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# Analysis Of Information System Acceptance And Puskesmas Management (Simpus) In Tasikmadu Karanganyar Puskesmas

Prianggi Herawati<sup>1</sup>, Ario Kresno<sup>2</sup>, Prawisty Agnes<sup>3</sup>

Department, Bachelor of Health Administration, Kusuma Husada University Surakarta

#### \*Email:

herawatiprianggii@gmail.com

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#### **ABSTRACT**

Technological developments in Indonesia require the government to move quickly to implement a fast, accurate and up-to-date information system in the health sector. In implementing this information system, the government created an information system (SIMPUS). The national e-health strategy is a comprehensive approach to planning, developing, implementing and evaluating the use of information and communication technology in the health sector nationally, which is becoming a trend in global health services, namely electronic health records. Information systems at community health centers have been developed to overcome problems such as data input, as a primary data source for managing health statistical data. Simpus is an application program or computer software created with the aim of supporting community health center management in providing services quickly and easily to patients. Optimal use of SIMPUS can reduce workload and increase the efficiency of registration services to patients. This study aims to analyze the characteristics of the SIMPUS sample at the Tasikmadu Karanganyar Community Health Center. Research Method is a Observational research with a cross-sectional study design was conducted in Tasikmadu. Results Shows that the largest profession is nurse /midwife /laboratory /pharmacist /healthanalysis /physiotherapy with 28 (50.00%) people, while the smallest profession is general practitioner/functional/dentist with 5 (12.50%).

**Keywords:** Information Systems, Community Health Centers, SIMPUS, Applications

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## INTRODUCTION

Health development means sufficient resources, appropriate policy direction and health development strategies, so that limitations or lack of availability of accurate, precise and fast data and information makes it difficult for policy makers to make the right decisions. Data and information are strategic resources in managing health development, namely in the management process, government decision making, and implementing accountability. (Eni, H., et al. 2020).

The development of information technology influences and supports changes in various aspects, one of which is the health sector. The development of information technology is an opportunity that makes it easier to strengthen and develop health information systems. In line with the United Nations (UN) policy in the 2007 Global Information Society Watch (GISW), it is stated that all member countries are asked to apply information and communication technology (ICT) in integrated development infrastructure. The integration system includes e-Government, e-business, e-learning (e-education), electronic health (e-helath), e-employee, e-environment, e-agriculture and e-science.

The health sector cannot be separated from e-health which is defined as the use of information and communication technology to support the health sector and matters related to health, knowledge

and research. Another definition of e-health is the application of information and technology (ICT) in the health sector which has the potential to increase the efficiency of health services, expand the reach of services and improve patient outcomes. (Eni, H., et al. 2020).

The implementation of e-health in several countries has not been carried out optimally. Research in America explains that of the countries in America that implement national e-health policies, there are only 26.3% of entities that carry out regulatory quality, safety and reliability oversight for e-health. The same as research in Bangladesh, even though e-health has been implemented since 2011, only less than a quarter of the programs can be evaluated. In developing countries there are obstacles to implementing e-helth, due to the unavailability of resources and system readiness to guide implementation and evaluation. The implementation of e-health in Indonesia is covered by the Minister of Health Regulation of the Republic of Indonesia number 97 of 2015. There are 8 applications available in e-health including (medical records, laboratory information, pharmaceutical information, patient registration system, patient tracking, evaluation and monitoring system, clinical support systems, patient reminder systems, collection and research systems.

According to research from (Jeremia et., all 2020). This research examines the level of use of the hospital's online registration application which is influenced by the expected effort and expected performance due to individual trust with experience as a moderator. This research uses a survey approach. The sampling technique is purposive sampling with the results providing the meaning that to form satisfaction with online application services, the expected performance is established due to trust.

According to research from (Anton et., all 2019). Very sophisticated technology with one of its goals being to facilitate the implementation of services, people's familiarity with various technological products such as laptops, smart phones, and the availability of increasingly cheap internet connections are also increasingly providing opportunities to utilize information and communication technology in implementing online systems.

Digital public services in the era of industrial revolution 4.0 are a necessity. The concept of digital public services leads to effective principles. Effective means carrying out something correctly, while efficient means carrying out something correctly. Public services at the lowest level are at the RT and RW levels as the spearhead in determining the course of action for government programs, both central and regional. RW has a very big role in achieving the goals and targets of government programs because RW is the one who knows best the existing conditions in its residents' environment. Digital public services are expected to provide convenience for anyone who needs access. Digital public services are characterized by the use of media other than paper or what is often called paperless.

Technology has an important role so that digital public services can run as they should. Nowadays, almost everyone can run or operate a device, meaning that everyone can have convenience because they can access information easily through the device they own. The challenges faced in implementing digital public services must be faced by having managerial competence and serving competence. When these two competencies are collaborated, they will create superior service quality. This superior service quality can be reflected in the satisfaction of service users, in this case local residents. (Ani, 2021).

The Puskesmas Information System is a system that provides information to assist the decisionmaking process in carrying out the management of the Puskesmas to achieve its activity targets. Recording is a series of activities to document the results of observations, measurements or calculations at each step of the health efforts carried out by the health center (Puskesmas RI, No. 31 of 2019). A community health center or puskesmas is a public health service facility and a first-level individual health effort, prioritizing promotional and preventive efforts in its work area (Permekes RI, No. 43 of 2019). The Puskesmas Management Information System (SIMPUS) is an application that helps record and report activities at the Puskesmas. In fact, SIMPUS is a development of SP2TP which is a manual recording and reporting activity. The existence of a computerized SIMPUS will really help officers in presenting information quickly, precisely and reliably., so that the information provided by community health centers can be used for decision making at various levels of the health system and various types of health management, so that it can improve the quality of service to the community (Hakam, 2016). Information system evaluation is a process for exploring and finding out about the extent of an information system implementation activity, both from the perspective of perception, users, organizations, and in terms of the information system technology system (Hakam, 2016). According to Sari in (Safitri., 2017) the standards used to evaluate a particular activity can be seen from three main

aspects, namely Utility (benefit), The results of the evaluation should be useful for management for making decisions regarding ongoing programs; Accuarcy (accurate) Information on evaluation results should have a high level of accuracy; Feasibility (feasible), The designed evaluation process should be implemented properly.

According to (Hakam., 2016) this method tries to evaluate the use of information systems, by placing important components in information, namely Human - Organization - Technology as well as the suitability between these three components. Criteria that can be used to assess the quality of information include completeness, accuracy, timeliness, availability of relevance, consistency and data entity. Meanwhile, service quality focuses on the overall support received by the system or technology service provider. Service quality can be assessed by response speed, assurance, empathy and service follow-up. (According to Evrilyan., 2017). HOT FIT is a theoretical framework used to evaluate information systems. This model is a combination of the information system success model and Delone and Mclean and Morton's IT Organization Fit Model. The HOT-FIT model explains comprehensively in the form of a comprehensive interpretation, the reciprocal relationship between operating, organization, process and technology. This evaluation method clarifies all the components contained in the information system itself.

Standard Uprational Procedures (SOP) are guidelines or references for carrying out work tasks in accordance with the functions and performance assessment tools of the health center system which are based on technical, administrative and procedural indicators in accordance with the relevant verbs. The purpose of the SOP is to create commitment regarding hospital work units. to realize good governance. SOPs are used to measure the performance of public organizations related to program accuracy and time. Apart from being used to assess the performance of public organizations in the form of responsiveness, accountability and accountability of hospital work in Indonesia.

The update of this title is "Analysis of the Acceptance of the Community Health Center Information and Management System (SIMPUS) at the Tasikmadu Karanganyar Community Health Center" to form SIMPUS at the Tasikmadu Public Health Center."

### **METHODS**

The population in this study were all employee officers at the Tasikmadu Karanganyar health center. The samples in this study were patients at Puskeskkmas Colomadu 1, every day. Samples were drawn using "Purposive Sampling", namely a technique for determining samples with certain considerations". The reason for selecting samples using Purposive Sampling is because not all samples have the criteria that the author has determined. The inclusion criteria used as samples in this study are as follows Has Use and Paword, long service, Still working, Willing to fill out a questionnaire and/or be interviewed To determine the size of the research sample, the Slovin formula is used, namely: (Notoatmodjo, 2010)

The population in this study was 55 samples per day, all "Analysis of the Acceptance of the SIMPUS Health Center Information and Management System at the Tasiskmadu Karanganyar Health Center". Meanwhile, the sample in this study were Employee Officers at the Tasiskmadu Karanganyar Community Health Center. A total of 55 samples. The sampling technique uses random sampling technique. According to inclusion, there are 41 samples. This research was conducted in Tasiskmadu Karanganyar, with a research time allocation of 10 months, November 2023- July 2024.

Research with the title "Analysis of the Acceptance of the SIMPUS Health Center Information and Management System at the Tasiskmadu Karanganyar Health Center". It has 2 variables, namely the independent variable and the dependent variable. The independent variable in the research is Information and Management Systems, and the dependent variable in the research is Management Information Analysis at the Tasikmadu Karanganyar Community Health Center

Based on the theoretical framework, the tools or instruments used to collect data are developed. The research tool or instrument used in this case is a questionnaire. The questionnaire is used as an interview guide to collect data from research subjects or respondents regarding officers who have use names, passwords and are still actively working. analysis of problems in the use of the Community Health Center Information and Management System (SIMPUS) at the Tasikmadu Karanganyar Community Health Center.

Data collection in this research was through primary data collection, namely by conducting direct interviews using questionnaires and secondary data held by the Tasikmadu Karanganyar

Community Health Center. Apart from that, researchers also use library studies and research literature studies in the data collection process.

# **RESULTS**

Results Shows that the largest profession is nurse /midwife /laboratory /pharmacist /healthanalysis /physiotherapy with 28 (50.00%) people, while the smallest profession is general practitioner/functional/dentist with 5 (12.50%).

### **DISCUSSION**

In this research, in implementing a fast, accurate and up-to-date information system in health, it turns out that there is an even newer system at the Tasikmadu Karanganyar Community Health Center. When collecting research data at the Tasikmadu Karanganyar Community Health Center with the results of interviews using the SIMPUS system from 2003 to 2017 with the collaboration of PT Matkom, in 2023-2024 the Ministry of Health's one healthy update is based on the latest SIMPUS system, then according to employees the advantages of the SIMPUS system are that it is more time efficient (patient/treatment waiting room) and patient personal data are also safe and can serve all areas of administrative services for patients. And make it easier to obtain and process data, fulfill regulations, ensure patient data security. The disadvantage of the SIMPUS system itself is that it has a web seffer, if the internet decides the lights go out, the automatic system cannot be used.

The results of a questionnaire questionnaire with several employees showed that the largest profession was nurse/midwife/laboratory/pharmacist/health analysis/physiotherapy with 28 (50,005) people, while the smallest profession was general practitioner/functional/dentist with 5(12.50%) people. Patients are very enthusiastic about the services at the Tasikmadu Karanganyar Community Health Center, without having to wait too long. The results of the research presented by the analysis include subjects related to the frequency distribution of respondents' characteristics based on name, age, gender, length of service, length of use of SIMPUS, Characteristics of the Employee Professional Sample. The results of the research sample show that the characteristic data (dichotomy) is based on the sample characteristics of gender, namely, showing that the majority of subjects are male, 8 female, 32.

profession Sampleistic characteristics based the of General Practitioner/Functional/Gygician, the frequency is 5, the percentage is 12.5, the sample of the profession is Nurse/Midwife/Laboratory/Pharmacist/Health Analysis/Physiotherapy, the frequency shows 28 and 50 percentages, the sample of the Medical Record profession has a frequency of 7 and a percentage of percent. Based on Table 5, it shows that the largest nurse/midwife/laboratory/pharmacist/health analysis/physiotherapy with 28 (50.00%) people, while the smallest profession is general practitioner/functional/dentist with 5 (12.50%).

### **CONCLUSION**

Technological developments in Indonesia mean that the government must move quickly to implement a fast, accurate and up-to-date information system in the health sector. In implementing this information system, the government created an information system (SIMPUS). The national e-health strategy is a comprehensive approach to planning, developing, implementing and evaluating the use of information and communication technology in the health sector nationally, which is becoming a trend in global health services, namely electronic health records. Information systems at community health centers have been developed to overcome problems such as data input, as a primary data source for managing health statistical data. Simpus is an application program or computer software created with the aim of supporting community health center management in providing services quickly and easily to patients. Optimal use of SIMPUS can reduce workload and increase the efficiency of registration services to patients.

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