



“Spin-off policy and efficiency in the Indonesian Islamic banking industry”

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SPIN-OFF POLICY AND EFFICIENCY IN THE INDONESIAN ISLAMIC BANKING INDUSTRY

Abstract

Indonesian Islamic Banking Act requires conventional banks to spin-off their Islamic business units if they had fulfilled the spin-off criteria. Some of the Islamic business units had done the spin-off process although they are not fulfilling the spin-off criteria. The data showed that there is an efficiency decline after the spin-off. This study is going to examine the spin-off's impact on the efficiency in spin-off banks. The method used in this paper is a difference-in-differences analysis. The sample used is four spin's banks as treatment objects and two Islamic full-pledge banks as control objects. This research shows that there is an impact of spin-off policy on the efficiency in spin-off banks. There is an efficiency decrease in spin-off banks after the activities. It implies that the spin-off policy is not the only strategy that can be implemented. The policy-makers can choose other strategies to enhance the development of Islamic banking industry.

Keywords

spin-off, efficiency, Islamic banks, difference in difference, policy

JEL Classification

C39, E58, G21, L59

INTRODUCTION

The research related to spin-off policy in Islamic banking is still limited. Few studies had discussed Islamic banks' spin-off in Indonesia. Nasuha (2012) found that there are performance differences in spin-off banks. Besides that, Ramdani (2015) and Hamid (2015) concluded that there is a positive impact of the spin-off on profitability after the spin-off. Al Arif (2014) also found that there is an increase in deposit funds between pre and post spin-off in the Islamic banking industry. The different result is shown by Al Arif (2015a, 2015b, and 2015c). Al Arif (2015a) found that the spin-off policy doesn't have an impact on financing in spin-off banks. Al Arif (2015b) concluded that there is no impact of spin-off policy on asset of spin-off banks. Al Arif (2015c) found that there is a declining efficiency after the spin-off policy. Al Arif (2017) also revealed that there is a negative relationship between spin-off and market share of the spin-off banks.

This research finds that there is an efficiency difference between pre and post spin-off in spin-off banks. There is a cost increase after the spin-off activities. It makes the efficiency declining in spin-off banks. These findings also supported by the data in Table 1. Table 1 indicates that there is an efficiency falling in spin-off banks after the spin-off is established. Al Arif (2015c) also reports that the spin-off policy had an impact on the efficiency in the Islamic banking industry. This fact raises a question, whether this spin-off policy was appropriate to implement in the Indonesian Islamic banking industry. Does the spin-off

activities that had been done by several Islamic business units have an impact on increasing their efficiency. Different results are shown by Sarifudin and Faturhman (2017), who found that there is an improvement in average efficiency of some spin-off banks.

The spin-off policy in the Islamic banking industry is a particular policy undertaken in Indonesia. This research found that the spin-off policy had an effect on the efficiency of Islamic banks. The operational efficiency decreases after the spin-off policy implementing in the spin-off banks. This result is contrary to the goal of the Islamic Banking Act (The Act No. 21 of 2008), which is going to accelerate the development of the Islamic banking industry.

This paper intends to analyze whether the spin-off policy has an impact on the efficiency of spin-off banks. The paper contributes to this research as follows. First, unlike the literature about spin-off focused on the performance of parent company after the spin-off decision, this paper concentrates on the performance of a spin-off company (spin-off banks). Second, the Islamic bank's spin-off is unique and is a special case for Indonesia. So, it might become the role model for Islamic bank's spin-off for other countries.

This act is contrary with the Indonesian banking architecture at the first pillar. The Indonesian banking architecture suggests merger to strengthen the Islamic banks capital. The spin-off will weaken the Islamic banks capital. Besides that, some problems arise after the spin-off policy implementation. First, the five percent target of Islamic banks market share still can not be achieved until 2016. Second, there is a decline in the Islamic banks growth – such as total assets, total loan, and total deposit funds – in the last few years after the spin-off policy implementation. Third, there is an efficiency decline after the spin-off. According to Novarini (2009), Pramuka (2011), Endri (2011), Hossen and Rahmawati (2016), the Islamic business units are substantially not efficient in terms of profits. The level of efficiency in Islamic business units is much lower rather than in the full-fledged Islamic banks; this occurs due to the differences in the assets. The asset of full-fledged Islamic banks is larger than in the Islamic business units. This condition will arise the potential problems in Islamic banking industry if the Islamic business units do the spun-off. If the Islamic business units are less efficient, it will affect the condition after the spun-off.

Table 1. The operational efficiency of spin-off banks

Source: Bank Publication Reports.

Bank	2008	2009	2010	2011	2012	2013	2014	2015
BNI Sharia	n.a.*	n.a.*	168.85	78.02	88.91	83.72	89.80	89.63
BRI Sharia	231.49	90.09	95.57	99.95	90.36	87.31	99.77	93.79
Bukopin Sharia	187.84	112.5	94.08	93.99	93.36	90.32	96.77	91.99
BJB Sharia	n.a.*	n.a.*	103.83	89.53	92.54	81.70	96.94	98.78
BCA Sharia	n.a.*	n.a.*	89.49	91.27	92.84	87.87	88.11	94.14
Panin Sharia	n.a.*	144.97	176.49	103.52	60.18	67.31	82.58	89.29
Victoria Sharia	n.a.*	n.a.*	87.57	80.65	90.81	82.76	143.31	119.19
Maybank Sharia	n.a.*	n.a.*	46.57	64.93	60.74	69.68	69.62	192.60

Note: * means years before spin-off.

The spin-off in Islamic banking is an important subject to discuss, since the Islamic bank's spin-off is a unique and extraordinary condition of the Indonesian Islamic banking industry. Adawiyah (2015) found that there are no efficiency differences between Islamic banks and foreign banks. Rodoni et al. (2017) concluded that the Indonesian Islamic banking industry is less efficient rather than Islamic banking sector in Malaysia and Pakistan.

1. LITERATURE REVIEW

There are few theories associated with Islamic banks' spin-off. Some of the researches analyzed the effect of spin-off policy on the performance of the spin-off banks. Some of the researches concluded that the spin-off policy had a positive impact on the performance of the Islamic banks (Nasuha, 2012; Ramdani, 2015; Hamid, 2015; Al Arif, 2014). But, some of the studies said that the spin-off policy had an adverse impact on the performance of the Islamic banks (Al Arif, 2015a; Al Arif, 2015b; Al Arif, 2015c; Al Arif, 2017).

To measure the performance of the Islamic banks, several criteria can be used, such as (Ascarya & Yumanita, 2008): (1) the quality of asset and its composition; (2) the capital structure of the Islamic banks; (3) the profitability of the Islamic banks; (4) the efficiency of the Islamic banks; (5) the liquidity of the Islamic banks; (6) the growth of the Islamic banks. This research is using efficiency as the performance indicator. The reason for using the efficiency is based on the phenomenon that there is a significant decline in the spin-off banks after the spin-off activities.

This research tried to examine the impact of spin-off policy on the efficiency of spin-off bank by using structure-conduct-performance (SCP) hypothesis. The SCP theory is based on the following proposition: when a few firms have a significant percentage of market share, this fosters collusion among enterprises in the industry. Samad (2008) said that there is a positive correlation between the degree of market share concentration and the company performance. There are some empirical studies in the banking market that provide support for the SCP hypothesis. Homma et al. (2014), Chan et al. (2015) conclude that the higher market concentration will decrease an efficiency rate in the banking industry.

There is an adverse phenomenon in the Indonesian Islamic banking industry. After the spin-off activities, there is a significant increase in the number of banks. This significant increase in number of banks had led to the decline in market concentration. Yuhanah (2016) found that there is significant decline in market concentration after the spin-off policy implementation. The decline in market concentration leads to the decline in the performance

of Islamic banks. Al Arif (2017) found that there is a negative relationship between spin-off policy and market share of the spin-off banks.

Spin-off is one of the policies implemented by the policymakers to increase the performance of Islamic banks. Spin-off will increase the number of the full-fledged Islamic banks in Indonesia; this will increase the competition among them. The more competitive market will reduce the marginal cost of the Islamic banking industry. This will make the Islamic banks operate more efficiently. Unfortunately, the fact is contrary to the aim of the Islamic Banking Act.

2. METHODS

This study used a difference-in-differences analysis to assess whether this spin-off policy has an impact on the efficiency of spin-offs banks. According to Woolridge (2009), this approach is applied when the data come from a natural experiment. The experiment establishes whether there is some exogenous event, such as a change in government policy. The sample is usefully divided into four groups: the control group before the change, the control group after the change, the treatment group before the change, and the treatment group after the change. Call C the control group and T the treatment group, letting dT equal unity for those in the treatment group, and zero otherwise. Then, letting dP denote a dummy variable for the post-policy change period.

The data used are quarterly data from 2005 to 2015. The data included four spin-off's banks (such as Bank of BNI Sharia, Bank of BRI Sharia, Bank of Bukopin Sharia, and Bank of BJB Sharia) as treatment objects and two banks (Bank of Sharia Mandiri and Bank of Mega Sharia) as control objects. The reasons for using these four banks are: (1) these four banks have quite long enough history as Islamic business units, i.e., more than five years; (2) these four banks had already done the spin-off, i.e., more than five years; (3) the availability of data. Besides that, the reasons for using the two banks as control objects are: (1) these two banks are subsidiaries of conventional banks; (2) these two banks had been full-pledge Islamic banks since their establishing. Although the samples are small, they

can generalize the empirical results, because all of the samples are the subsidiaries of conventional banks. The difference-in-differences framework of this research is shown in Table 2.

Table 2. Difference-in-differences framework

Group	Before spin-off	After spin-off	After-before
Control banks	α	$\alpha + \beta_1$	β_1
Treatment banks	$\alpha + \beta_2$	$\alpha + \beta_1 + \beta_2 + \beta_3$	$\beta_1 + \beta_3$
Control-treatment	β_2	$\beta_2 + \beta_3$	β_3

The model intends to analyze the impact of spin-off policy on the asset growth in the Indonesian Islamic banking industry using a difference-in-differences analysis. The mathematical equation proposed in this research is:

$$BOPO_{it} = \alpha + \beta_1 Ln_financing_{it} + \beta_2 Ln_Deposit_{it} + \beta_3 D_spinoff_{it} + \beta_4 D_treatment_{it} + \beta_5 DS \cdot DT_{it} + \beta_6 Inf_t + \beta_7 Int_t + \beta_8 Growth_t + \varepsilon_{it},$$

where *BOPO* is operational efficiency ratio; *Ln_financing* is log natural for total financing in Islamic banks; *Ln_Deposit_{it}* is Islamic banks deposit fund; *D_spinoff_{it}* is dummy variable for spin-off period, which is 0 is before spin-off period and 1 is after spin-off period; *D_treatment_{it}* is dummy variable for treatment, which is 0 is before treatment and 1 is after treatment; *DS · DT_{it}* is an interaction variable; *Inf_t* is inflation rate; *Int_t* is net interest margin from conventional banks; *Growth_t* is economic growth of Indonesia.

Table 3. Estimation results of spin-off and performance

Variables	Coefficient	t-statistics	Prob
D_spinoff	15.41985	2.907496	0.0040***
D_treatment	2.527375	0.343582	0.7315
DS · DT	26.80445	6.278926	0.0000***
Ln_Financing	-18.05051	-4.136474	0.0000***
Ln_Deposit	14.58041	3.787578	0.0002***
Inflation	89.75620	1.842403	0.0666*
Interest	-0.002639	-0.000720	0.9994
Growth	-1.686166	-0.685980	0.4934
Intercept	130.3969	4.211163	0.0000***
R-square	0.225866	F-statistics	8.862405
Adj R-square	0.200380	Prob (F-statistics)	0.000000

Note: ***, **, * significant at 1%, 5%, and 10% levels, respectively.

3. RESULTS AND DISCUSSION

3.1. Empirical results

The experimental results in Table 3 show that the variables that had an impact on operational efficiency are financing, deposit funds, dummy spin-off, and dummy interactions. The result indicates that there is an efficiency difference between pre and post spin-off. There is an inefficiency increase after the spin-off introduction in sample banks. The coefficient of dummy variable shows that the spin-off decision period will decrease the operational efficiency approximately by 15.42%.

For dummy interaction variables, the result shows that there is also an efficiency difference between pre and post spin-off in spin-off banks. The coefficient of dummy interaction indicates that there will be decrease in the operational efficiency approximately by 26.81% in spin-off banks after the spin-off. This implies that spin-off policy reduces the operational efficiency in spin-off banks.

The other variables that had an impact on operational efficiency are financing and deposit funds. The financing had an adverse impact on operational efficiency. It means that if there is a financing increase, there will be an operational efficiency decreasing in Islamic banks. The deposit funds had a positive impact on operational efficiency. It means that if there is a financing increase, there will also be an operational efficiency increasing in Islamic banks. This result implies that the Islamic banks should increase their deposit funds to increase the operational efficiency.

The determinant coefficients show that this model only explains about 20.03%, the rest is explained by other variables outside the model. This result implies that the variables that are included in this model only have a little influence on operational efficiency in Islamic banks. The F-statistics result shows the significant effect. This result implies that all the variables simultaneously had an impact on operational efficiency.

3.2. Discussion

The Islamic banking industry in Indonesia started in 1992 when the first Islamic bank was established (namely, Bank of Muamalat Indonesia). The law regulating the Islamic bank in 1992 is The Act No. 7 of 1992 about Banking Industry. In this Act, the Islamic bank was only stated as the profit-sharing bank. The development of Islamic banking industry in Indonesia is prolonged. In the mid of 1997, Indonesia suffered with the financial crises. The financial crises show that the Islamic banks can survive financial crises. This fact was followed by the amendment of the Act. In 1998, the Act No. 10 of 1998 about Banking Industry was established. According to the Act No. 10 of 1998, the Indonesian banking industry uses dual-banking system. The Islamic banks, according to this Act, were stated as banks that operated under the Sharia principles. The Islamic banking industry in Indonesia had two models: first, full-pledge Islamic bank, and second, the Islamic business unit from the conventional bank. After the enactment of the Act No. 10 of 1998, the Islamic banking industry developed very rapidly. The data shows that there are three full-pledge Islamic banks and 26 Islamic business units.

In July 2008, the Act No. 21 of 2008 about Islamic banking industry in Indonesia was established. The former Act (The Act No. 10 of 1998) is difficult for Islamic banking industry to grow faster. Hence, the Act No. 21 of 2008 was passed. One of the objectives of this Act was to accelerate the Islamic banking industry growth in Indonesia. One of the crucial points in the Act No. 21 of 2008 was the regulation about the Islamic business unit spin-offs if they fulfilled the criteria. The spin-off criteria, according to this Act, are as follows: (1) the Islamic business unit has reached the 50% assets of its parent bank; or, (2) has reached 15 years after this act was enacted or by the end of July 2023.

After this Act enactment, several Islamic business units do the spin-off although they still not fulfill the criteria based on the Act No. 21 of 2008. So, there is an increasing number of full-pledge Islamic banks. If before this act there were only 3 full-pledge Islamic banks and 26 Islamic business units, then after the law enactment, there are 12 full-pledge Islamic banks and 22 Islamic business units.

Starting from the SCP's framework in Figure 1, this study focuses on the impact of spin-off policy on the performance of Islamic banks. The performance used in this study is operational efficiency. This study empirically proved that the spin-off policy had an impact on operational efficiency in Islamic banks. This study is consistent with Al Arif (2015c) who also found that spin-off policy had an impact on operational efficiency in Islamic banking industry, while there is efficiency decline after the spin-off. The difference between this study and that by Al Arif (2015c) is in data and method. The previous study only used multiple regressions with the data at the industry level. The present study uses a difference-in-differences method to do the quasi-experiment for examining the spin-off policy. The regression with dummy variable had weaknesses; because we don't know whether the increase/decrease in the dependent variable is caused by the dummy variables. The difference-in-differences analysis is conducted to examine the real impact of the policy. Based on the experimental results and previous study, we can conclude that the spin-off activities will increase the operational cost of the subsidiary. The cost increase will make a declining efficiency in Islamic banks after the spin-off. This result is different from the study by Sarifudin and Faturrohman (2017), who found that the average efficiency of some spin-off banks improved after conducting spin-off.

The objective of spin-off policy is to increase the market share and performance of Islamic banking industry. The five percent market share target achieved in 2008, was not reached until 2015. However, this market share target finally can be realized in 2016. It needs nine years to achieve the market share target. Most of the studies found that the spin-off policy doesn't have an effect on the performance of Islamic banks' spin-off. Several Islamic business units implemented the spin-off although they do not fulfill the criteria. The spin-off done in a hurry may result in a performance decrease.

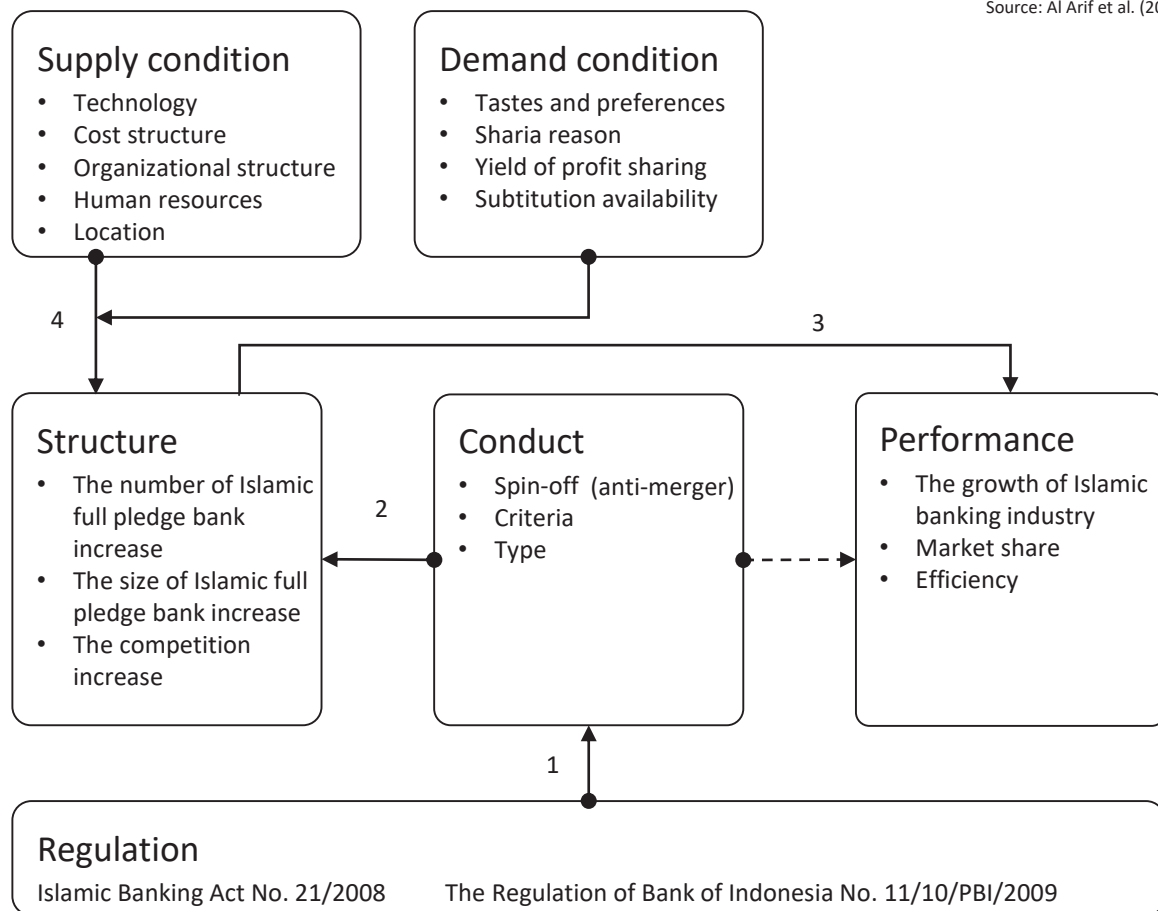


Figure 1. The theoretical framework of Islamic bank spin-offs

The results of this research is contrary to those by Beeson and Hyden (2002). They concluded that a lot of companies do the spin-off to increase the competitiveness and create a higher value-added for their shareholders. Klepper and Thompson (2010) found that the companies that have better performance before spin-off would have a better performance after the spin-off. The Islamic business unit must have a better performance before the spin-off, so after the spin-off, they can have a better performance. Thus, the parent banks should support the Islamic business unit to have a better performance before the spin-off. One of the supporting of a parent bank relates to the technology information system. The subsidiaries can use the technology information system of their parents. This strategy was utilized by Bank of BNI Sharia that still uses the technology from the parents. This approach will decrease the operational cost of the subsidiary banks. The other support that parents should do is to implement clean-book policy to their subsidiaries. The clean-book policy

is what the parents will cover all default financing from their subsidiary. So, the subsidiary can operate with zero default financing.

This research also used a qualitative approach using data from an in-depth interview with policy-makers (Bank of Indonesia and Financial Service Authority), bankers, and a questionnaire to bank customers. According to the questionnaire distributed to the bank customers, there are several results that we can discuss. First, the sharia-compliant is not the dominant factor in the consumer decision. This result implies that the reason for the spin-off, which states that Sharia factor is the main reason, is not entirely appropriate. The result showed that only 15% of the respondents chose Islamic banks for the sake of conformity with Islamic principles. These findings indicate that the spin-off reason due to the factors of Islamic laws compliance is not entirely appropriate. Other factors that affect the customer decision are the location near home (16%), location near the office (14%), payroll (13%), products

(11%), services (9%), and hospitality of the employees (9%). Second, most of the respondents knew that the bank has been separated from the parent banks (53% of those surveyed). Although the respondents knew the bank has been independent, there are no changes in saving behavior. The most important factors in saving behavior are income, for a customer, the form of Islamic banks – either the Islamic business unit or full-pledge Islamic banks – does not matter. The result shows that 30% of respondents will increase the saving, 54% of respondents said they would not change the saving behavior, and 16% of interviewees have not determined the response. Third, some respondents stated there is an increase in services and performance of Islamic banks after the spin-off decision. But, there are also several respondents who said there is no difference in services and performance. However, some of the respondents felt there is a decrease in services and performance after the spin-off decision.

Based on interviews with bankers, some results can be obtained. First, due to characteristic differentiation between Islamic banks and conventional banks, the spin-off is a matter that must do. There is a difference between Islamic banking system and conventional banking system. To make sure of the conformity of Islamic principles in Islamic banks, the Islamic business unit should be separated from its parent banks. Second, the spin-off decision should be based on corporate strategy and not imposed by the policy-maker. The primary consideration in spin-off decision should be based on the internal conditions of Islamic business units. Ariawan Amin (the former CEO of Bank of Jabar Banten Sharia) said that the core idea from the spin-off policy is to accelerate the Islamic banking growth, especially the Islamic business unit. In fact, the policy-makers encourage the spin-off to do although the internal conditions of Islamic business units are not yet appropriate. There are some weaknesses resulting from the premature spin-offs, such as: (i) the efficiency of the spin-off banks, and (ii) the human resources in spin-off banks. Third, all the respondents agree that the 50% share asset criterion is impossible to achieve due to the economy of the scale in existing Islamic business units. The risk of high growth rates will have an impact on the soundness of Islamic banks. Fourth, as for the 15 year criteria, the bankers had a different opinion. Some bankers said this year is enough to prepare the spin-off. The others stated that the spin-

off should not be restricted by the period, but should be based on the condition in each Islamic business unit. The maximum duration to do the spin-off will be the difference on each Islamic business unit.

One reason for the spin-off policy is to increase the growth of the Indonesian Islamic banking industry. This activity will increase the number of full-pledge Islamic banks. The increase in some full-pledge Islamic banks will make the industry competitive. The competition will enhance the performance of the Islamic banking industry. After the spin-off activities, the concentration ratio of Indonesian Islamic banking industry is still highly concentrated. If using CR2, the largest two banks dominated 43-50% of the total assets and deposits. If using the CR4, four most major banks in Islamic banking industry dominated 59-62% of the total assets and deposits. Although the spin-off activities have made the increase in some Islamic banks, this business still can not make a performance difference in the spin-off banks. Based on the previous results, we can see that the spin-off activities only give performance differences in financing, but there are no performance differences in asset and deposit from the spin-off banks. Horvath et al. (2016) find that the enhanced competition reduces liquidity creation. The findings of this research regard the impact of increased bank competition on the financial fragility of banks. This problem leads banks to reduce their lending and deposit activities.

The spin-off criteria should also be evaluated because the share asset rules are almost impossible to achieve. Haribowo (2017) found that there is no Islamic business units owned by regional development bank that can reach the 50% share asset. The spin-off decision should be based on the strategic planning from the banks, and not only on fulfilling the Act No. 21 of 2008 provision. Rizqullah (2013) said there were eleven elements that should be considered when the Islamic business unit decides as to the spin-off, namely:

- (1) the customer's reaction;
- (2) the competitor's response;
- (3) the business model after the spin-off;
- (4) the integration program;
- (5) communication program;
- (6) the transfer of employment status;
- (7) the supporting institution;
- (8) the speed of decision-making;
- (9) the regulation conformity;
- (10) the strategic consideration;
- and (11) the information and technology system.

The company size will be the primary consideration in deciding the target market from the banks. Lindholm-Dahlstrand (2000) said that there are several high growth factors in the spin-off company. The factors are: the company's size; the spin-off from the parent's internal crisis; the parent's support; the parent's behavior; the spin-off company innovation; the relationship between parents and his spin-off business just after spin-off; the relationship between parents and his spin-off company after ten year spin-off. Johnson et al. (1994) find that one factor that determines the success of spin-off process is parent equity divested (or spin-off size). With the larger size of the parent banks, the spin-off process would have a better probability of success rather than the spin-off done by the smaller companies. Most of the remaining Islamic business units owned by regional development bank only had a small size of the company. This phenomenon can cause problems when the spin-off decision to do. The larger the company size, the more efficient spin-off company will be.

Besides that, the other factor of the successful spin-off is a relationship between parent and subsidiary company. The parent banks should support the development of the spin-off banks. In practice, some of the parent banks give full support to their subsidiary banks. However, there are other parent banks that give less support to the development of their affiliates. In fact, there is a parent bank that considers its subsidiaries as competitors. This reason is in line with Tubke (2005) and Lindholm-Dahlstrand (2000) who said one factor determining the successful spin-off is the relationship between the parent company and its subsidiaries.

According to Tubke (2004), several factors affect the spin-off process. First, the business activity factor, such as the company size and the business

orientation of the subsidiaries. Second, the organization and management factor. Third, the relationships and support factor. There are three patterns of relationships, namely the market-relatedness, the product-relatedness, and the technology-relatedness. Fourth, transfer factor or transfer such transfer of experience from the parent company to its subsidiaries. Fifth, the motivation factor. Sixth, the business environment factor.

Kiswono (2012) said that four strategies could be used. First, the pure spin-off from Islamic business unit into full-pledge Islamic banks. Second, joined with other banks (merger). Third, acquiring the relatively small conventional banks, then converting into full-pledge Islamic banks. Fourth, conversion of the parent banks (conventional banks) into full-pledge Islamic banks.

The spin-off is only one of the strategies to improve the Islamic bank's performance. Miftah and Wibowo (2017) offered another strategy to improve the Islamic bank's performance through a merger. Merger and acquisition are part of restructuring company strategy which have the same primary goal with the ultimate goal of a company that provides value-added for investors or shareholders. The decision on a merger and the acquisition is influenced by the belief that the synergy between companies will be better than a running company with the same business separately. We can say that spin-off is contra-merger if we relate this to industrial organization literature. According to the Indonesian Banking Architecture, a merger is one of the strategies to strengthen the bank's capital. The spin-off policy imposed by the policy-maker is contrary to the strategies in the Indonesian Banking Architecture. Wiranatakusuma and Duasa (2017) suggest that the resilience of the real sector should support the resilience of Islamic banking industry.

CONCLUSION

This study investigates the impact of the spin-off policy on operational efficiency in spin-off banks. The result shows that the spin-off policy had an impact on operational efficiency. The operational efficiency in spin-off banks decreases after the spin-off done. There are some operational costs to be borne by the subsidiary after the spin-off. It makes the operational costs increase significantly. The relationship with the structure-conduct-performance framework, the spin-off policies that affect the conduct of companies do not have a significant effect on the efficiency of spin-off banks.

This study has several implications. First, the policy-maker does not rush to impose the spin-off policy. Second, policy-makers together with the parent banks should improve the performance of their subsidiaries. Third, the parent banks should support the development of their affiliates after the spin-off. Fourth, the Islamic business units should increase the fundraising from current account and save the account. The data from Financial Service Authority show that almost 60% fundraising of Islamic banks come from a time-saving deposit, which had an expensive cost of fund. Fifth, the Islamic banks should increase the service and product quality. Thus, this will attract more customers to do the transaction in Islamic banks.

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