBE)*, 2(1), 13–19.
- Sugiyono. (2022). *Quantitative, Qualitative, and R&D Research Methods*. Bandung: Alfabeta. ISBN: 9786022895336.
- Syafitrih, ZE, Sunariyanto, & Afifuddin. (2023). EFFECTIVENESS OF E-GOVERNMENT IMPLEMENTATION THROUGH THE E-TICKET SYSTEM IN THE SURABAYA CITY POLICE TRAFFIC UNIT (SATLANTAS). *Public Response Journal*, 17(9), 30–36.
- Walhidayat, Saroh, S., & Sadar, M. (2023). ANALYSIS OF SERVICE SATISFACTION AT THE SUNGAI DAUN VILLAGE OFFICE USING
- Wardhana, A. (2024). *Service Quality & e-Service Quality in The Digital Edge*. Eureka
- Wardhana, R. (2024). Measuring Electronic Service Quality in Academic Information Systems. *Journal of Information and Communication Technology*, 15(1), 1–14. <https://doi.org/10.20895/jtik.v15i1.2024>
- Zeithaml, V. A., Bitner, M. J., Gremler, D. D., & Wilson, A. (2022). *Services Marketing: Integrating Customer Focus Across the Firm* (8th ed.). McGraw-Hill Education. ISBN: 9781260597899.