An Analysis of Micro-enterprises Actors Access towards the Formal Financial Services in Siak Regency

Prof. Dr. Sri Indarti, S.E., M.Si.
Faculty of Economics and Business
University of Riau
Pekanbaru, Indonesia
E-mail : sri_indarti_fe@yahoo.com

Rendra Wasnury, S.E., M.I.B
Faculty of Economics and Business
University of Riau
Pekanbaru, Indonesia
E-mail : rendra.wasnury@lecturer.unri.ac.id

Abstract:- In general, the study of access to micro-business to formal financial services is to find out the access of the community (micro business operators) to formal financial services for business capital carried out in Siak Regency. Analysis of the access of small and micro-entrepreneurs to formal and informal financial services, by identifying the types of financing from formal and informal financial institutions that are still utilized by business actors to date. Furthermore, it uses factor analysis to determine considerations in accessing formal and non-formal finance.

Based on the analyzed binary logistic regression coefficient values obtained can be interpreted as follows, age has a positive effect on the opportunity of business actors to access financial institutions, but it is not significant or does not significantly affect the opportunity of business operators access to financial institutions, which can be seen from Sig. $\alpha > 0.05$ ($0.366 > 0.05$). The net income of business actors from operating results has a negative effect on the opportunities for access to business actors in financial institutions and is not significant to the level of $\alpha = 0.05$. The level of education has a negative effect on the opportunity for business operators to access financial institutions and the level of significance is not > 0.05. The frequency of borrowing has a positive and significant relationship to the level of $\alpha < 0.05$ on the opportunity of business actors to access financial institutions and the total income has a positive effect on the opportunity of business actors to access financial institutions. The higher the level of income the greater the opportunities for micro and small entrepreneurs to access financial institutions and not significant to the level of $\alpha = 0.05$.

Micro and small business actors in Siak Regency have access to financial institutions both formal and informal, in the sense that they have and are currently accessing both borrowing and saving money at these financial institutions. As a suggestion to improve the access of micro and small businesses to formal financial institutions such as banks, the Government of Siak Regency should implement a program that can be a place for micro and small businesses to interact with one another in an effort to create business competitiveness.

Keywords:- *Micro Enterprises, Bank-Cable, Loan.*

I. INTRODUCTION

Micro-enterprises have evolved as a sector that has interconnectedness with other sectors. This is because it is supported by the development of technology and continued capital consumption. The modernization of the micro-enterprises from the traditional stage requires a lot of effort, in addition to setting up the economic structure of microenterprises or the latest technology implementation. Micro-enterprises cannot develop only because of the business actors but supported also by the development of other areas of life. A. T. Mosher (1965) states that the Micro Business sector is developing because it is supported by the conditions of development of the Micro Business itself which consists of absolute (basic) and smoothing requirements.

Understanding this, that the development of technology in development will not be able to be implemented by business actors if not supported by the availability of working capital and investment capital that can be accessed. Thus, microfinance resources become an important part that must be available in supporting the development of micro-enterprises.

Moreover, the small micro-enterprises can also assist the government in enhancing the entrepreneurial existence among the younger generation. It is very important to be able to create jobs for themselves and others. The increasing number of human populations is potentially increasing unemployment at a productive age, due to difficulties in finding employment. The development of entrepreneurial skills is done by the management and development of his skills, which will be a great force for development. Many opportunities for youth to be entrepreneurial, but must be supported by governments and educational institutions, including higher education.

Micro-enterprises are an integral part of the company. Micro-enterprises are the main components that support rural and urban life in Indonesia in general and Siak Regency in particular. What happens in micro-enterprises will directly affect rural developments as well as vice versa. Micro-enterprises in this case not only limited micro-enterprises in a narrow sense, but in the broad sense of the

revenue of renewable primary products. Thus included agriculture and horticultural crops, plantations, farms, fisheries, and forestry.

Siak Regency is one of the areas that has a good economic development with a growth rate of 2.33 in the year 2016 with a poverty rate of 5.80 is much better than the poverty rate of Riau province. In Siak Regency, the service sector is the sector with the largest number of workers followed by the trade sector in second, for more details can be seen in the following table:

Description	2015	2016	2017
Working in the agriculture sector (%)	14.57	14.14	13.99
Working in the trade sector (%)	12.03	15.20	15.30
Working in the manufacturing sector (%)	10.12	11.91	11.74
Working in the services sector (%)	36.26	44.60	45.12

Table 1:- The population aged 15 years and over who works according to main business field Siak year 2015 – 2017
Source: Siak Regency Social, Labor, and Transmigration Office, 2017

If we look at the data from the rice production plantations in 2017 amounting to 34960 tons, this condition decreases if we look at rice production in 2016. Rice production decreased in the year 2017, due to the shift in the planting season, resulting in a rolling season of rice harvest should be in the year 2017 to the year 2018. This risk can be avoided if the rice farming business can have additional capital in using simple technology such as well-made or water pumps that can drain water in their plantations.

Low productivity efforts are caused by several things, among others: (1) low knowledge of farmers in managing their garden, (2) the use of relatively limited technology (3) low production quality (4) The oligopsony characteristic of the market structure (5) lack of capital. The capital factor is a very complicated problem faced by farmers, especially in rural areas. The lack of capital possession causes farmers to not able to utilize the technology contained in production inputs, such as seedlings, production facilities and so forth. Consequently, production remains low, low quality, low selling price, low revenue, limited savings, limited return investments, use of technology in order to increase the productivity of the limited return. This is the vicious cycle faced by farmers so that among the farmers many are caught up in poverty.

These poverty circles need to be disconnected by providing capital to the micro-business actors in a more accessible and productive way. One of them is by utilizing the capital resources that have been provided by the Government through the relevant departments or the acquisition of capitalization by lending to government banks or other formal financial institutions. However, various studies have stated that smallholders use non-formal financial institutions to obtain capital loans, although

sometimes due to relatively high-interest rates. These circumstances still have micro-enterprises suffered losses that are stuck in a relatively large cost, so that the received revenue remains small.

Some of the reasons of why banks do not channel more funds into the agriculture sector than other sectors of the economy are: (1) the banking party is still looking at the small business sector is very risky so very carefully in the provision of credit, (2) the bank is less confident with the character of farmers due to the experience of KUT that can be said to fail, and (3) many banking parties who do not have enough experience in the distribution of agricultural loans, so as to be hesitant. On the other hand, the actors of agricultural enterprises (farmers, saprodi/outputs agriculture traders) still have the impression that borrowing capital from formal banks is very difficult. Starting from the point of view of the two different parties, it is necessary to breakthrough in favor of farmers so that they can easily access capital from formal financial institutions.

Banking still looks very cautious in channeling funds to the agriculture sector including sub plantation sector, because it concerns business interests, especially the issue of banking role as financial intermediation institution that must manage customer funds in order to provide profit. The consequence is the business sector that has the expectation of a large profit will be prioritized in lending financing. While the agricultural sector is often considered to be a high-risk sector.

The above condition is a common condition that occurs in Indonesia, and of course this problem can happen in Siak Regency. Therefore, to be able to formulate and compile policy steps in increasing access to formal finance, an Analysis of Micro-enterprises Actors Access towards the Formal Financial Services in Siak Regency is needed.

II. MATERIAL AND METHODE

➢ *Population and Samples*
According to the theory of the Gay & Diehl in Trianto (2016:54), stating that in general, the number of acceptable samples depends on the type of research to be conducted. For a descriptive study, the minimum number of samples was 10% of the total population, while for correlational research it required a minimum 30% sample of the total population. As for the type of causal-comparative research and experiments each minimum is 30 subjects per group and 15 subjects per group. Because this research is a qualitative descriptive, then the minimum number of samples used is 10% of the population or 112 of the total number of 1112 micro-businesses active in the database of the small and Medium Enterprises Cooperative Department in Siak Regency.

➢ *Data Analysis Methods*
The access of business actors on banking is of course very varied depending on the availability of financial institutions that exist near micro and small businesses and aspects that influence them. To analyze the access of

business actors to financial institutions in business financing carried out some analysis as follows:

1. The analysis of the access of small and micro-entrepreneurs to formal and non-formal financial services, with the identification of financing types from formal and non-formal financial institutions still utilized by business actors to date. The analysis used to explain this is a descriptive analysis by identifying the types of financial institutions as a source of financing used by farmers in the business, whether it is a formal financial institution that includes financial institutions of commercial banks, BPR, and other non-bank formal financial institutions, as well as non-formal financial institutions that are the preferred or alternative sources of financing used by plantation farmers.

2. Analysis of factors that affect the ease of small and micro-entrepreneurs to access capital sources from formal financial institutions, analyzed in a descriptive to the perception of small and micro-entrepreneurs to access the financial institutions utilized, by explaining the reasons for each access faced by business actors. The Ease of access to financial institutions will be explained with ease in terms of; a) application, 2) collateral which includes the type and legal force, 3) determination of credit ceiling, 4) duration of repayment, 5) other requirements needed, such as village certificate, family permit (husband/wife), business permit, credit agreement, and others.

3. Analysis of factors that are considered plantation farmers choose capital sources of formal financial institutions. It is analyzed quantitatively with the econometric model, using several variables that affect the use of financial services by smallholders to formal financial access both bank financial institutions and non-bank financial institutions that exist. Some factors that allegedly positively affect the utilization of credit, namely the broad-directed farmer, family head education, loan term, household consumption, and frequency/access to the source of credit. However, there are also various factors that cause a credit arrear that come from the internal farmer/group, as well as those outside the control of farmers/farmer groups. Factors within the farmer include the characteristics of the farmer, the ability of the farmer to use it in his farming business. The farmer's decision to utilize a source of financing or not is a "binary outcomes". Therefore identification of the factors affecting the decision of farmers to access capital resources of financial services can be approached with the model logistic. Thus this model is built as follows:

$$logit\,(\hat{p}) \equiv \log\left(\frac{\hat{p}}{1-\hat{p}}\right) = \beta_0 + \beta_1 X_1 + \cdots + \beta_n X_n$$

Note:

β_0 = constant

$\beta_{1,n}$ = regression parameter

$X_{1,n}$ = independent variables that influence farmers' decisions in utilizing the financial services,

$\left(\frac{\hat{p}}{1-\hat{p}}\right)$ = odds (ratio), which is the ratio between farmer probabilities utilizing financial services against the probability of not utilizing financial services in business financing.

Analysis Some factors that allegedly affect the utilization of credit by planters are:

a) business age (X1), which is measured by the unit of the year at the time of the survey.
b) education of the head of the family (X2), which is as measured in the unit of years,
c) operating revenue (X3), which is measured by the rupiah unit,
d) loan term (X4), which is calculated by the unit of the month,
e) household revenue (X5), which is calculated in the rupiah unit,
f) frequency/access to financial or credit sources (X6), which are calculated by a unit of time,

The unbiased estimation procedure is done with maximum likelihood with the help of SPSS analysis software.

1. Analysis of some policies on supplying the capital of the agricultural sector, especially existing plantations. Conducted through literary studies and will be described in a descriptive order to describe the development of agricultural capital systems, particularly the generally prevailing plantations.

2. Formulating suggestions and recommendations as a policy reference to improve farmers' access to financial services, in order to support plantation development in Siak Regency.

III. RESULT AND DISCUSSION

After the model has been built and analyzed, the results are obtained that the access of smallholders to financial institutions is influenced by factors of age, education, net revenue from the business, total revenue, frequency of borrowing, and length of time of borrowing is a fit model. In other words, the variables of age, education, land area, net revenue from plantation business, total revenue, frequency of borrowing, and the length of loan time were able to explain the access of planters to financial institutions.

Omnibus Tests of Model Coefficients				
		Chi-Square	df	Sig.
Step 1	Step	71.819	5	.000
	Block	71.819	5	.000
	Model	71.819	5	.000

Table 2:- Omnibus Analysis Results Tests on Binary Logistic Regression of Factors Affecting Financial Access to Micro and Small Businesses in Siak Regency
Source: Output of Binary Logistic Regression Analysis with SPSS Version 23

In SPSS analysis with the binary logistic regression model, if the value of Chi-Square at a free degree corresponds to the number of variables is said to be fit as a model if the value is significant (Sig field.) is smaller than the alpha value (α) 0.05, or written with 0.000 < 0.005. This means that the value of the chi-square calculated in the model is smaller than the value of the Chi-Square table.

Hosmer and Lemeshow Test			
Step	Chi-Square	df	Sig.
1	19.442	8	.013

Table 3:- Hosmer and Lemeshow Analysis Results in Binary Logistic Regression of Factors Affecting Financial Access Micro and Small Business Actors in Siak Regency
Source: Output of Binary Logistic Regression Analysis with SPSS Version 23

Another sign test to determine the fit model or not in binary logistic regression analysis is the Hosmer and Lemeshow Test. The results of the analysis show that the built model is fit. Hosmer and Lemeshow test is a feasibility test of model by seeing whether the empirical data is suitable or not with the model. In other words that the empirical data collected in the field (empirical data) there is no difference with the model being constructed, or the prediction of the model to explain the state of empirical is good. The test can be seen from the Hosmer and Lemeshow test analysis where the significant value of the Chi-Square value is greater than the alpha (α) value of 0.05, or it can be written with Sig.> 0.05 or equal to 0.13 > 0.05. With the results of the two tests above, the model built can be interpreted.

Based on the model analysis of the factors affecting the access of farmers to the financial acquired Nagelkerke R Square value of 0.612 which means that the entire variable freely (jointly) able to explain the variance of financial access of micro and small enterprises of 32.8 percent and the remainder is by 67.20 percent explained by other factors that are not included in the model. Or in other words variance of variable age business actors, education, net

revenue from the business, total revenue, frequency of borrowing, and the length of loan time is able to explain the access of micro and small businesses to financial institutions. The results of the analysis can be seen in the following table.

Model Summary			
Step	-2 Log likelihood	Cox & Snell R Square	Nagelkerke R Square
1	87.943[a]	.450	.612

a. Estimation terminated at iteration number 6 because parameter estimates changed by less than .001.

Table 4:- Model Summary Results on Binary Logistic Regression of Factors Affecting Financial Access to Micro and Small Businesses in Siak Regency
Source: Output of Binary Logistic Regression Analysis with SPSS Version 23.

Based on a few indicators of analysis of binary logistic regression factors that affect financial access by micro and small business actors, then the model built is declared worthy to be described. Explanations of factors that affect financial access by the micro and small businesses will explain how much of each of the free variables explain the access of micro and small businesses to financial institutions.

To explain the effect of each free variable individually (partial) to the access of micro and small enterprises to financial institutions can be seen from the value and sign of the resulting regression coefficient (value B in the table of output regression). While to find out if the variables have a real effect on the financial access of micro and small businesses judging by the significance (real influence) of each variable to the access of an entrepreneur's variable. If the significance value of each variable below 0.10 (10 percent) means that the variable has a significant effect on the financial access of farmers. The value of the regression coefficient and the significance of each variable can be seen in the table below.

Variables in the Equation							
		B	S.E.	Wald	df	Sig.	Exp(B)
Step 1[a]	Umur	.025	.027	.818	1	.366	1.025
	Pendapatan_Usaha	.000	.000	.689	1	.406	1.000
	Pendidikan	.746	.383	3.783	1	.052	2.108
	Fre_Pinjaman	2.080	.410	25.786	1	.000	8.003
	Pendapatan_RT	.000	.000	1.395	1	.238	1.000
	Constant	-7.266	2.317	9.831	1	.002	.001
a. Variable(s) entered on step 1: Umur (Age), Pendapatan_Usaha (Operating_Revenues), Pendidikan (Education), Fre_Pinjaman (Fre_Loan), Pendapatan_RT (Revenue_RT).							

Table 5:- Model Summary Results on Binary Logistic Regression of Factors Affecting Financial Access to Micro and Small Businesses in Siak Regency
Source: Output of Binary Logistic Regression Analysis with SPSS Version 23

Based on the value of the analyzed binary logistic regression coefficient obtained can be interpreted as follows:

1) Age has a positive effect on the opportunity for business people to access financial institutions, but not significant or no real effect on the opportunities of farmers' access to financial institutions, which can be seen from Sig.α > 0.05 (0.366 > 0.05).

2) Net revenue of businesses from the results of a negative impact on the opportunity of business access to financial institutions, and not significant to the level of $\alpha = 0.05$.

3) The level of education negatively affects the opportunity of business access to financial institutions and is not significantly α-level > 0.05.

4) The frequency of borrowing has a positive and significant relationship until the α level < 0.05 of the opportunity for business people to access financial institutions.

5) The total revenue has a positive effect on the opportunity for business people to access financial institutions. The higher the revenue level the greater the chances of micro and small entrepreneurs to access financial institutions and insignificant up to α levels = 0.05.below.

IV. CONCLUSION AND SUGGESTIONS

➢ *Conclusion*

1. In general, the results of the study indicate that micro and small business actors in Siak Regency have access to financial institutions, both formal and informal, in the sense that they have and have access to both borrowing and saving money at these financial institutions.

2. The most widely utilized financial institution by business actors in borrowing is a formal financial institution, as it is more trustworthy and access is not too far away. Furthermore, UED SP with reasons close to business actors and procedures as well as the requirements are easy.

3. Loans made by micro and small enterprises to financial institutions both formal and informal are generally used to support business development activities but not accompanied by good financial management in business.

4. Relatively large loans are acquired by micro-enterprises from formal financial institutions such as banks, while loans in small quantities are obtained by families of non-Bank microfinance institutions.

5. Unavailability of collateral that is owned by micro and small enterprises, causing unable to access formal financial institutions such as the Bank, thereby inhibiting the actors of micro and small enterprises to expand the business that requires a large capital.

6. The actors of micro and small businesses that stop borrowing or not borrowing back to financial institutions either formal financial institutions as well as non-Bank microfinance institutions are because they do not require any more, do not want to owe and can not pay and has obtained loans from other parties.

7. The factors that affect the financial access of micro and small businesses are the frequency of loans, while other factors such as revenue, revenue, and total household revenue are influential but not significantly.30%.

➢ *Suggestions*

1. To improve the access of micro and small business actors to formal financial institutions such as banks, the Siak Regency Government should implement a program that can be a forum for micro and small business actors to be able to interact with one another in an effort to create business competitiveness.

2. To cooperate intensively with credit guarantee institutions such as PT. Sarana Penjaminan Riau to provide micro and small business credit guarantees to banks.

3. To provide access to smallholders to financial institutions, in order to improve rural economies need to be upgraded to the status of Usaha Ekonomi Desa Simpan Pinjam (UED-SP; English: Village Economy Business Savings and Loans) into the Badan Usaha Milik Kampung (English: Village Owned Enterprises) or Badan Usaha Milik Rakyat (English: People Owned Enterprises), so that the management can be improved.

4. It is necessary to develop loan models to micro and small business actors who refuse to conduct transactions with conventional Bank, with a religion-based model, such as sharia financial institutions.

REFERENCES

[1]. Albert, Terri C., Paulo B. Goes, and Alok Gupta. "GIST: A Modelfor Design and Management of Content and Interactivity of customer-Centric Web Sites." MIS Quarterly 28, no. 2 (June2004).

[2]. Alter, Allan E. "I.T. Outsourcing: Expect the Unexpected." CIOInsight (March 7, 2007).

[3]. Armstrong, Deborah J., and Bill C. Hardgrove. "UnderstandingMindshift Learning: The Transition to Object-OrientedDevelopment." MIS Quarterly 31, no. 3 (September 2007).

[4]. Aron, Ravi, Eric K.Clemons, and Sashi Reddi. "Just RightOutsourcing: Understanding and Managing Risk." Journal of Management Information Systems 22, no. 1 (Summer 2005).

[5]. Ashrafi, Noushin and Hessam Ashrafi. Object-Oriented Systems Analysis and Design. Upper Saddle River, NY: Prentice-Hall (2009).

[6]. Avison, David E., and Guy Fitzgerald." Where Now for Development Methodologies?" Communications of the ACM41, no. 1 (January 2003). Babcock, Charles. "Platform as a Service: What Vendors Offer." Information Week (October 3, 2009).

[7]. Baily, Martin N., and Diana Farrell." Exploding the Myths of Offshoring." The McKinsey Quarterly (July 2004).

[8]. Barthelemy, Jerome. "The Hidden Costs of IT Outsourcing." loan Management Review (Spring 2001). Lamongan.