Board Gender Diversity and Risk-Taking Behavior of Islamic Bank. A Conceptual Framework

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Abstract. Female directorships become significant contributors to corporate decision-making by targeting 30% of women on the board requirement under the Malaysian Code of Corporate Governance 2017 (MCCG 2017). Gender diversity in board composite attracts attention in corporate governance studies, while vast literature documented that female director have more substantial positive implications on firm performance. In nature, females behave risk-aversion psychologically and are relatively more conservative than men while making decisions. Hence, board gender diversity and firm risk-taking behavior are gaining much interest in academic and industry players to the extent of sustainable socio-economic development. However, there is still not much investigation conducted on the role of female directors in Islamic banks with the stereotype of woman's lack of opportunities to compete with men in a top high-ranking position, particularly in the Islamic banking environment. This study proposed a conceptual framework to examine the composite of female directors in Islamic banks in Malaysia, with the new targeting proportion of women directorship under MCCG 2017, and the relationship of bank risk-taking behavior. Moreover, this paper also makes an attempt to propose other bank governance and bank-specific characteristics as control variables for analyzing the association between female director and bank risk-taking behavior.

Keywords: Bank risk-taking · Islamic banks · Female director · Bank governance

1 Introduction

Recently, the lack of women's participation on boards of directors has emerged as a significant issue, given that gender diversity plays an important role in countries' sustainable

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socio-economic development and economic Julizaerma and Sori (2012). According to Adams and Funk (2012), women directors are more caring and generous than men but have less power and generally sit in lower positions in an organization. Their research reveals a positive relationship between gender diversity and corporate performance. For this reason, the Malaysian government policy stipulates that there must be at least 30 percent females in corporate decision-making positions according to Malaysia Code of Corporate Governance 2017 (MCCG, 2017). The requirement is to encourage corporate to include more women at the board level and senior management position.

Islamic banks also expected to comply with the requirement of MCCG 2017 in which to satisfy the gender diversity in board participation. Islamic banks play an essential role as the intermediate that provides liquidity to the financial system. However, the lack of effective corporate governance systems and extreme risk-taking could causes instability in the banking industry. For this reason, it is very important for the banking sector to maintain good and prudent standards of corporate governance (Jabari & Muhamad, 2022; Nainggolan, Prahmila, & Syaputri, 2022). It is crucial that an effective governance by monitoring the bank operating activities, especially in excessive risk-taking to ensure the banking system's stability and resilience. Although the current research asses the key governance mechanism and gender diversity relationship showing a positive impact in assessing risk-taking behavior and corporate performance on conventional banks.

Previous studies had remarked that generally female executives do not obtain fair recognition for their talents and abilities due to a stereotype perception as they are lacking of experience in completing ordinary male jobs (Dezsö & Ross, 2012; Julizaerma & Sori, 2012; Nainggolan et al., 2022). Thereupon, according to a recent study conducted by Owen and Temesvary (2018) on US banks, female board members are most capable of playing a crucial role in a bank's stability, which further asserts that female directors are more effective in the banking industry. As a result, it is essential to evaluate Islamic banks' risk-taking behavior and determine if the same criteria may be applied to the Malaysian banking system. This study further develops a conceptual framework to examine the effects of bank risk-taking behavior on gender diversity and the relationship with other bank control variables to evaluate the hypotheses.

2 Literature Review

The separation of ownership between shareholders (Principal) and management (agent) is found prominent in a corporation. Therefore, agency theory is utilised to understand possible conflicts between both parties and methods for resolving them (Jensen, 1976). In the context of Malaysian Code of Corporate Governance (MCCG, 2017), it was stated that different individuals should hold the position of Chairman and Chief Executive Officer (CEO). This is to promote a good corporate governance, accountability and to facilitate the division of responsibilities between them. Further to align the relationship between principal and agent, a proper incentive and award should be given to the agents as to motivate them to work at the best interest of the principal. According to Eisenhardt (1989), pursuing different goals between principal & agent and conflicts of interest due to different risk preferences were two critical issues in agency relationship. In order to sustain the mutual interest, it involves regulatory agency cost such as bonding costs, monitoring fees, and residual loss (Jensen, 1976).

The studies of Biswas, Bhuiyan, and Ullah (2008) has concluded that, Corporate Governance (CG) is responsible for a control mechanism in reducing the differences between principals and agent interests and added that it is specifically used as a mixture of external and internal mechanisms that will fully utilize the organization's available resources. Hence, Corporate Governance is required to ensure that the directors hired will play roles to maximize shareholder wealth. For this reason, a strong foundation in corporate governance such as practice of good ethics, accountability, transparency and sustainability is essential to create long-term value for its shareholders. Not only for the value creation, it is further extended to ensure the interest of stakeholders is preserved on a sustainable basis (Biswas et al., 2008; Eisenhardt, 1989). Moreover, a strong corporate governance can be attained by increasing gender diversity. Adams and Ferreira (2009); Owen and Temesvary (2018) assert the value of having women on corporate boards since they actively participate in supervisory and monitoring obligations. This paper obtains a theoretical framework and hypotheses development based on the previous empirical studies on bank governance issues conducted by the local and international researchers, particular interest in gender diversity.

2.1 Risk Taking Behavior (Z-Score)

The original Z-score was developed to forecast industrial companies' likelihood of insolvency. For the banking sector, the Z-score was the primary method for assessing risk-taking behavior and the bank's financial health. (Čihák & Hesse, 2010; González, Gil, Cunill, & Lindahl, 2016; Islam, Bhuiyan, Kassim, & Rasli, 2021). A higher Z-score indicates a lower insolvency risk of a corporation. The equation is formed as follow:

$$Z = (\mu + c)/\sigma,$$

where μ is the return on average assets (ROAA), c is the average of equity capital relative to the bank total assets (equity/total assets) and σ is the standard deviation (volatility) of the return on average assets (ROAA). This concept originated with Graham and Boyd (1986), the bigger the Z-score, the greater the cushion before a bank's equity reserve is depleted and can be viewed as a sign of increased bank stability.

2.2 Female Director

Many researches have been carried out on the performance of female directors and mixed results were obtained. The study of Solimene, Coluccia, and Fontana (2017) found that experienced and educated female directors could improve the performance of an organization in Italian public listed company. In contrary, Yang, Riepe, Moser, Pull, and Terjesen (2019) studies had concluded that the incongruity of role and the gender-stereotyping theory reflect an adverse effect of female directors on organization performance. Female directors are less willing to take risks when making choices than their male counterparts. According to research by Palvia, Vähämaa, and Vähämaa (2015) and Man (2013), they found women are often more cautious and less prone to take unnecessary risks in the banking sector. In Malaysia banking sector, Jubilee, Khong, and Hung (2018) evaluated the role of female in the board in Malaysia system and discovered that the participation of female board directors is significantly and positively related to bank performance. The proposed study's hypothesis is therefore presented as follows:

H1: A female director is connected with lower bank risk taking behavior.

2.3 Board of Director

There were mixed findings found on how the board size of directors' influence the performance of an organization. As a large board is formed with various expertise, it will lead to a better decision-making process. However, it was reported that a bureaucratic related issue may arises when the board size is large and in turn it will make the decision-making become more complex and time-consuming (Biswas et al., 2008; Jensen, 1976). The studies of Naushad and Malik (2015) revealed a substantial and negative correlation between board size and bank performance in the Gulf Cooperation Council (GCC). Huang, Huang, and Lee (2014) examined the size of the board and the firm's total risk-taking and discovered that organizations with larger boards will be less vulnerable to risk. According to the empirical findings, organizations with smaller boards have a greater degree of performance uncertainty and concluded the size of the board and bank risk-taking are negatively connected. The proposed study's hypothesis is therefore presented as follows:

H2: The number of bank board of director is connected with lower bank risk taking behavior.

2.4 Independent Director

The role of an independent director is to be a trustee of the shareholders and to be free from any conflicts of interest. Therefore, they are having absolute freedom in questioning the management when it is necessary. Based on the agency theory, an appointment of the independent directors on the board is recommended to mitigate the conflicts of interests (Fama & Jensen, 1983; Jensen, 1976). According to the agency theory, more independent directors can monitor managerial decisions. The majority of the board should consist of independent directors who do not hold positions within the corporation (Kiel & Nicholson, 2003). Although independent non-executive directors may not have industry-specific knowledge, they can raise the board's level of oversight, which will boost bank performance (Farag, Mallin, & Ow-Yong, 2018). The empirical results conducted by Lassoued (2018) indicated a substantial positive association between the independent directors and the financial soundness of Islamic financial institutions. From literature, the proposed study's hypothesis is therefore presented as follows:

H3: The independent director relates to lower bank risk taking behavior.

2.5 Shariah Committee

Islamic banks have a distinct governance structure from traditional conventional banks. Due to Shariah-compliant activities and the requirement of the regulator, Islamic banks have a governance system that differs from traditional conventional banks. In addition to the regular committees to support the Board of Directors, Islamic Banks provide another layer of governance, namely, Shariah committees, to monitor the compliance of Shariah requirements in the bank's operational activities. The Shariah Committee is accountable and responsible for Shariah-related issues. These include advising the Board and Management on Shariah-related concerns, as well as endorsing Shariah policies, validating products and services, and the appropriate documentation in regard to Shariah-compliant Islamic Banking activities (Rahim & Rahman, 2015). The findings of Basiruddin and Ahmed (2019) showed that the Shariah committee reduced the Shariah non-compliant risk. Meanwhile, Khan, Zahid, and Akhtar (2018) has concluded that larger Shari'ah boards, which is similar to Shariah committees in Malaysia, can enhance the value of the Islamic banks. The reason is that such board members have various ethical and religious backgrounds; combining their educational credentials and professional experience, which larger size will assist the board of directors in addressing Shariah-compliant activities in the banks. The proposed study's hypothesis is therefore presented as follows:

H4: The number of Shariah committees is connected with lower bank risk taking behavior.

2.6 Bank Profit (ROA)

Return on Asset (ROA) is commonly used as an indicator to measure the profit performance of an organization since this ratio is taking consideration firm capability in generating the net income from its utilization of the assets invested. Dell'Ariccia, Laeven, and Marquez (2014) stated that, the bank profit could be used to reflect the bank's capability in making profits when it succeeds in the past and thus creates an incentive limit the firm risk-taking activities. A higher ROA indicates that, the company is using its assets efficiently in generating the profit for the company. Bushman, Hendricks, and Williams (2016) conducted an empirical investigation on non-interest-based income and bank risk-taking and discovered a positive relationship between bank profitability and risk-taking. The finding support by Moudud-Ul-Huq (2020) in the study on developing economies from 2004 to 2015, they concluded the bank risk-taking is linked to greater profitability. The proposed study's to test the relationship in the following hypothesis.

H5: The bank return on asset (ROA) is connected with lower bank risk taking behavior.

2.7 Bank Size

The natural logarithm of the bank's total assets determines as a bank size proxy and displays how the bank employs its entire assets (Aktan, Turen, Tvaronavičienė, Celik, & Alsadeh, 2018). It is commonly used as a controlling variable to determine the factors influencing the dependent variable. Compared to smaller banks, those bank with greater total assets will have a greater variety of investment choices and superior management. Thus, larger size banks outperformed smaller size institutions (Camilleri, 2005). The consistent findings of Siddik, Kabiraj, and Joghee (2017) indicate that, based on total assets, larger banks outperform than a smaller institutions. However, due to the "too big to fail" concern, bank size can be a significant factor in greater risk-taking (Mishkin, 2006). Recent empirical research shows that big banks have lower capital ratios, less reliable funding, and greater exposure to potentially riskier market-based operations (Laeven, Ratnovski, & Tong, 2014). Similarly, Čihák and Hesse (2010) found that for large banks, Z-scores continue to rise with bank size and vice versa. Louati, Gargouri Abida, and Boujelbene (2015) shared the same perspective. They concluded that the strength and stability of the financial performance are said to improve when an Islamic bank's size increases due to its income diversification. The proposed study's hypothesis is therefore presented as follows:

H6: The larger bank size relates to higher bank risk taking behavior.

2.8 Conceptual Framework

The literature review showed that the female director, bank governance, and bank-specific control variables affect bank risk-taking behavior in different aspects, followed by the development of the proposed conceptual framework below (Fig. 1).

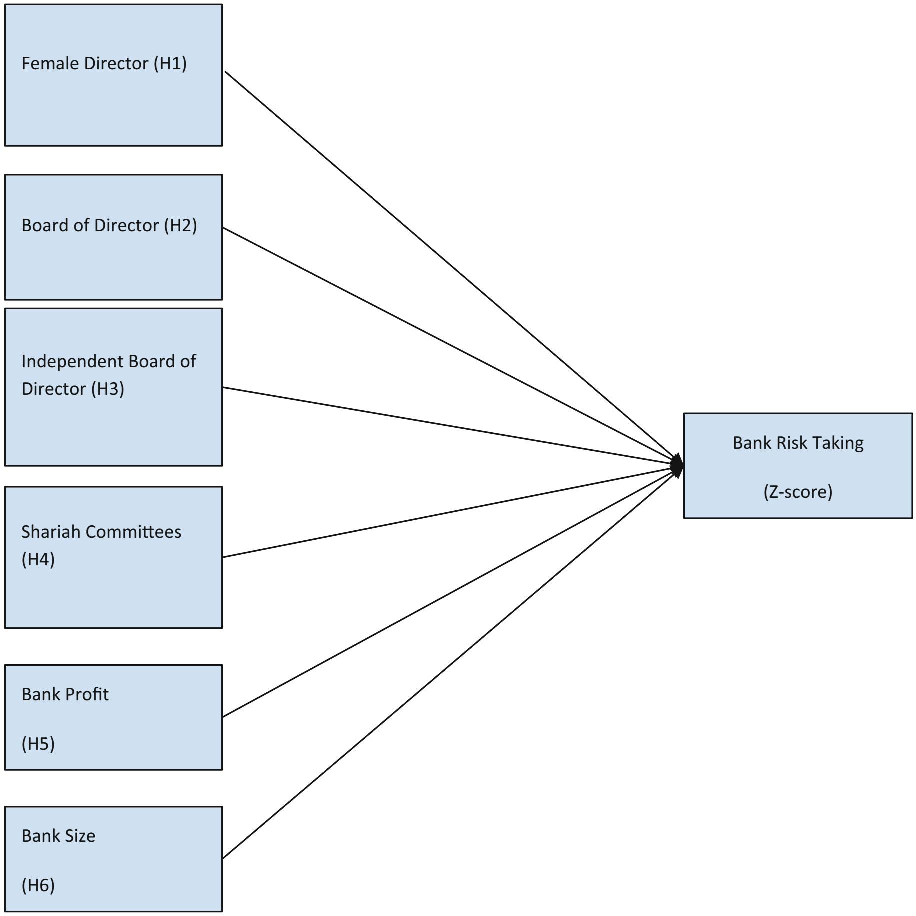

Fig. 1. Proposed Conceptual Framework

3 Research Methodology

Our plan of source for gathering data for this study was the annual reports of 14 publicly traded Islamic banks operating in Malaysia. The proposed period under observation runs from 2010 to 2019 by stratified random sampling technique. The following panel data analysis model has been developed to hypothesize the conceptual framework:

Z-Scoreit = α + *β1*Femaleit + *β2Ln*BoDit + *β3*INDPit + *β4*SCit + *β5*ROAit + *β6*Sizeit + fi + εit.

Where,

α = intercept

Z-Score = Bank Risk taking behavior

LnBoD = Natural Log of Bank Board of Director.

INDP = Bank Independent Director Ratio

SC = Shariah Committees

Female = Bank Female Directors Percentage

ROA = Return on Profit

Size = Bank Size

f_i = Bank fixed effect,

ε_i = error term.

The f_i denotes the time-invariant bank fixed effects of panel data which are consistent by all bank-level variables and invariant to change over time. The disturbance error term is denoted as ε_i which assumed mean equal to zero, uncorrelated with itself, uncorrelated with other variable and homoscedastic. There is three outcomes of linear panel models namely pooled OLS model (POLS), fixed effect model (FEM) and random effect model (REM). The selection of an appropriate model of panel data subjected to statistical tests for confirmation of model suitability with econometrics tools, such as F-Test, Hausman Test and Breusch Pagan Lagrange multiplier test (Gujarati, 2021).

4 Conclusion

In conclusion, this study aims to investigate the effect of board gender diversity on risk-taking behavior among Islamic banks in Malaysia. The rapid changes in the economic environment have posed a significant challenge to the management of Islamic banks to maintain sustainable growth and compete for survivorship in the competitive industry. As such, a conceptual model was developed based on the literature review. The conceptual framework developed in this study lays the groundwork for a forthcoming empirical analysis for establishing gender diversity in Islamic banks and further contribution to the bank governance literature review.

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