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Conference Paper

The Effectiveness of Financial Accounting Information System with Approach of Organizational Culture and User Competency in Baznas North of West Java

Nurhayati, Nunung Nurhayati, and Nining Koesdiningsih

Faculty of Economics and Business, Universitas Islam Bandung

Abstract

The phenomenon that occurs at the moment in Indonesia that the implementation of AISs organized by BAZNAS is still not effective as disclosed by M. Fuaz Nasar, BAZNAS Deputy Secretary, who stated that the Zakat Reporting System is not integrated yet based on national Real Data, therefore, the zakat collection and distribution system of all Indonesia must be strengthened by appropriate mechanism, which is accountable and easily accessible to the community. This study aims to discover the influence of organizational culture and user competence on effectiveness of Accounting Information System (AISs) in the North West Java BAZNAS Indonesia. This study used explanatory research, correlational Analysis and hypothesis test used multiple regression. The findings for this study are: organizational culture significant positively affects 85.2% the effectiveness of Accounting Information System (AISs) in BAZNAS the North West Java, and user competence significant positively affects 78.3% of the effectiveness of Accounting Information System (AISs) in BAZNAS the North West Java. The results of this study can be generalized rather than those of previous studies.

Keywords: Accounting Information System (AISs), BAZNAS, information systems, organizational culture, user competency

Corresponding Author:
Nurhayati
nurhayati_kanom@yahoo.com

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1. Introduction

The law No. 23 of 2011 about zakat management has increasingly confirmed the role of BAZNAS as an authorized institution that manages zakat nation-wide. Under this law, BAZNAS is declared as a non-structural government institution that is independent and responsible to the president through the minister of religious affairs. Therefore, BAZNAS, with the government, is based on the principle of Islamic law, trust, benefit, justice, law, integrity and accountability.

Currently in Indonesia the implementation of (accounting information system) organized by BAZNAS is still far from being effective. As expressed by M Fuad Nasar (2013), BAZNAS Deputy secretary, the zakat reporting system that is nationally integrated

based on real Muzakki data has not been well established. Therefore, the zakat collection and distribution systems throughout the country must be strengthened by an appropriate, accountable and easily accessible mechanism for the public.

Based on this situation, the authors have formulated the research problems as:

1. Are there any effects of Organizational Culture on the Effectiveness of Accounting Information Systems at Baznas in northern parts of West Java?

2. Are there any effects of User Competence on the Effectiveness of Accounting Information Systems at Baznas in northern parts of West Java?

2. Literature Review

2.1. Organizational culture

The characteristics of organizational culture by Robbin & Judge (2011: 552); consist of:

1. *Innovation and Risk taking,*

2. *Attention to detail,*

3. *Outcome orientation,*

4. *People Oriented,*

5. *Team Oriented,*

6. *Aggressiveness,*

7. *Stability,*

2.2. User competency

In general, competence can be interpreted as *"A Competency is composed of skill, knowledge, and attitude, but in particular the consistence application and Review of those skills, knowledge, and attitude to the standard of performance required in employment. (Sofo Francesco, 1999 in Hazar Daoud & Mohamed Triki, 2013).*

2.3. Effectiveness of accounting information systems

Effectiveness is the relationship between out puts with its goals. The greater the contribution of the output to the achievement of the goal, the more effective the organization, program or activity. For this research, the definition of effectiveness of accounting information systems refers to JP Campbell, Scott Hamilton, and Norman Chervany in the Journal of Information System Evaluating Effectiveness part 1: comparing evaluation approaches; Gelderman (1998), Tjhai Fung Jen (2002), where the successful implementation of accounting information systems is the intended use of accounting information systems in a variety of managerial duties and user satisfaction of the information produced by accounting information system.

2.4. Previous research and development research

Table 1 shows that this research is different from the previous research. This research is not focused on financial accountability and transparency but it focuses on the aspects of the use of accounting information system that has an implication on the effectiveness of Accounting Information System which affects the quality of financial statements presented on time. Therefore, the report can be used as an information source for the administrators in decision-making to create a positive change in the organizational culture or in making policy about employment, positioning employees in accordance with their respective expertise, especially in in northern parts West Java BAZNAS.

2.5. Research objectives

Based on the research background, the main objectives of this research are to find out:

1. How Analysis influence is given by organizational culture to the effectiveness of the Accounting Information Systems in BAZNAS in northern parts of West Java?

2. How Analysis influence does user competency have on the effectiveness of accounting information system in BAZNAS in northern parts of West Java?

3. Research Method

TABLE 1: Previous research.

Item	Name	Title/year	Result	Differences
1	Nunung N	Quality of Accounting Information, Accountability and Transparency Financial Reporting on Zakat Fund Acceptance Rate of 2014	There is a significant influence, accounting information quality, accountability and transparency of financial report.	Added variables of organizational culture, user competency, system success, and quality of financial reporting information
2	Nayla Yousif and Yasmeen FM	Organizational culture and knowledge sharing: Critical Success Factor tahun 2008	The results showed the menu gives a positive effect on organizational culture system which indicates that communication, trust, and organizational culture has positive effect on accounting information system.	The variables measured are the level of trust and communication. Level of love is not measured. It is different from my research. The research is conducted in local BAZ in West Java.
3	De Lone & Mc Lean	Information System Success: The Quest for the dependent variable information system Research 391	The success of a system is influenced by system quality, information quality and service quality	Several different variables. A company is as analysis unit.
4	Hazar Daoud	Accounting Information System in an ERP Environment and Tunisian Firm Performance tahun 2013	The competence of accounting personnel is a leading factor of the successful accounting information system.	Did not discuss organizational culture and financial reporting information quality.

Source: Referenced journal related with research.

3.1. Research method

Explanatory research is used in this research. *Explanatory Research* is the research that explain the causal relationship between the variables (Cooper & Schindler, 2006: 154). *Explanatory* research method refers to a theory or hypothesis to be tested as the cause of the phenomenon.

3.2. Variables operationalization

Summary of the research variables, dimensions, indicators and measurement scale are shown in Table 2.

TABLE 2: Variables operationalization.

Variables	Dimension	Indicator	Scale
Organizational Culture (X1) Robbins (2012)	Innovation and Risk taking	· Experimenting	Scale transformed to Ordinal Interval
		· Opportunity	
		· Risk taking	
	Attention to detail	· Precise	Ordinal Scale transformed into Interval
		· Analytic	
	Outcome Orientation	· Action oriented	Ordinal scale transformed into Interval
		· High expectation	
		· Result oriented	
	People Oriented	· Fairness	Ordinal Scale transformed into Interval
		· Tolerance	
	Team Oriented	· Collaboration	Ordinal Scale transformed into Interval
	Aggressiveness	· Competitive	Ordinal scale transformed into Interval
		· Low emphasis on social responsibility	
	Stability	· Predictability	Ordinal Scale transformed into Interval
		· Security	
		· Rule oriented	
User Competency (X2)	Experience with AIS	· Length of employment in AIS	Ordinal Scale transformed into Interval
Reference:		· Staff experience in AIS	
Sabherwal et al. (2006).		· The importance of AIS Experience	
	Training in AIS	· Numbers of AIS trainings	Ordinal Scale transformed into Interval
		· AIS Staff Training	

Variables	Dimension	Indicator	Scale
		· The importance of AIS training	
	Education in AIS	· Education in AIS	Ordinal Scale transformed into Interval
		· Staff Education in AIS	
		· The importance of education in AIS	
Effectiveness of Accounting Information System Implementation(Y)	User satisfaction	· Content	Ordinal Scale transformed into Interval
References:		· Accuracy	
Delon and McLean (1992); Gelderman (1998)		· Format	
		· Easy to use	
		· Punctuality	
	Use Intensity	· Use Frequency	Ordinal Scale transformed into Interval
		· References for Daily assignment	

3.3. Research variables

Dependent variable of this research is the Effectiveness of Accounting Information Systems. Independent variables of this research are organizational culture and user competency. Measurement Instrument is a 10 question questionnaire with a five point-Liker scale method, namely:

1 = Strongly Disagree

2 = Disagree

3 = Hesitated

4 = Agree

5 = Strongly Agree

3.4. Research population and samples

3.4.1. Population

Population is a generalized region consisting of objects and subjects that have certain qualities and characteristics determined by researchers to be studied and then draw a conclusion, Sugiyono (2012: 117). Based on this explanation, the research population is BAZNAS in districts and cities in West Java that have a license to become Zakat Management Organization (OPZ). Based on the data from Ministry of Religious, there are 26 BAZNAS in districts and cities in West Java.

3.4.2. Samples

The *sampling* technique used in this research is *purposive sampling* in which sampling technique using a certain consideration (Sugiyono, 2011: 85). The samples defined for this research is National Zakat Agency (BAZNAS) of districts/cities in West Java, which are registered in Ministry of Religious Affairs. Baznas in the North of West Java.

3.5. Research analysis technique

This research will analyze the pattern of causal relationship between research variables. Research method uses the analysis tool as follows:

1. Research Instrument Test, with tests of Validity and reliability

2. Descriptive Analysis

3. Classic assumption test

4. Hypothesis test

3.6. Research instrument test

3.6.1. Validity test

The criteria used to determine whether a statement item is valid and has an acceptable reliability value based on Barker's criterion, et al. (2002). The criteria used to determine as in Table 3:

TABLE 3: Criteria of research instruments validity and reliability standards.

Criteria	Reliability	Validity
Good	0.8	0.4
Acceptable	0.7	0.3
Marginal	0.6	0.2
Poor	0.5	0.1

Source: Barker et al. (2002).

3.6.2. Reliability assessment

SPSS is used to measure the reliability with the Cronbach alpha (α) statistical test. A construct or a variable is said to be reliable if it gives a Cronbach alpha value > 0.70 (Nunnally, 1994).

3.6.3. Descriptive analysis

Descriptive analysis will be conducted through the frequency and percentage of respondent's answers. Descriptive analysis will be presented in a work table and analyzed descriptively using the criteria as shown in the following table:

TABLE 4: Criteria of score interval category.

Score Interval	Category
$0\% \leq$ Score Interval $\leq 21\%$	Extremely Low
$21\% \leq$ Score Interval $\leq 41\%$	Low
$41\% \leq$ Score Interval $\leq 61\%$	Marginal
$61\% \leq$ Score Interval $\leq 81\%$	High
$81\% \leq$ Score Interval $\leq 100\%$	Extremely High

Source: Sugiono (1997).

3.6.4. Classical assumption assessment

The analytical device used in this research is multiple regression analysis. The classical assumption test of this research includes: Data Normality Test, multicollinearity Test, heteroscedasticity test and autocorrelation test.

3.6.5. Multiple linear regression analysis

Multiple linear regression analysis is used to determine the influence between independent variables in affecting the dependent all together or partially. The regression equation with multiple linear in this research is:

$$Y = a + b1X1 + b2X2 + e.$$

3.7. Model test and hypothesis test

3.7.1. Coefficient of determination

The coefficient of determination (R^2) measures to what extent the ability of the model explains the variation of dependent variable (Ghozali, 2014). If the probability (significance) is greater than 0.05, the independent variables together do not affect the dependent variable. The f value can be calculated by the formula:

$$f : R2/(k-1)$$

$$(1 - R2)/(n/K)$$

Where:

    R2: coefficient of determination

    1–R2: *residual sum of squares*

    n: number of samples

    K: number of variables

Hypothesis test

T-test

The *t*-test basically shows to what extent the influence of one independent variable individually in explaining the variation of the dependent variables (Imam Ghozali, 2014). In the data processing, individual effects are shown from the significance of the *t*-test. If the value of the significant *t*-test < 0.05, it can be concluded there is a significant effect on an individual basis of each variable. Determination of *t*-table is based on the significance level and the level of freedom

    * The level of significance = 5% (0.05)

* Degrees of freedom = (n-1-k)

4. Research Results and Discussion

4.1. Analysis of hypothesis test

Hypothesis Testing developed in this study uses multiple linear regression analysis. Multiple linear regression analysis used to assess causal relationships between variables (causal models) that have been previously defined.

4.2. Classical assumption assessments

Normality test is conducted using *Kolmogorov–Smirnov* with decision rules if significance is more than α = 0.05, it can be said that the data are normally distributed. The results of normality test calculation using *Kolmogorov–Smirnov* is that the normality test results shows the level of significance α (α = 0.05), and 0.336 > 0.05, which means that the data is distributed normally.

    Multicollinearity results of *Variance Inflation Factor* (VIF) is under 10 with the following details:

1. The organizational Culture (BO) Variable, *Tolerance* value is 0.992 > 0.10 and the value of *Variance Inflation Factor* (VIF) is 1.008 and it is smaller than 10.

2. User Competency (KP), the Value of *Tolerance* 0.912 > 0.10 and the value of *Variance Inflation Factor* (VIF) is 1.097 and is smaller than 10.

3. Effectiveness of Accounting Information system (ESIA), Value of *Tolerance* 0.912 > 0.10 and value of *Variance Inflation Factor* (VIF) is 1.097 and is smaller than 10.

Then it can be concluded that the equation of the regression model does not have not a multicollinearity problem.

    The calculation of data using SPSS 22 resulted in the value of *s ig.* 0.0 00 < 0.05. Therefore it can be concluded that the relationship between the *variables of Organizational Culture, and the user Competence and the effectiveness of Accounting Information Systems is homoscedasticity, this means that Heteroskedasticity does not occur.*

    For a significance level of 5%, number of data observation (n) = 30, and the number of independent variables (k) = 2, the value of dL = 0, 1384, dU = 0.3 589 and 4-dU (4- 0.3589) = 3.6411. Autocorrelation is Positive. Based on the aforementioned data,

the value of Durbin Watson (d) obtained is 0.506 > 0.3589 (dU) meaning there is no autocorrelation.

4.3. Effects of organizational culture (BO) on the effectiveness of accounting information systems (ESIA)

The test results indicates Sig BO < 0.05 is 0.001 < 0.05, meaning that Ho is accepted and it can be concluded that there is significant influence of organizational culture on the Effectiveness of Accounting Information Systems at Baznas North of West Java in 2017.The value of R ^{2} (R-square) in *Model Summary* table is equal to 0.852, meaning that the simultaneous contribution of BO and KP on ESIA is 85.20%, while the remaining 14.80% is the contributions from other variables not included in the study. If Organizational Culture increases, it will lead to a more effective accounting information system which means that user system operators have the freedom to use Accounting Information system, the opportunity to improve the system, the opportunity to make decisions and the opportunity and freedom to collaborate the existing system with other systems to gain the required output and in the end the accounting information system will be more effective. That indicated the organizational culture of the Baznas of Sumedang is extremely good. It is because the system user has freedom in using a newer and better way, freedom of advice, and freedom to make decision affecting the activities that produce appropriate and beneficial information for the organization.

4.4. Effects of user competence (KP) on the effectiveness of accounting information systems (ESIA)

Based on the results of data processing using SPSS 22, The test results showed that Sig KP < 0.05 is 0.047 < 0.05. This means that Ho is accepted, so it can be concluded there is a significant influence of user competency on the effectiveness of Accounting Information System at Baznas North of West Java in 2017.While the correlation (r) KP on ESIA is 0.885 and this means that the relationship between KP and ESIA is very strong. The size of BO effect on ESIA is R2 or (0.885) is equal to 0.783 or equal to 78.3%. This means the effect of User Competence on the Effectiveness of Accounting Information System is as much as 78.3%.If the organizational culture increases, the effectiveness of Accounting Information system will also increase. This means that higher education, more skills, and more experience of AIS users will lead to a more effective accounting Information System. This can be seen from the results of financial statements which is the output of AIS that can be accessed by muzaki at any time, so the level of trust of

muzaki increased indicated by the increased collection of Zakat funds acceptance by Baznas in North part of West Java.

5. Conclusions and Recommendations

5.1. Conclusions

1. Based on the discussion of research, Organization Culture has some effects on Effectiveness of Accounting Information System at West Java Baznas which includes Baznas Kuningan, Sumedang, Majalengka, Cirebon, Cirebon City and Indramayu in 2017.

2. Based on the discussion, User Competency gives effects on the Effectiveness of Accounting Information System at West Java Baznas which includes Baznas Kuningan, Sumedang, Majalengka, Cirebon, Cirebon City and Indramayu in 2017.

5.2. Recommendations

Based on the results, there is a significant influence of organizational culture in the form of freedom to give advice, freedom to make decision required for the effectiveness of AIS. However from six Baznas that were studied, and Cirebon Regency is still low. Therefore, it is better for Baznas to improve the competency of Human Resources that is related to Accounting Information system and to analyze accounting information system whether it can be collaborated with other systems for a more effective use.

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