



# Implementation of regional government information systems in the regional financial management study at the tolitoli regency environmental service

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## ARTICLE INFO

### Article history:

Received Jun 19, 2023

Revised Jun 24, 2023

Accepted Jul 06, 2023

### Keywords:

Financial;  
Management;  
SIPD.

## ABSTRACT

The era of digitalization affects the performance of an institution or organization, especially regional apparatus. It is necessary to apply regional government information systems to each existing regional device in order to provide convenience, smoothness, and optimization related to financial management. An integrated financial management system, through systems and networks as well as computerized technology, facilitates work units in existing regional apparatus so as to improve organizational performance and achievements. Through the implementation theory of Van Meter and Van Horn (1975), it is hoped that it can provide knowledge related to the implementation of local government information systems at the Tolitoli Environmental Service. Based on qualitative data analysis, it was found that: 1) Policy Standards and Targets have been running well, useful in setting and planning in accordance with the achievement of key performance indicators; 2) Operators are the key to the success of the system supported by the availability of facilities in the form of computerized devices and networks; 3) In terms of the characteristics of the implementing organization, the Environmental Service is an implementing element of the regional government in the environmental sector with the status of a mandatory affair that is not related to basic services; 4) Inter-organizational communication runs well and; 5) Disposition and Attitude of Executors in the form of knowledge and implementation of structured policies.

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## INTRODUCTION

Digital transformation has brought enormous changes to civilization, including in Indonesia, a developing country that expects progress in various sectors (Ellitan, 2020; Ilmi et al., 2020; Mazya, T. M., Nurrochmat, D. R., Kolopaking, L. M., Satria, A., & Dharmawan, 2023; Pangandaheng et al., 2022; Sun et al., 2023; Villafuerte & Zhang, 2022). In general, governance in Indonesia has implemented information system technology for more comprehensive financial management,

including transparency, accountability, and full responsibility (H Sofyani, HA Riyadh, 2020; R Masdar, AC Furqan, 2021). Starting from all of this, the central and regional governments are trying to apply information system technology to various regional financial management issues.

The Regional Government Information System (SIPD) is one of the solutions and alternatives that is considered effective and efficient for implementing various policies and programs as well as development activities in the regions that are in line with the direction of development in the central government (Grillitsch, M., Hansen, T., Coenen, L., Miörner, J., Moodysson, 2019; Iqbal et al., 2022; Parks, 2022; Shiferaw et al., 2014; Winkel et al., 2022). This is stated in Permendagri No. 77 of 2020 concerning Technical Guidelines for Regional Financial Management. The new legal basis rules should replace Permendagri No. 13 of 2006, which substantially still uses the SIMDA application in regional financial management (Manengkey et al., 2023; Nasution & M.Si, 2021). The Regional Government Information System (SIPD) is an integrated application that is used as a tool for local governments to increase the effectiveness of the implementation of various regulations in the field of regional financial management (Jati et al., 2022; Laoli et al., 2022).

With the enactment of the latest regulations, starting in 2020, budget planning in various regions is carried out through the SIPD application, which is integrated with the central server via the website and internet network as a form of budget oversight and control. In this way, each regional agency or device automatically plans a budget through SIPD. This is necessary in order to realize the quality of development planning through the availability of accurate and complete data and information (Saputra, 2020). One of the areas that has implemented the use of the SIPD application is Tolitoli Regency. The SIPD application is still relatively new for operators or employees in various regional agencies, so its implementation still requires learning and strengthening knowledge, abilities, and competencies. In this case, because it is still in the transitional stage of use, every agency, even the Regional Development Planning Agency (BAPPEDA) and the Office of Finance as the leading sector, still needs to learn more about how to apply it in the stages of financial planning in each agency.

In relation to the application of SIPD in each agency, the Tolitoli Environmental Service, through the Program Subdivision, has implemented and practiced its use since the end of 2020. Because it is still something new, the authors are interested in further studying the use of this application through a research title, namely "Implementation of Local Government Information Systems in Regional Financial Management. Study at the Tolitoli Regency Environmental Service". The purpose of this study was to determine the application of the Local Government Information System in Regional Financial Management at the Tolitoli Regency Environmental Service, one of the regional apparatuses producing PAD.

## RESEARCH METHOD

The method used in this study is descriptive, with the type of data needed being processed in the form of qualitative analysis data. In general, descriptive research seeks to reveal and describe the object to be studied as carefully as possible through empirical and scientific data. Meanwhile, qualitative data is data in the form of narratives and descriptions and not in the form of numbers. Data collection was carried out based on the results of observations and interviews related to the implementation of SIPD at the Tolitoli Environmental Service, one of the agencies or regional apparatus that generates regional original income in Tolitoli Regency. The instruments used are based on the implementation theory of Van Meter and Van Horn (1975), namely: (1) standards and policy objectives or policy measures and objectives; (2) resources; (3) characteristics of the implementing organization; (4) inter-organizational communication; (5) disposition or attitude of executors; and (6) social, political, and economic environment (Budi Winarno, 2017; DS Van Meter, 1975; Rolifola Cahya Hartawan, Fitriyani Kosasih, 2023). Some of these indicators will be described

qualitatively based on suitability with the instrument, then reduced to data, interpreted, and concluded on the achievement of these indicators in answering the existing problem formulation.

## RESULTS AND DISCUSSIONS

The data is processed using a qualitative descriptive approach, i.e., the processing of the data is not in the form of numbers or certain formulations. The following are the results of the research in a description that is explained based on the existing indicators. The instruments used are based on the implementation theory of Van Meter and Van Horn (1975), namely: (1) standards and policy objectives or policy measures and objectives; (2) resources; (3) characteristics of the implementing organization; (4) inter-organizational communication; (5) disposition or attitude of executors; and (6) social, political, and economic environment.

### Policy Standards and Targets

The Regional Government Information System (SIPD) is a policy direction for the central government through a derivative of the legal basis in the form of Permendagri No. 70 of 2019 (Wilansari, 2022). In addition to the regulation of the minister of home affairs, the application of SIPD in budget management at the Environmental Service is part of an effort to meet the criteria and procedures in accordance with the legal provisions stipulated in Permendagri No. 7 of 2020 regarding financial management in the regions through an internet-based information system.

The use of SIPD at the Environmental Service begins in 2020 for budget planning in 2021. For inputting the value or nominal value of the budget, an indicative ceiling is first determined by the Regional Government Budget Team (TAPD), which then becomes the basis for filling in values for each program, activity, and sub-activity. This becomes the standard and policy target for budget users (PA), in this case the Head of the Environmental Service, who carry out existing activities according to a predetermined budget stated in the system.

### Resources

The operator is a staff member appointed by the official using the budget to be able to operate the Financial Information System at SIPD. In practice, the operation of the financial information system at the Environment Service is carried out by staff in the secretariat, who, of course, work based on an assignment decree from the Head of Service. Apart from the HR side, other supporting aspects are from the infrastructure side, namely the internet network and hardware in the form of laptops and computer equipment. For the internet network, agencies budget it every year to support the financial information system. Apart from that, 6 laptops and computers were used, 3 from the secretariat and the rest from the fields or subcoordinators, in accordance with the Topoxy stated in Perbup No. 2 of 2019 (Peraturan Bupati Tolitoli Nomor 2, 2019). In addition, financial resources are also a consideration because, in order to operate SIPD, it is required to go through a stable internet network, so adequate budgeting is needed to make it happen.

### Characteristics of the Implementing Organization

The Tolitoli Regency Environmental Service has the task of exercising local government authority in the environmental sector, which will synergistically and consistently strive for environmental management and carry out the preparation and implementation of regional policies in the environmental sector. Basically, the agency in question is an agency that is quite important for the region, especially the Regional Government of Tolitoli Regency. In its budgeting, DLH has four fields that manage activity budgets based on the organizational structure contained in PERBUP Kab. Toli-Toli No. 2 of 2019 concerning the position, organizational structure, duties and functions, and work procedures of the Tolitoli Regency Environmental Service. The financial structure of the Environmental Service consists of receipts, revenues, and expenditures. Sources of spending

consist of DAU and local own revenue (PAD). The total budget managed for 2022 is IDR 10,122,941,188. Meanwhile, the expenditure allocation consists of indirect and direct spending. The proportion of allocation for environmental service expenditure is as follows: PAD Revenue Regional Taxes Regional Retribution Other legally balanced - DAU Other Regional Revenue Indirect Expenditure, consisting of: Personnel Expenditure Direct Expenditure, consisting of: Expenditure Employees, Goods and Services Expenditures Capital Expenditures. The Tolitoli Regency Environmental Service has quite important functions and tasks to support the Sustainable Development Goals (SDGs). This is implemented in various programs, activities, and sub-activities related to one of the indicators of sustainable development, namely maintaining the quality of the environment. Among the work programs are: (1) Regency/City Regional Government Affairs Support Program; (2) Environmental Planning Program; (3) Environmental Pollution and/or Damage Control Program; (4) Biodiversity Management Program (KEHATI); (5) Program for Control of Hazardous and Toxic Materials (B3) and Hazardous and Toxic Waste (B3 WASTE); (6) Development and Supervision Program for Environmental Permits and Environmental Protection and Management Permits (PPLH); (7) Program for Increasing Environmental Education, Training, and Counseling for the Community; (8) Program for Handling Environmental Complaints; and (9) Waste Management Program.

#### **Inter-Organizational Communication**

As Jenis and Kelly point out, communication is a step-by-step process by which an individual or communicator conveys improvement that is determined to change or shape the way another person behaves (Ahmad, 2021; SARAH, 2022). Meanwhile, according to Raymond Ross, communication is the process of organizing, selecting, and sending images to help audience members by generating implications or reactions from their point of view as planned by the communicator. The purpose of communication is basically the delivery of intentions and goals, both between individuals and between organizations. Inter-organizational communication is an interaction that occurs between senders and recipients of different hierarchical messages in formal and casual meetings within an association. The bigger and more complex the association, the more complicated the communication process will be. In a small relationship with only three people, the process of communicating with 1,000 people becomes very complicated. Inter-organizational communication is needed by every regional apparatus in carrying out government operations, both at the regional and central government scales. Basically, communication between organizations is very important for the smooth running of information systems and financial administration. In this case, the Environmental Service, as a regional apparatus that generates regional revenue in the form of PAD, needs to cooperate with other regional apparatuses such as the Revenue Service and the Finance Service in the regions to inform and convey this revenue through a deposit mechanism to the regional treasury. In addition, it also cooperates with banks regarding financial disbursements for each program and activity of the regional apparatus. In the implementation so far, the Environmental Service has always been able to work together and communicate very well with other regional apparatuses and other institutions or organizations, such as banks, so that public services in the regions can be realized properly. In its application through SIPD, the Environmental Service can plan each program, activity, and sub-activity with a budget that has been approved by the Tolitoli Regency Regional Government Budget Team (TAPD). In this case, the regional apparatus coordinates with BAPPEDA and the Regional Finance Service for each stage that will be passed in inputting both the work plan (RENJA) and the strategic plan (RENSIRA) of the Kab. Tolitoli.

#### **Executor's Disposition or Attitude**

According to Meter and Horn, the disposition or attitude of the executor is part of the motivation, namely psychological motivation, for carrying out an existing policy. In this case, there are three

main elements in implementation: (1) understanding and knowledge of the implementers of a policy; (2) direction of response from executors to policy implementers (acceptance and rejection); and (3) intensity of response. The understanding and knowledge of implementing officials are needed in the implementation of the Regional Government Information System (SIPD). In the SIPD input procedure, officials authorized to input program planning data, activities, and sub-activities as well as budgets are echelon III officials in the regions, in other words, the position class of the field head or coordinator. This is because the technical executors of the activities can focus more on receiving what is their duty in the field. Then the consideration in this case is that all activities carried out by regional apparatus can be directed and accounted for. Through SIPD, it will also be possible to know the response of implementers to a policy, thereby making the organization more transparent and accountable for its implementation. The information system in SIPD is so complex, but there are still some deficiencies that will be evaluated in subsequent periods. The Environmental Service, with its four main objectives, which are the main performance indicators of regional apparatus, has synergized well regarding the implementation of SIPD in the regions. With it, the Regional Government Work Plan (RKPD) will be applied in the form of programs, activities, and sub-activities of regional apparatuses.

#### **Social, Political and Economic Environment**

The external environment is everything that comes from outside the organization itself and has influence on the organization, for example, the government and other outsiders (Supriyono, 2000; Wahyuni, 2005). The external environment will influence management patterns and policies adopted or implemented by an organization, including regional apparatus organizations. From the results of interviews and documentation, it was found that the external environment has a role in the implementation of the local government information system (SIPD) at the Environmental Service, for example, how stable telecommunication networks are needed, how electricity can continue to be used, and how business organizations such as printing cannot be separated from the administrative system of the local government. The social environment of the community is also important to pay attention to because every policy carried out by the local government is solely for the smooth running of public services. The Department of the Environment, in implementing SIPD, always pays attention to the social conditions around the environment of the regional apparatus. In addition to being able to work together with human resources in the organization, cooperation is also needed with other parties in this case to realize good regional governance, such as being able to work with the community through information on the results of monitoring and evaluation of activities so that they can plan subsequent activities with or in accordance with the interests of the people.

Political and economic aspects also affect organizations, including the Tolitoli Environment Agency. In a sense, the transitional conditions for the transition of regional government heads to elected regional government heads in early 2021 brought quite significant changes due to structural changes in the Tolitoli regional government. Many Echelon II regional officials were rotated or replaced by other officials. Of course, this has more or less had an effect on the budgeting policies of regional apparatuses. In addition, economic conditions that were not good enough during the pandemic had a very large influence on the regional apparatus, where existing policies were centered on preventing and handling the spread of the COVID-19 pandemic. So that there is a refocusing of the budget in each regional apparatus.

## **CONCLUSION**

The Regional Government Information System has become a method and procedure for planning development activities in the regions, which was marked by the issuance of Law No. 32 of 2004 concerning Regional Government, which was later revised into Law No. 23 of 2014. Then afterwards, it was strengthened by Permendagri No. 70 of 2019 concerning Regional Government

Information Systems (SIPD). The application of SIPD at the Environmental Service started in 2020 for budgeting in 2021, where budget planning and activities refer to the SIPD application. The resources owned by DLH are quite good, including the existence of operators who are ASNs and also budget capabilities and input facilities in the form of reliable laptops and networks. Echelon III officials have the right to plan and input budgets and activities for each program in their field. Of course, the echelon III official is directly responsible for the official above him, namely the head of a service or agency class. Communication between regional apparatus organizations is well established, especially at BAPPEDA and the Tolitoli Regional Finance Office as promoters of SIPD. Basically, in addition to good coordination and communication with other regional apparatuses, sensitivity or attention to the external environment is needed, for example, the social, political, and economic environment. This environment is important for monitoring and evaluating the implementation of the SIPD implementation policy. During the COVID-19 pandemic, the implementation of SIPD at the Environment Service became a bit difficult due to the social restriction policy, which required work from home, so coordination was less effective. The implications and contributions obtained from this research are to provide knowledge and explanation regarding the importance of implementing management information systems in an institution or agency in the region. so as to simplify and expedite the management of regional financial administration. As is well known, it is important that the accountability report on the use of funds be completed in order to avoid certain findings that result in allegations of misappropriation of funds. The limitation of the current research is that it still takes relatively small objects or samples because it is related to case studies in certain regional apparatuses. Therefore, it is hoped that in the future, more comprehensive research can be carried out by taking more objects or samples from this study. Suggestions for the regional apparatus, which are the samples in this study, are to be able to maximize performance through budget absorption so that they are efficient for achieving the main performance indicators of the regional apparatus, in this case, the Environmental Service.

## ACKNOWLEDGEMENTS

In completing this article, the authors thank all parties who supported and facilitated the publication of this article in the SINTA 4 enrichment journal. Thanks to the College of Mujahidin Economics and Management Study Program (S1), colleagues, and the team of writers for resolving and publishing this article. Hopefully, it will be useful and add to the repertoire of knowledge in the field of management.

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