

Analysis Of Factors Influencing The Implementation Of Hospital Management Information Systems At Santa Elisabet Hospital Medan In 2025

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ABSTRACT

SIMRS is an information communication technology system that processes and integrates the entire flow of hospital service processes in the form of a network of coordination, reporting and administrative procedures to obtain information precisely and accurately, and is part of the Health Information System. This study aims to analyze the factors that influence the implementation of the hospital management information system. This study uses a sample of 70 people, obtain by total sampling. Qualitative data are analyzed univariately, bivariately, and multivariately, qualitative data are analyzed using interactive analysis (interviews). Based on the results of quantitative research at the univariate stage, it is known that from the respondents studied as many as 70 respondents, most of the respondents were aged 26-36 years, namely: 32 (45.7%). S1 nursing education level 29 people (41.4%), bivariate results show that there is an influence of HR ($P = 0.017$) Organization ($P = 0.001$) and technology ($P = 0.023$) on the implementation of the Hospital management information system, while the most dominant variable is the Technology variable. the results of qualitative research show that employees have been able to operate SIMRS, and in general all units have used SIMRS, it is hoped that Santa Elisabeth Hospital Medan will increasingly optimize the use of SIMRS for effective and efficient services. The conclusion of this study is that there is an influence of HR, Organization and Technology on the implementation / implementation of the Hospital Management Information System at Santa Elisabeth Hospital Medan.

Keywords: *Human Resource, Organization, Technology, SIMRS*

INTRODUCTION

Regulation of the Minister of Health of the Republic of Indonesia Number 1171/MENKES/PER/VI/2011 Article 1 Paragraph 1 states that "every hospital is required to implement SIMRS." SIMRS is an important component in achieving quality improvement efforts. SIMRS generally aims to integrate information systems from various subsystems, collect, present, and process hospital data to generate the necessary information for decision-making by the hospital.

SIMRS is an integrated information system designed to manage the entire hospital management process, from patient care systems and procedures, medical records, pharmacy, pharmaceutical warehouse, billing, personnel database, employee payroll, accounting processes, to management control.

In this digital era, hospitals are required to adapt to information technology to improve service quality. However, not all hospitals have been successful in this regard. According to several studies, factors such as management support, user training, technological

infrastructure, and organizational culture can significantly impact the success of SIMRS implementation (Almeida et al., 2020; Hossain & Hossain, 2019).

The general objective of this study is to analyze the factors that influence the implementation of SIMRS at Santa Elisabeth Hospital in Medan.

METHODS

This type of research is quantitative research with a survey design to identify and analyze factors that influence the implementation of the Hospital Management Information System (SIMRS). The population is the subject or object of focus in this study, taking into account characteristics that are relevant to the research being conducted. The population in this study consists of 70 structural officers and staff directly involved in the use of SIMRS.

RESULTS

1. The Influence of Human Resources on the Implementation of the Hospital Information System at Santa Elisabeth Hospital in Medan in 2025

Human Resources	Implementation						P-value
	Poor		Good		Total		
	f	%	F	%	f	%	
Capable	57	81,4	10	14,3	67	95,7	0,017
Not Capable	5	7,1	0	0	5	7,1	
Total	62	88,6	10	14,3	72	100	

Based on Table , it is known that out of 70 respondents who were studied, the majority of respondents stated that human resources were capable of implementing SIMRS, namely 60 (85.7%) respondents, while 10 (14.3%) respondents stated that human resources were not capable of implementing SIMRS properly. Based on the above calculations, the statistical test yielded a significance level of $P = 0.017 < 0.05$. Therefore, it can be concluded that there is an influence of human resources on the implementation of SIMRS at Santa Elisabeth Hospital in Medan in 2025.

2. The Influence of Organization on the Implementation of SIMRS at Santa Elisabeth Hospital, Medan, in 2025

Organization	Implementation						P-value
	Poor		Good		Total		
	f	%	F	%	f	%	
Supportive	5	8,5	54	91,5	59	100	0,001
Not Supportive	5	45,5	6	54,5	11	100	
Total	10	14,3	60	85,7	70	100	

Based on Table 4.8 above, it is known that out of 70 respondents who were studied, the majority stated that the organization supports the implementation of SIMRS, with 59

(91.5%) respondents, while 11 (8.5%) respondents stated that the organization does not support the implementation of SIMRS.

Based on the above calculations, it is known that the statistical test results obtained a P-value significance of: $0.001 < 0.05$. Therefore, it can be concluded that there is an influence of the organization on the implementation of SIMRS at Santa Elisabeth Hospital in Medan in 2025.

3. The Influence of Technology on the Implementation of SIMRS at Santa Elisabeth Hospital Medan in 2025

Technology	Implementation						p-value
	Poor		Good		Total		
	f	%	F	%	f	%	
Capable	7	10,0	56	80,0	63	90,0	0,02
Not Capable	3	4,3	4	5,7	7	10,0	
Total	10	14,3	60	85,7	70	100	

Based on Table above, it is known that out of 70 respondents studied, the majority stated that the technology was adequate for the implementation of SIMRS, with 63 (90.0%) respondents. The remaining 7 (10.0%) respondents stated that the technology was inadequate for the implementation of SIMRS at Santa Elisabeth Hospital in Medan in 2025.

Based on the above calculations, it is known that the statistical test results obtained a P-value of $0.02 < 0.05$. Therefore, it can be concluded that there is an influence of technology on the implementation of SIMRS at Santa Elisabeth Hospital in Medan in 2025.

DISCUSSION

The general objective of this study is to analyze the factors that influence the implementation of SIMRS at Santa Elisabeth Hospital in Medan. The specific objectives of this study are as follows:

- a. To analyze and describe the influence of human resources on the implementation of SIMRS at Santa Elisabeth Hospital in Medan.
- b. To analyze and describe the influence of organization on the implementation of SIMRS at Santa Elisabeth Hospital in Medan.
- c. To analyze and describe the influence of technology on the implementation of SIMRS at Santa Elisabeth Hospital in Medan.

The results of the study indicate that the three variables studied—human resources, organization, and technology—mutually influence each other in determining the factors affecting the implementation of the Hospital Management Information System at Santa Elisabeth Hospital in Medan, with a p-value of <0.05 . From this study, it was found that among the three variables, one variable had the most dominant influence, namely the Technology variable.

CONCLUSION

Based on research entitled Analysis of factors affecting the implementation of hospital management information systems at Santa Elisabeth Hospital in Medan in 2025.

1. Quantitative Conclusions

- 1) There is an influence of human resources on the implementation of SIMRS at Santa Elisabeth Hospital in Medan
- 2) There is an influence of organization on the implementation of SIMRS at Santa Elisabeth Hospital in Medan

- 3) Technology has an influence on the implementation of SIMRS at Santa Elisabeth Hospital in Medan
- 4) The most influential variable in SIMR at Santa Elisabeth Hospital in Medan in 2025 is the organizational variable

2. Qualitative conclusions

- 1) Staff are able to operate the SIMRS system at Santa Elisabeth Hospital in Medan.
- 2) The SIMRS system is already in place across all service units at Santa Elisabeth Hospital in Medan.
- 3) There is hope that the implementation of the SIMRS system at Santa Elisabeth Hospital in Medan can be improved further, with continued support from management through ongoing training for staff to enhance their proficiency in operating the system, thereby ensuring more effective and efficient service delivery.

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