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# Analysis of Cadre Understanding of Administrative Procedures and Technology Mastery in Improving Posyandu Reporting Efficiency

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**Abstract**
Posyandu is a community health service that plays an important role in maintaining the health of mothers and children. However, the implementation of administration and data reporting is often hindered by the lack of understanding among cadres, administrative procedures, and low mastery of technology. This study aims to analyze the understanding of Posyandu cadres, administrative procedures, and technology mastery in improving reporting efficiency. The study uses a quantitative descriptive approach with a questionnaire as the main instrument, involving Posyandu cadres. The sampling technique used is Convenience Sampling, where respondents are selected based on who is willing or who fills out the questionnaire, with a total of 68 cadres. Data analysis to test the hypothesis uses Path Analysis with SPSS version 30 application program. The results of the analysis show that the hypothesis of cadre understanding (X1), administrative procedures (X2), and technology mastery (X3) has an influence on improving reporting efficiency (Y) both simultaneously and partially. The results of testing all variables are accepted because the path coefficients of X1, X2, and X3 against Y are significant. The results of the path determination coefficient are 0.449 or 44,9%.

**Keywords:** Cadre Understanding; Administrative Procedures; Technology Mastery; Reporting Efficiency
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**SDGs:** Good Health and Well-Being (3); Industry, Innovation and Infrastructure (9); Quality Education (4)

## 1.0 INTRODUCTION

Posyandu (Integrated Service Post) is a public health service that plays a crucial role in maintaining maternal and child health. At Posyandu, cadres are at the forefront of health service delivery, including recording and reporting health data. However, a major problem that often arises is that not all cadres understand the required administrative procedures. Although cadres receive training, this lack of comprehensive understanding of administrative procedures sometimes leads to errors/inaccuracies in data recording, which impacts the quality of reports submitted to community health centers or relevant agencies.

Furthermore, another obstacle is cadres' limited technological expertise in reporting. Not all cadres have sufficient skills to use technology optimally. This is especially true in areas with inadequate technological infrastructure and low digital literacy among cadres. As a result, reporting often remains manual, which hinders efficiency and data accuracy. This limited understanding of administrative procedures and technological proficiency is a key issue that must be addressed to ensure more efficient and accurate reporting at Posyandu, and support the success of existing public health programs.

Good administration is a key aspect of Posyandu's success (Rahmawati & Kurniawan, 2021). Many cadres struggle to follow established administrative procedures, which often leads to errors in data recording. Clear and well-understood administrative procedures are crucial for reducing errors and improving the quality of collected health data. This also impacts the accuracy of reporting, which is the basis for data-driven decision-making at the community health center and local government levels.

Research conducted by (Angelica et al., 2024) explains that manual recording and reporting using paper has the disadvantage of being susceptible to loss or damage, which can lead to data and information loss. Therefore, digital applications can speed up the recording process and minimize human error. However, barriers to technology implementation often pose a limitation, especially in remote areas. Therefore, to optimally utilize technology, cadres require intensive training and facilities that support its use.

Training is a key strategy for improving cadre competency in administration and technology mastery. Afiatna et al. (2023) emphasized that hands-on, hands-on training and simulations can help cadres better understand administrative procedures while honing their technological skills. Training programs tailored to cadres' needs and conducted on an ongoing basis can increase their confidence and skills in carrying out administrative and reporting tasks.

Reporting efficiency is a key indicator of Posyandu success. Zain et al. (2024) stated that fast and accurate reporting enables informed decision-making by relevant parties, such as community health centers (Puskesmas) and local governments. Therefore, strengthening cadres' competencies in administration and technological proficiency is crucial to achieving reporting efficiency, which in turn will improve the quality of health services in the community.

Based on the above description, the author was interested in conducting this research. Previous research has not comprehensively addressed this factor. The research took place at the Posyandu under the jurisdiction of the Simpang Tiga Community Health Center, located on Jalan Kaharuddin Nasution, Marpoyan Damai District, Pekanbaru City. The integrated health service post (Posyandu) is located in three sub-districts: East Sidomulyo, Maharatu, and Perhentian Marpoyan. There are 36 Posyandus, each with five cadres, for a total of 180 cadres.

## 2.0 LITERATURE REVIEW

### Integrated Health Post (Posyandu)

The Integrated Health Post (Posyandu) is a form of community-based health service aimed at improving the health of mothers, infants, and toddlers. Posyandu serves as the spearhead of primary health care, emphasizing the principle of active community participation in supporting national health programs.

According to the Indonesian Ministry of Health, Posyandu's primary function is to provide promotive and preventive services, such as immunization, child growth and development monitoring, supplementary feeding (PMT), and health education. With a community-based approach, Posyandu is expected to reach a wider target group and raise public awareness of the importance of family health. Cadres who have a good understanding of service procedures and are able to build effective communication with the community are more likely to encourage the participation of mothers of toddlers. Furthermore, the support provided by cadres, both in the form of information about child health and services provided at Posyandu, can increase mothers' awareness of the importance of monitoring their children's growth and development. Therefore, the stronger the role of cadres in carrying out their duties, the higher the level of participation and enthusiasm of mothers of toddlers to come to Posyandu regularly (Widyaningsih, et al., 2020).

### Efficiency of Posyandu Reporting

Efficiency in the Posyandu reporting system can be defined as the extent to which data recording, processing, and delivery are carried out in a timely and accurate manner, while optimally utilizing resources. Efficient health administration is a crucial foundation for building a quality health system. Administrative efficiency is not only about saving costs, but also about maximizing resource utilization, strengthening decision-making, and increasing accountability to achieve optimal results in improving public health. (Flora et al., 2025) In the Posyandu context, reporting efficiency is crucial to ensure that maternal and child health data can be optimally utilized in health program planning and evaluation.

Based on the study, several key indicators can be used to assess the efficiency of the Posyandu reporting system:

a) Timeliness of Report Delivery
   Posyandu reporting efficiency can be measured by the extent to which health reports are delivered according to the predetermined schedule. According to (Rohman & Abdul, 2020), timely reporting allows health workers to promptly analyze data and initiate necessary interventions. Delays in report submission can hinder data-driven decision-making.
b) Data Accuracy and Validity
   Data recorded by Posyandu cadres must have a high level of accuracy and validity. According to (Ramadhan et al., 2024), a good recording system must have a verification mechanism to reduce errors in data input. Mismatches or inconsistencies in data can lead to errors in analysis and program planning.
c) Ease of Data Access and Processing
   An efficient reporting system must allow Posyandu cadres and health workers to easily access and manage data. According to (Haryono Dwi, 2022), digitalization in health recording systems can increase efficiency by providing real-time access to needed information. The use of digital-based applications has been shown to speed up the recording process and minimize the risk of data loss.
d) Cadre Workload in the Reporting Process
   Another indicator of efficiency is the workload borne by Posyandu cadres in recording and reporting. According to research conducted by (Susanti, Nuraini, Ferdian, Nurparidah, Jayanti, et al., 2023), manual recording systems often hinder cadre effectiveness due to the time required to fill out forms and summarize data.

Implementing more user-friendly technology can reduce the administrative burden and allow cadres to focus more on public health services.

e) Operational Costs in Reporting Management
According to (Suhendra et al., 2024), efficiency in reporting systems can also be measured in terms of the costs incurred in operational data recording and reporting. Manual systems often require extensive resources, such as paper, ink, and additional labor. The use of digital-based technology, such as electronic record-keeping applications, can significantly reduce operational costs and increase efficiency in the long term.

f) Readiness and Ability of Cadres to Use Technology
The efficiency of the reporting system is also determined by the readiness of cadres to adopt new technology. According to research conducted by (Susanti, Nuraini, Ferdian, Nurparidah, & Jayanti, 2023), the successful implementation of a digital reporting system at Posyandu (Integrated Health Posts) is highly dependent on the training and technical assistance provided to cadres. If cadres have a good understanding of technology usage, the recording and reporting process will be more effective and efficient.

### Technology Mastery for Reporting Efficiency

Digital literacy refers to an individual's ability to understand, use, and effectively manage digital technology to obtain, process, and disseminate information. In the context of public health services, digital literacy is an essential skill for Posyandu (Integrated Health Post) cadres to support the effectiveness of digital-based recording and reporting. (Ridwan, 2025).

### Research Hypothesis

Based on the theoretical review and conceptual framework, the following research hypotheses can be formulated regarding the analysis of cadre understanding, administrative procedures, and technological mastery in improving the efficiency of Posyandu reporting:

1. Cadre understanding of reporting efficiency is suspected to have a significant influence on improving reporting efficiency.
2. Administrative procedures are suspected to have a significant influence on improving the efficiency of Posyandu reporting.
3. Technology mastery is suspected to have a significant influence on improving reporting efficiency.

Based on the explanation of relevant theoretical studies and research that have had a strong relationship and influence on the efficiency of Posyandu reports, the author has attempted to create a framework for thinking that can be seen schematically in Figure 1.

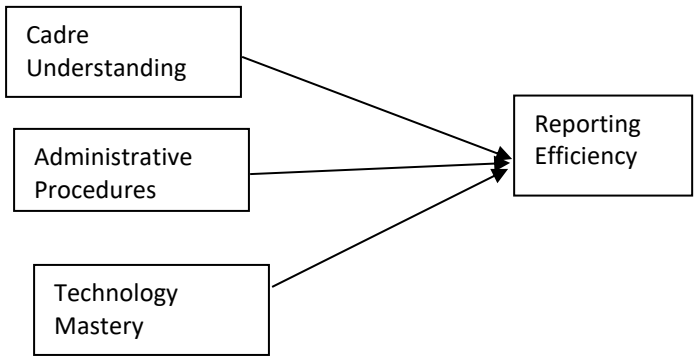


Figure 1. Frameworks for Thinking in Research

## 3.0 METHODOLOGY

This study uses a quantitative descriptive approach to analyze Posyandu cadres' understanding and technological mastery of administrative and reporting procedures. The study population was Posyandu cadres selected by purposive sampling. The main research instrument was a questionnaire with a Likert scale of 1-5 to measure the level of understanding and technological mastery of cadres regarding administrative and reporting procedures. Data were collected through questionnaires filled out by cadres. The population in this study was the integrated health service post (Posyandu) cadres under the leadership of the Simpang Tiga Inpatient Community Health Center (Puskesmas Rawat Inap) in Pekanbaru City. The sampling technique, where respondents were selected based on their willingness to complete the questionnaire, is called Convenience Sampling. Convenience sampling is based on convenience, namely respondents who are willing to complete the questionnaire. (Julio, 2020)

Table 1. Data on Integrated Health Posts (Posyandu) at Simpang Tiga Health Center Inpatient Unit

| No. | Sub-district | Number of RWs | Number of Integrated Health Posts | Number of cadres |
|---|---|---|---|---|
| 1. | Sidomulyo Timur | 15 | 15 | 80 |
| 2. | Maharatu | 8 | 8 | 40 |
| 3. | Perhentian Marpoyan | 11 | 13 | 65 |
| | Jumlah | 34 | 36 | 185 |

Source: (Posyandu) at Simpang Tiga Health Center Inpatient Unit (2025)

Data analysis was conducted using descriptive statistics, using frequencies, percentages, and averages to describe the level of cadre understanding. This study aims to provide a clear picture of the cadre's understanding and mastery of technology regarding Posyandu administrative and reporting procedures and to provide recommendations for improving administrative performance. The research variables consist of X1, X2, X3, and Y, where variable X1 is Understanding of Administrative Procedures, X2 is Administrative Procedures, X3 is Mastery of Technology, and Y is Posyandu Reporting Efficiency.

### Operational Definition of Variables

a) Cadre Understanding: Posyandu cadres' understanding includes knowledge of public health, particularly maternal and child health, nutrition, immunization, and disease prevention. Cadres play a role in monitoring the health development of infants and toddlers, providing health education to the community, and involving them in Posyandu activities. Cadres also need effective communication skills and an understanding of Posyandu operational procedures, including health data administration and reporting. A good understanding by cadres is crucial to supporting the success of health programs at the village, sub-district, and national levels.
b) Administrative procedures are a crucial aspect of Posyandu management because they serve as guidelines for recording and reporting activities. A good understanding of administrative procedures allows Posyandu cadres to systematically manage data, ensure information accuracy, and facilitate coordination with relevant parties such as community health centers (Puskesmas) and local governments. Good administration also includes recording participant attendance, maintaining simple medical records, distributing nutritional supplies, and reporting on the development of toddlers and pregnant women.
c) Technological proficiency includes the ability to use health recording applications, manage data using simple software such as Microsoft Excel or cloud-based applications, and communicate digitally through social media or other online platforms. With technology, cadres can expedite data recording, reduce reporting errors, and improve access to relevant health information.
d) Efficiency in Posyandu reporting relates to the speed, precision, and accuracy in conveying activity data to the authorities. Efficient reporting enables policymakers to respond more quickly to public health needs. Factors influencing reporting efficiency include standardized report formats, cadre training in data recording, and the use of technology in the reporting system. With a digitized system, the reporting process can be conducted in real time, reducing the risk of data loss and increasing accountability for Posyandu services.

## 4.0 RESULTS AND DISCUSSION

### Data Description

The data description aims to provide an overview of the collected data. A total of 68 cadres responded to the questionnaire. Based on age, 37 respondents were predominantly aged 46 and above. Based on the length of service, respondents were predominantly those with 11-15 years (25 respondents, representing 37%), followed by 22 respondents with 5-10 years (32%), 11 respondents with 16 years or more (16%), and 10 respondents with less than 5 years (15%).

Based on the variables studied, the variables were grouped into three groups: Posyandu cadre understanding ($X_1$), technology mastery ($X_2$), and reporting efficiency (Y). The collected data quantified respondents' responses to the distributed questionnaire.

Quantitative data was collected by assigning a score to each variable. The results of each variable were presented in a table with information on the average value and the respondent achievement rate (TCR). Information from respondents is crucial for understanding the level of achievement, which is then analyzed.

### Testing Analysis Requirements

The variable instrument was tested using two tests: validity and reliability, as follows.

a) Questionnaire Validity Test

The validity test was conducted by correlating the score of each item with the total score. To measure the validity of the measured data, the calculated r of the Person Product Moment correlation was compared with the table r. If the calculated r was greater than the table r, it was considered valid. The results of the questionnaire validity test using SPSS version 30 are as follows: The results of the validity test on the questionnaire on cadre understanding, administrative procedures in the inpatient UPT environment of Simpang Tiga Community Health Center, cadre technology mastery and reporting efficiency resulted in all questionnaire items being valid. This is because the calculated r value is greater than the table r value at a significance level of ≥ 0.05, which is 0.331. The results of the validity test on all questionnaire items are valid. From the results of the validity test on all questionnaire questions, it can be used in collecting research data.

b) Reliability Testing

The level of stability of a measuring instrument in measuring a phenomenon or event is called a reliability test. This test is useful for determining whether the results of questionnaire responses from respondents are truly stable in measuring an event. The higher the reliability of a measuring instrument, the more stable it is. The lower the reliability of a measuring instrument, the less stable it is, or arguably unusable. In this study, the authors used the Gutman test to measure reliability using SPSS version 30 as follows: The results of the questionnaire reliability test of the Posyandu cadre's administrative understanding were 0.736, technology mastery was 0.467, and reporting efficiency was 0.819, where the value was greater than the r table at a significant level of > 0.05, which was 0.331, so that all questions on each item in the questionnaire were declared reliable for the variables of administrative understanding and reporting efficiency. The reliability coefficient value was high, so it can be concluded that the data collected through the questionnaire were declared reliable and can be used as material for research. The questionnaire reliability test regarding technology mastery was not yet reliable because the Posyandu reporting by cadres was still handwritten and had not used technology.

## Hypothesis Testing

Hypothesis testing using Path Analysis with a causal relationship framework can be done through the following structural equation:

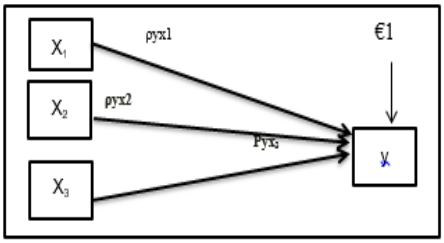


**Figure 2. Complete Structural Path Diagram, X1 (Cadre Understanding), X2 (Administrative Procedures), X3 (Technology Mastery), Y (Reporting Efficiency)**

Path analysis using SPSS version 30 yielded the following calculation results. ANOVA X1 (Cadre Understanding), X2 (Administrative Procedures), X3 (Technology Mastery), Y (Reporting Efficiency).

**Table 2. ANOVA Model.**

ANOVA[a]

| Model | | Sum of Squares | df | Mean Square | F | Sig. |
|---|---|---|---|---|---|---|
| 1 | Regression | 253.407 | 3 | 84.469 | 19.215 | .000[b] |
| | Residual | 281.343 | 64 | 4.396 | | |
| | Total | 534.750 | 67 | | | |

a. Dependent Variable: Reporting Efficiency

b. Predictors: (Constant), Technology Mastery, Administrative Procedures, Cadre Understanding

Coefficients, X1 (Cadre Understanding), X3 (Administrative Procedures), X3 (Technology Mastery), Y (Reporting Efficiency).

Table 3. Coefficients

Coefficients[a]

| Model | | Unstandardized Coefficients | | Standardized Coefficients | | |
|---|---|---|---|---|---|---|
| | | B | Std. Error | Beta | t | Sig. |
| 1 | (Constant) | 9.404 | 2.177 | | 4.321 | .000 |
| | Cadre Understanding | -.276 | .138 | -.262 | -2.004 | .049 |
| | Administrative Procedures | .038 | .104 | .039 | .360 | .720 |
| | Technology Mastery | .810 | .114 | .801 | 7.120 | .000 |

a. Dependent Variable: Reporting Efficiency

Summary variable Coefficient, $X_1$ (Cadre Understanding), $X_2$ (Administrative Procedures), $X_3$ (Technology Mastery), Y (Reporting Efficiency).

Tabel 4. Summary

Model Summary

| Model | R | R Square | Adjusted R Square | Std. Error of the Estimate |
|---|---|---|---|---|
| 1 | .688[a] | .474 | .449 | 2.09666 |

a. Predictors: (Constant), Cadre Understanding, Administrative Procedures, Technology Mastery,

From the results of data processing using the SPSS version 30 program, the path coefficients obtained from the test results are shown in the table above as follows:

### Simultaneous Testing (Overall)

The overall test is shown in Table 4.11 ANOVA.
The statistical hypothesis is formulated as follows:
H0: $\rho YX3 = \rho YX_2 = \rho YX_1 = 0$
Ha: $\rho YX3 = \rho YX_2 = \rho YX_1 \neq 0$
The hypothesis is formulated as follows:
H0: Cadre understanding, administrative procedures, and technological mastery do not have a simultaneous and significant effect on reporting efficiency.
Ha: Cadre understanding, administrative procedures, and technological mastery have a simultaneous and significant effect on reporting efficiency.
The ANOVA table yields an F-value of 19.215 with a probability value of 0.000. Since the sig value is <0.05, the decision is to reject H0 and accept Ha, indicating a simultaneous effect on reporting efficiency. Therefore, individual (partial) testing can be conducted or continued.

### Individual Testing (Partial)

#### a) Cadre Understanding of Report Efficiency

The individual test can be seen in Table 4.12, showing the substructure coefficients. The statistical hypothesis is formulated as follows:
H0: $\rho yx_1 = 0$
Ha: $\rho yx_1 \neq 0$

The hypothesis is in sentence form.
H0: Administrative understanding has no significant effect on report efficiency.
Ha: Administrative understanding has a significant effect on report efficiency.

The individual statistical test used is the t-test. The calculated t-value is compared with the t-table, as can be seen in Table 4.12. The substructure coefficient in the t-column for the cadre understanding variable is -2.004 and a significance value of 0.049.

To determine the significance of the path analysis, compare the probability value of 0.05 with the probability value of Sig., based on the following decision-making:
(1) If the probability value of 0.05 is less than or equal to the probability value of Sig or (0.05 ≤ Sig), then Ho is accepted and Ha is rejected, meaning it is not significant.

(2) If the probability value of 0.05 is greater than or equal to the probability value of Sig or (0.05 ≥ Sig), then Ho is rejected and Ha is accepted, meaning it is significant.

Decision:

Compared to the calculated t-value (-2.004 ≤ 1.667), H0 is accepted and Ha is rejected, meaning it is not significant. As can be seen in the Sig (significant) column, the Sig value is 0.049. The Sig value is less than the probability value of 0.05 or 0.05 ≥ 0.00, so H0 is rejected and Ha is accepted, meaning the path analysis coefficient is significant. Therefore, cadre understanding significantly influences reporting efficiency.

### b) The Effect of Administrative Procedures on Report Efficiency

The individual test of the substructure coefficients can be seen in Table 4.12. The statistical hypothesis is formulated as follows:

H0: ρyx2 = 0

Ha: ρyx2 ≠ 0

The hypothesis is in sentence form.

H0: Administrative procedures have no significant effect on report efficiency.

Ha: Administrative procedures have a significant effect on report efficiency.

The individual statistical test used is the t-test. The calculated t-value is compared with the t-value, as can be seen in Table 4.12. The substructure coefficient in the t-column for the cadre understanding variable is 360, with a significance value of 0.720.

Next, to determine the significance of the path analysis, compare the probability value of 0.05 with the probability value of Sig. The decision-making basis is as follows:

1. If the probability value of 0.05 is less than or equal to the probability value of Sig, or (0.05 ≤ Sig), then Ho is accepted and Ha is rejected, indicating insignificance.
2. If the probability value of 0.05 is greater than or equal to the probability value of Sig, or (0.05 ≥ Sig), then Ho is rejected and Ha is accepted, indicating significance.

Decision:

The calculated t-value is compared with the t-table, which is 360 ≤ 1.667. H0 is accepted and Ha is rejected, indicating insignificant. As seen in the Sig (significant) column, the Sig value is 0.720. The Sig value is less than the probability value of 0.05, or 0.05 ≥ 0.00. Therefore, H0 is rejected and Ha is accepted, indicating significant path analysis coefficients. Therefore, administrative procedures have a significant effect on reporting efficiency.

### c) Technology Mastery on Reporting Efficiency.

Individual tests can be seen in Table 4.12, showing the structural coefficients. The statistical hypothesis is formulated as follows:

H0: ρYX3 = 0

Ha: ρYX3 ≠ 0

Hypothesis in sentence form:

Ho: Technology mastery does not have a significant effect on reporting efficiency.

Ha: Technology mastery has a significant effect on reporting efficiency.

The individual statistical test can be seen in Table 4.12. The structure coefficient in the t column for the technology mastery variable is 7.120 and a sig. of 0.001.

Next, to determine the significance of the path analysis, compare the probability value of 0.05 with the probability value of Sig., using the same decision-making basis as for testing the discipline variable.

Decision:

The calculated t value is compared with the t table, which is 7.120 ≥ 1.677. H0 is rejected and Ha is accepted, indicating significance. This can be seen in the Sig (significant) column, which is 0.001. The Sig value is less than the probability value of 0.05, or 0.05 ≥ 0.01. Therefore, H0 is rejected and Ha is accepted, indicating a significant path analysis coefficient. Therefore, technology mastery has a significant effect on reporting efficiency.

Based on the path analysis results in Table 4.12. The obtained path coefficient of $X_1$ against Y ($\rho Yx_1$) = -0.262, the path coefficient of $X_2$ against Y ($\rho Yx_2$) = 0.039, and the path coefficient of X3 against Y (ρYx3) = 0.801. The value of the coefficient of determination or influence (R Square) = 0.449 can be seen in Table 4.13. Structure Summary. Meanwhile, the residual coefficient $\varepsilon_1 = \sqrt{(1-0.449)} = 0.551$.

The following is the sub-structure correlation data:

Table 5. Sub-Structure Correlation

Correlations

| | | Cadre understanding | Administrative procedures | Technology mastery | Reporting efficiency |
|---|---|---|---|---|---|
| Cadre understanding | Pearson Correlation | 1 | .520** | .562** | .209 |
| | Sig. (2-tailed) | | .000 | .000 | .087 |
| | N | 68 | 68 | 68 | 68 |
| Administrative procedures | Pearson Correlation | .520** | 1 | .133 | .010 |
| | Sig. (2-tailed) | .000 | | .279 | .936 |
| | N | 68 | 68 | 68 | 68 |
| Technology mastery | Pearson Correlation | .562** | .133 | 1 | .659** |
| | Sig. (2-tailed) | .000 | .279 | | .000 |
| | N | 68 | 68 | 68 | 68 |
| Reporting efficiency | Pearson Correlation | .209 | .010 | .659** | 1 |
| | Sig. (2-tailed) | .087 | .936 | .000 | |
| | N | 68 | 68 | 68 | 68 |

**. Correlation is significant at the 0.01 level (2-tailed).

Based on the results of the path coefficients in the sub-structure, it can be described as a whole which describes the empirical causal relationship between the variables of administrative understanding ($X_1$), technological mastery ($X_2$) and reporting efficiency (Y) as follows.:

Y = $pYX_1 + pYX_2 + pYX_3 + pY\varepsilon_1$ dan $R^2X_1X_2X_3$

= $-0{,}262X_1 + 0.039X_2 + 0{,}801X_2 + 0{,}449\varepsilon_1$ dan 0,551

Coefficient of Direct Influence Path and Joint Influence of Cadre Understanding ($X_1$), Administrative Procedures ($X_2$) Mastery of Technology (X3) on Report Efficiency (Y).

Table 6. Path Coefficients of Administrative Understanding ($X_1$), Technology Mastery ($X_2$), Reporting Efficiency (Y)

| Variable | Path Coefficient | Direct Effect | Joint Effect ($R^2YX_1X_2X_3$)_ |
|---|---|---|---|
| $X_1$ | -0,262 | -0,262 | - |
| $X_2$ | 0,039 | 0,039 | - |
| $X_3$ | 0,801 | 0,801 | - |
| $\varepsilon_1$ | 0,449 | $0{,}449^2 = 20{,}16$ | - |
| $X_1, X_2, X_3$ | - | - | 0,551 |

The table above shows the direct influence of the variable's cadre understanding, administrative procedures, and technology mastery on reporting efficiency is 0.551.

The data above shows that the variable with the greatest direct influence on reporting efficiency is technology mastery.

## Discussion

Based on the overall calculation results, the following can be interpreted and discussed to provide objective information:

1. The first hypothesis is "Cadre understanding contributes simultaneously and insignificantly to reporting efficiency." Based on the path test, the findings indicate that the path coefficient of $X_1$ to Y is statistically insignificant. The findings indicate that cadre understanding contributes simultaneously and insignificantly to reporting efficiency, amounting to -0.2622 x 100% = 6.86%, with the remaining 93.14% being contributed by variables other than administrative understanding.
2. The second hypothesis is "Administrative procedures contribute simultaneously and significantly to reporting efficiency." Based on the path test, the findings indicate that the path coefficient of $X_1$ to Y is statistically

significant. The findings indicate that administrative procedures contribute simultaneously and significantly to reporting efficiency by 0.0392 x 100% = 0.15%, with the remaining 99.84% contributed by variables other than administrative procedures.

3. The third hypothesis is "Technology mastery contributes simultaneously and significantly to reporting efficiency." Based on the path test, the findings indicate that the path coefficient of X3 to Y is statistically significant. The findings indicate that experience contributes simultaneously and significantly to reporting efficiency by 0.8012 x 100% = 64.16%, with the remaining 35.84% contributed by variables other than technological mastery.
4. The fourth hypothesis is "cadre understanding, administrative procedures, and technology mastery contribute simultaneously and significantly to reporting efficiency." Based on the path test, the findings indicate the following:
   a. The path coefficient of X1 to Y is statistically significant. The findings indicate that discipline contributes simultaneously and partially to service delivery by -0.2622 x 100% = 6.86%, with the remaining 93.14% contributed by other variables outside of cadre understanding.
   b. The path coefficient of X2 to Y is statistically significant. The findings indicate that administrative procedures contribute simultaneously and partially to reporting efficiency by 0.0392 x 100% = 0.15%, with the remaining 99.84% contributed by other variables outside of administrative procedures.
   c. The path coefficient of X3 to Y is statistically significant. The findings indicate that technology contributes simultaneously and partially to reporting efficiency by 0.8012 x 100% = 64.16%, with the remaining 35.84% contributed by other variables outside of technology mastery.
   d. The contribution of cadre understanding (X1), administrative procedures (X2), and technological mastery (X3) simultaneously directly impacted reporting efficiency (Y) by 0.449 = 20.16%. The remaining 0.5512 x 100% = 30.36% was influenced by other factors unexplained in the study.

The results show that the variable with the greatest contribution to reporting efficiency was the total technological mastery variable, at 0.801. This is because cadres require technological resources, both in terms of equipment and systems. This research is supported by research by Kusumawati et al., 2024, which found that digital technology also improves cadre work efficiency in reporting and recording health data. Motivation has a positive and significant impact. Technology is crucial for reporting efficiency, ensuring timely reports and minimizing delays in completion. This research is also supported by Saputra & Mahendra (2023), who stated that the use of technology supports members of the Great Surabaya Cadre in interacting with the community and providing quality services. Proper use of technology can improve staff performance in carrying out their duties, thereby enhancing their roles, functions, and responsibilities. Staff need strong work motivation to work with greater enthusiasm, which ultimately improves the performance of tasks at the integrated health post (Posyandu).

## 5.0 CONCLUSION

Based on the overall calculation results, the following conclusions can be drawn: 1. Cadre understanding ($X_1$) significantly influences technology mastery both simultaneously and partially. The variable test results are accepted because based on the path coefficient test, the path coefficient of X1 on Y is significant. 2. Administrative procedures (X2) significantly influences technology mastery both simultaneously and partially. The variable test results are accepted because based on the path coefficient test, the path coefficient of X2 on Y is significant. 3. Technology mastery (X3) significantly influences Posyandu reporting efficiency both simultaneously and partially. The variable test results are accepted because based on the path coefficient test, the path coefficient of X3 on Y is significant. 4. Cadre understanding (X1), administrative procedures (X2), and technology mastery (X3) significantly influence reporting efficiency (Y) both simultaneously and partially. The test results of all variables are accepted because based on the path coefficient test, the path coefficients of $X_1$, $X_2$, and X3 on Y are significant.

Based on the research results and the discussion in the previous chapter, the author offers the following suggestions: 1. Cadres' understanding of the reporting efficiency that has been implemented by them is already good; it only needs to be improved and maintained to influence their willingness and awareness in carrying out their duties and responsibilities. 2. Administrative procedures have been implemented well, and the procedures adhere to Posyandu administrative provisions, starting with registration, weighing, recording, counseling, and immunization. 3. Technological mastery is a skill possessed by cadres. Mastery of technology will improve the performance of Posyandu cadres. 4. The efficiency of Posyandu reporting must continue to be improved and maintained by keeping abreast of technological developments. 5. Researchers are encouraged to conduct further research by examining other factors that influence Posyandu reporting efficiency, thereby broadening their horizons and insights.

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