

# Internal and External Key Success Factors of Business Process Re-Engineering (BPR): Effects on the Islamic Banks Performance

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## Abstract

**Objective:** The purpose of this study is to determine causal relationship between internal and external factors of Business Process Reengineering (BPR) and the performance of Islamic banks in Malaysia.

**Methodology:** The questionnaires were distributed and collected in the Bank Headquarters (HQs). From 64 sets of questionnaires, only 42 sets were returned and only 35 sets were usable for further analysis after the data screening process. PLS analysis was conducted to examine the causal relationship between the internal and external factors and organizational performance.

**Results:** The result showed that the internal factor had a significant effect on the performance of the Islamic banks, while external factor had no significant effect to these bank's performance.

**Implication:** The findings of this study provides important insights for Islamic financial institutions and researchers in the area of Islamic banking performance and business process reengineering projects.

**Keywords:** BPR Factors, Customer Focus, Process Redesign, Islamic Banking Performance.

## 1. Introduction

World's financial market should re-engineer their operations processes to compete in the global competitive world. This trend has led financial institutions to improve their customer service quality, speed, operating costs, and profitability performance. Hence, most of financial institutions implement effective strategies in order to improve their organization performances. One of the effective operations strategy adapted by the manufacturing industry up to financial industry is called Business Process Reengineering (BPR).

The adaption of BPR as an improvement tool in an organization was first introduced by Michael Hammer on 1988s as an originator in this field. Hammer and Champy defined BPR as a radical approach to gain significant improvement in measuring the performances, such as speed, service, quality and cost (1). However, almost 50-70 percent of organizations have failed in implementing the BPR (1-2). The inconsistent findings of BPR encourage researchers to examine the impact of BPR on Islamic banking in Malaysia.

In the context of financial institution, Khong & Richardson (3) have conducted a study on the financial institutions in Malaysia. Nevertheless their study is not specific in measuring the impact of BPR on the performance of Islamic banking. Furthermore, the implementation of BPR on banking performance is also fully supported by the Bank Negara Malaysia (BNM) (3). The current study aimed to examine the impact of BPR internal and external factors on performance due to the lack of empirical evidences

from the previous study (4) especially from the perspectives of *shari'ah*.

In this study, BPR factors are classified into two categories namely internal and external factors. The internal factor of BPR is process redesign, while customers focus is the external factor. The purpose of this paper is to determine the relationship between internal and external success factors of BPR toward the performance of Islamic banking in Malaysia. The next parts discuss the details on literatures, methodology and the findings of this study.

## 2. Literature Review

### 2.1 Islamic Banking

Islamic banking relates to the financial activities that consists of *Shariah* compliants or Islamic law, which are based on Al-Quran and *Sunnah* of Prophet Muhammad P.B.U.H. (5). Islamic banking can be divided into three categories which are [a] full-fledged Islamic banking, [b] Islamic window of conventional bank, and [c] Islamic finance companies.

The new milestone of development of modern Islamic banking started on 1963 after the establishment of Mit Ghamr Local Savings Bank of Egypt (6). Meanwhile, the development of Islamic banking in Malaysia has started from 1983 under the enactment of Islamic Banking Act 1983. The first Islamic bank in Malaysia was Bank Islam Malaysia Berhad. In fact, currently there are more than 20 financial institutions in Malaysia that

implement Islamic banking after BNM introduced a new scheme known as "Skim Perbankan Islam" on 04 March 1993 (The Star Online).

Majority of the previous studies measured performance based on the financial and the non-financial indicators. Nevertheless, the measurement is depending on the objective and organizational goals. The conventional banking operates based on pre-fixed interest, while Islamic banks operate based on profit and loss sharing (7). Different yardstick between both banks, requires the different criteria for measurement. Recently, the performance of Islamic banking is measured based on the *Maqasid Al-shariah* Framework in order to solve a lot of contradiction, besides as a set standard worldview in the context of al-Qur'an and al-Sunnah (8). Hence, the current researchers used the performance indicator based on the Maqasid al-Shari'ah [a] Educating the individual, [b] Establishing justice and [c] Promoting Welfare (9-10).

### 2.1.1. Educating the Individual

Educating the individual is divided into three dimensions which include the advancing of knowledge (education grant or scholarship and research funding), instilling a new skills and improvements (training) and creating the awareness of Islamic banking (publicity).

### 2.1.2. Establishing justice

Establishing justice is divided into three dimensions such as fair returns (profit equalization reserves and net investment income), elimination of negative elements that cause injustices (interest free product) and not reasonable price for products and services (total investment in mudarabah and musharakah).

### 2.1.3. Promoting Welfare or Public Interest

Promoting welfare is also divided into three dimensions includes profitability of bank (net income and total assets), redistribution of income and wealth (zakkah and net income) and investment in vital economic sectors (investment in real sector and investment in services).

## 2.2 Business Process Re-Engineering

M.Hammer (11) defined BPR as a "fundamental rethinking and radical redesign of business processes to achieve a dramatic improvement in a critical quantum leap of contemporary measures of performance, such as cost, quality, service, and speed". BPR is a popular approach in organization, where BPR is able to handle a cycle of business activity, technologies and assisting company to optimize the profit and productivity (12).

There are several factors that contribute to the success factor of BPR. Nevertheless, this paper is focusing on two factors: internal and external factors of BPR towards organizational performance. Internal factor (inside of organization) means that the factor is the source the competitive advantage compared to other organizations. The external factor (outside of organization) is those factors that give advantage or disadvantage towards the organization.

### 2.3 Internal Factor (Process Redesign)

Process redesign is one of the internal factors of BPR. Ramirez et al. (13) explained that process redesign is one of many programs that can boost positive changes in the organization. Organization also finds the ability and new way to add value to their customers when organization is capable to manage process redesign effectively (14). This is supported by Hall et al.(15) where, "when organization is successfully redesigning their process, it helped the organization to be successful in adapted BPR approach". Davenport (16) emphasizes the improvement that can be realized in overall performance when the key processes are redesigned correctly, whether incrementally or radically. Nevertheless, other

previous researchers found that process redesign have an insignificant relation with banking performance (4). It means there are inconsistent relationships between process redesign and organization performance.

### 2.4 External Factor (Customer Focus)

Every organization has its own customers either from manufacturing, service or public organizations. An organization will be able to have close relationship with the customer when it provides a good customer service. Demands and requirements from customer should be measured and realized by giving customer's values. Customer's research, analysis demand and competitive analysis are example of customer evaluations. The customer's evaluation is important in order to improve the performance (19). Organization used result from customer evaluation either to reengineer or sustain their operations processes. The finding is supported by Salimifard et al.(20) where they found the best way to implement BPR is depending on customers demand. It means the role of customer is very important to the success implementation of BPR.

In case of the banking industry, the role of customer is very important. According to Cheng & Chiu (18), banks are able to sustain competitive advantage when they are able to satisfy demands from customers. Nevertheless, based on the finding by the other previous researchers (4), customer focus had no significant association with organizational performance in the context of Nigerian banks. It means the results of their relationships are still inconsistent.

Based on the discussion above, the research hypotheses were formulated as follows:

**H1:** There is positive effect of process redesign (internal factor) on the Islamic bank performance.

**H2:** There is a positive effect of customer focus (external factor) on the Islamic bank performance.

## 3. Methodology

This study was solely based on the quantitative approach. It was exploratory in nature since it was a new area in Islamic banking performance especially in Malaysia (21). This was also a cross-sectional survey where questionnaire was used as the research instrument to answer the hypothesis of study. Questionnaires were distribute to banking HQs by hand as well as emails.

Unit analysis of this study was organization. Organization was used as unit analysis because it relates to the organizational performance (21). 16 Islamic banking HQs were involved in this study. Because of the small populations and to avoid bias, four sets of questionnaire were distributed to every bank. The total set of questionnaire distributed was 64 sets. It was parallel to others researchers where, they are suggested to used multiple respondent to avoid bias, balanced the perspective of BPR variables, and concern with negative or positive feeling about the research topic (17-18, 22-23). From 64 sets of questionnaires, only 42 sets or 65% were returned.

After the collection of completed questionnaires, the quality control of data from the survey was essential as it was a complicated task. For this matter, the researcher needed to ensure that all questions were answered. Referring to (25), it would be very helpful especially for experienced person to simply distinguish the good or bad data with sufficient amount of time which obtained from the respondents. From 42 sets, only 35 sets questionnaire were used to make an analysis after the process of data cleaning and elimination.

**The key variables of the study were:**

- Process redesign
- Customer focus
- Organizational performance

The Partial Least Squares (PLS), Smartpls version 3.0, was used to analyze the causal relationship between exogenous and endogenous variables. Significant value and t-value were used to determine the significance of the relationship. The PLS analysis was appropriate because it can analyze all paths simultaneously. In addition, the bootstrapping method was used to derive the statistical significance. The size of sub-samples to run bootstrapping technique was based on the suggestion by Hair et al. (27).

### 4. Findings

The next sections discusses the findings of the study in terms of (a) measurement model and (b) structural model.

#### 4.1 Measurement model

Figure 1 shows the overall results of the hypothesized model. A good model fit in PLS depends on several factors such as (a) the availability of the significant path coefficients, (b) acceptable R<sup>2</sup> values, and (c) good construct reliability (28). The results, as shown in Figure 1, showed that all path coefficients were statistically significant. The R<sup>2</sup> values were for the path was 26.7%. This model was deemed as significant as the R<sup>2</sup> value which is above 26% is considered as substantial (29). Thus, the model in Figure 1 can be considered as an acceptable model.

The composite reliability (CR) and average variance extracted (AVE) were then used to assess the reliability of the constructs of the study. Table 2 shows the results of the analysis. Composite reliability is recommended to be higher than 0.7 (26). The CR values for the constructs were all above the recommended 0.7 level. The values of the Cronbach's alpha ( $\alpha$ ) for the constructs were all above the recommended value of 0.7. The AVE, on the other hand, denotes the amount of variance that a construct captures from its indicator relative to the amount due to measurement error (30). The recommended critical value for AVE is 0.5 (26). In the context of this study, the AVE values were also above the recommended value of 0.5. In addition, the convergent validity was also assessed through the loadings of each indicator. The standardized loadings should be greater than 0.7 (27). As shown in Table 2, the loadings for most of the indicators were above the 0.7 cut-off point.

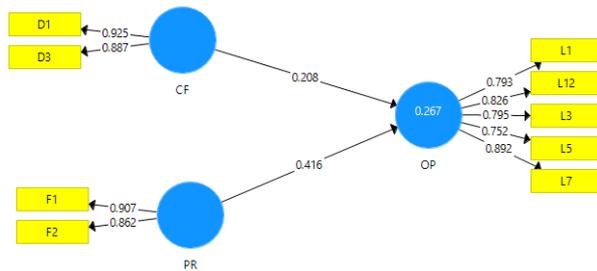


Fig. 1: The measurement model for internal and external success factors of BPR on the performance of Islamic banks.

Table 2: Convergent validity and reliability of the constructs

Latent variable	Indicators	Loadings	AVE	CR	$\alpha$
Customer Focus (CF)	D1	0.93	0.82	0.9	0.78
	D3	0.89			
Process Redesign (PR)	F1	0.91	0.78	0.88	0.73
	F2	0.86			
Organizational Performance (OP)	L1	0.79	0.67	0.91	0.87
	L3	0.8			
	L5	0.75			
	L7	0.75			
	L12	0.83			

Next, the discriminant validity through the cross loadings and the relationship between correlations among constructs and the square roots of AVE (30) was assessed. Table 3 shows the results of the analysis. The cross loadings exhibited adequate levels of discriminant validity as the square roots of AVE (bold in diagonal) were greater than the correlations among the constructs (off diagonal values).

Table 3: Discriminant validity of constructs

	Customer Focus	Process Redesign	Organizational Performance
Customer Focus	<b>0.906</b>		
Process Redesign	0.292	<b>0.885</b>	
Organizational Performance	0.330	0.477	<b>0.813</b>

#### 4.2 Structural model

Table 4 summarizes the results of causal relationship in the structural model. The findings showed mixed results. The first relationship (H1), customer focus and organizational performance was found to be insignificant (0.22; t > 1.30). The second relationship (H2), process redesign and organizational performance was positive and significant (0.44; t > 3.26). In other words, the study showed that internal factor in these banks had positive effect on the performance, while the external has no significant effect on the performance of the Islamic banks.

Table 4: Structural model results

Path	Be-ta	t-value	Decision
H1: Customer Focus -> Organizational Performance	0.22	1.30	Not Supported
H2: Process Redesign -> Organizational Performance	0.44	3.26	Supported

### 5. Discussion and Conclusion

#### 5.1. Discussion

This study is the extension of past studies on the success factor of BPR implementation and bank's performance. However, this study specifically examines the performance from the perspective of *Maqasid Al Shari'ah*. This study focuses on findings the influence of the internal and external success factor of BPR on the performance of Islamic banks. The internal factor is process redesign, while the external factor is customer focus.

Specifically, the results show that internal factor is significantly related to the performance of Islamic banking. Based on the result, the Islamic banking should carefully plan their processes in order to success or improve their banks performance.

The findings of this study are supported by previous study (14-16) where they found the process redesign are the most important factor in ensuring the improvement in organization. It means that, every process of redesign should have a direct impact on customer value and cost (17). It will help bank to improve their performance.

The restructuring of the internal operational processes involved some kind of innovations and value added services to the various processes such as cheque clearing and settlement, remittances for payment of bills interbank transfers, fund transfers and opening of letter of credit (4). It would be the reason of why internal operation processes are really important to ensure the improvement of the organization.

Meanwhile, this study found that the customer focus is not a significant influence of the performance of Islamic banking. This is contrary to the findings of Cheng & Chiu (18) who encouraged banks to focus on their customer and emphasize customers as the key driver of change that leads a transformation in organizations. However, the result is parallel with past studies of Ringim et al.(4)

where they also found insignificant relation with performance banks in Nigeria.

## 5.2. Limitation

Several limitations have been pointed out by the researcher. The limitation of the study includes:

- This study only focusing on survey questionnaire method without combining it with the interview.
- The study is only focusing on full-fledged Islamic banking and Islamic window of conventional banks without involving all of Islamic finance companies. Hence, the sample size is small and limited.

## 5.3. Suggestion for future research

The present study used quantitative techniques and analyzed with a small sample size. In future research, we suggest a mixed method study to incorporate the qualitative information of business process reengineering. The results of such approach are more meaningful and would give better answer in understanding the relationship. Moreover, the future researchers will be able to understand the role of Islamic finance companies.

The findings also raises question on the role of culture in influencing the performance. One particular study in Hong Kong found that customer focus is important (18) while in Nigeria (4) and the current study found customer focus are insignificant. Hence, the further research should examine the impact of culture or location of study.

## 5.4. Conclusion

In conclusion, internal factor of BPR is significantly related to the Islamic banking performance, while the external factor of BPR is insignificantly related to the bank's performance. Hence, we suggest banks to strengthen the management of Islamic banking by always redesign their processes in accordance to customer requirements in their BPR projects. This will lead to better performance. The finding of this study would use for further research and in BPR field especially in Malaysian banks.

## Acknowledgement

We would like to take this opportunity to express our sincere appreciation to the Ministry of Higher Education for awarding us the research grant of RM105, 000.00 to enable this research to be accomplished.

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