



Could the Theory of Planned Behaviour Explain Market Discipline in Sharia Mutual Funds?

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Abstract

A significant number of studies have explored market discipline as indicated by investors or customers being sensitive toward the excessive risks taken by banks. Yet no scholars have sought to review this topic from the behavioural finance perspective. This study defines market discipline as withdrawal behaviour, captured here using the theory of planned behaviour (TPB) as one of the behavioural finance theories. This study aims to determine the psychological and social factors influencing market discipline from a behavioural perspective, by employing the TPB. This study's sample comprised of 93 academicians who invested in Sharia mutual funds in Greater Jakarta, Indonesia. The results show that the intention to withdraw and perceived behavioural control (PBC) are able to predict the market discipline, while the intention to withdraw from Sharia mutual funds is determined by the subjective norms and PBC. Attitudes towards withdrawal are shown to be insignificant in explaining the intention to withdraw from Sharia mutual funds.⁵

Keywords: Market discipline, Behavioural perspective, Academicians, Sharia mutual fund

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INTRODUCTION

According to Flannery (2001), since the 1970s, the topic of market discipline began to be explored in banking research. The emergence of market discipline was motivated by the experience of a systemic banking crisis in many countries around the world (Caprio and Klingebiel, 2002). A new framework for capital adequacy was proposed by the Basel Committee on Banking Supervision. This sought to address deficiencies in the banking sector in the wake of the global banking crisis. A third pillar, the New Basel Capital Accord (Basel II), was established in order to improve market discipline. Basel II stipulated that banks were obligated to disclose information (Benink and Wihlborg, 2002).

Generally speaking, market discipline in the banking sector is understood to be where the costs stemming from the risks taken by banks are borne by the shareholders, creditors and depositors (market participants) and where these market participants then react to these costs (Berger, 1991). For this reason, market discipline in the banking sector can be seen in the reaction of these agents in terms of punishment—a manifestation of the market power they wield—for the excessive risks taken by banks; such punishments can involve the withdrawal of deposits or demands for higher yields or rates of interest (De Ceuster and Masschelein, 2003; Martinez Peria and Schmukler, 2001).

In the insurance industry, Eling (2012) explained that it is possible to distinguish between investor-driven and customer-driven market discipline. The customers, investors, intermediaries and evaluators in insurance companies are market participants who can supervise and influence risk management, both directly and indirectly. Financial institutions in general also need to have market discipline, as part of the wider banking regulations (Walter, 2004), which also encompass mutual funds. One of the characteristics of both conventional and Sharia mutual funds is that the investors in mutual funds simultaneously play the role of customers (Dangl, Wu, and Zechner, 2006).

In the context of Sharia mutual funds, the Sharia Supervisory Board acts as an advocate for customers through its monitoring role, to ensure that every action taken by the fund managers is in compliance with Sharia principles (DeLorenzo, 2000). However, individual investors in Sharia mutual funds are able to discipline the market. This can be done through the withdrawal of funds when investors feel dissatisfaction with the services they receive; this is done in order to penalise fund managers (Dangl *et al.*, 2006). Abduh (2014) stated that one of the reasons may be observed in relation to the withdrawal of funds from Islamic banks, namely: the issue of a bank's non-compliance with Sharia principles. In this study, the withdrawal of Sharia mutual fund investments is reviewed by referring to Abduh (2014), who took into account information that fund managers had breached Sharia compliance in managing their funds.

This study examines market discipline through the perspective behavioural finance by looking at the tendency of investors to withdraw their investments from Sharia mutual funds. As far as the authors are aware, this study represents the first occasion on which market discipline has been examined from this perspective. Therefore, it is interesting to investigate market discipline by considering the decision processes, in order to know how decisions are made (DeBondt, Forbes, Hamalainen, and Gulnur Muradoglu, 2010) and how the process of making financial decisions affects the behaviour of the people involved (Jaiyeoba and Haron, 2016). We also believe that behavioural finance can be employed in this study to explore how decision-making by investors is influenced by complex motivational and cognitive factors, which is an area that is ignored by traditional finance theories (Misal, 2013).

Jaiyeoba and Haron (2016) explained how various behavioural finance scholars have sought to develop the study of financial behaviour by employing various theories from psychology. This study will thus use one of the theories from psychology, namely the theory of planned behaviour (TPB). The use of TPB in this study reflects the fact that it explains the motivational factors that underlie various kinds of behaviour (Ajzen, 1991). In addition, Ozmete and Hira (2011) explained that this theory can determine a person's opinion about his/her financial behaviour while also bearing in mind matters like opportunities, resources, and skills (pre-conditions) which are needed in order to engage in certain kinds of behaviour. Indeed, the robustness of the TPB in predicting human behaviour has been proved. Based on the previous research, we believe that this study will contribute empirical evidence about the market discipline of investors in Sharia mutual funds from a different perspective. The study will enrich the literature on market discipline from behavioural finance's perspective, while various studies were also explored based on traditional finance theories.

Previous research conducted by Widyastuti, Febrian, Sutisna, and Fitrijanti (2021) also explore market discipline from a behavioral perspective on civil servants in Indonesia. It was the result of the conceptual framework that described the extended model of TPB which is developed by adding two variables namely: Islamic financial literacy and financial risk tolerance (Widyastuti, Febrian, Sutisna, and Fitrijanti, 2019). Nevertheless, there is a lack of study that observes market discipline by applying TPB from an academicians' point of view.

LITERATURE REVIEW

2.1. Market Discipline in Behavioural Perspective

Most of the literature on market discipline is in the context of banking. This is due to the fact that it forms part of the banking regulations that have been proposed to minimise the risk of default. Several models have been developed to describe market discipline under the traditional finance theory. The efficient market hypothesis (EMH) gave rise to the concept of market discipline, and this was especially the case with the semi-strong form (Min, 2015), where the public information in financial statements reflected the financial condition of the bank. For this reason, the issue raised concerning market discipline is approached by testing whether there is a significant relationship between risk (for which various financial ratios are used as indicators) and fluctuations in equity and bond prices (debt). If a relationship between these two things is found, then it can be surmised that market discipline exists (Gorton & Santomero, 1990).

Many scholars have examined market discipline, including Stephanou (2010), Min (2015), Levy-Yeyati, Peria, and Schmukler (2004), Bliss and Flannery (2002), and Flannery (2001). Stephanou (2010) interprets market discipline as being a mechanism through which market participants supervise banks and discipline them for their actions when they involve taking excessive risks. Min (2015), on the other hand, explained the notion of market discipline as being a mechanism where creditors with short-term investments are able to control the banks' risk efficiently by means of actions they take in pursuit of their own interests. Both definitions emphasise the supervision of banks that engage in high-risk behaviour by market participants. Meanwhile, Levy-Yeyati *et al.* (2004) stated that there are two ways to detect the reaction of depositors to risk: first there is the quantitative approach which relates to the depositors' sensitivity to risk as seen in their withdrawal of funds they had invested in banks; secondly, there is the price approach which involves observing changes in interest rates or yields to determine the presence or absence of market discipline. In line with the opinion expressed by Levy-Yeyati

et al. (2004), two aspects of the concept of market discipline were introduced by Bliss and Flannery (2002) and Flannery (2001), namely monitoring and influencing. These studies stated that two types of market discipline could be distinguished from each other: first, there is the investors' ability to identify changes in a bank's financial condition and then monitor those changes; and second, there is the investors' ability to influence the decisions taken by the bank and therefore affect their actions. Min (2015) explained that market discipline is carried out with the aim of reducing risk, which is achieved via two main methods. Firstly, the reaction of investors to banks taking excessive risks is for them to withdraw their funds and/or demand higher returns on their investments. Secondly, by using the price changes that are caused by this market reaction as a signal, regulators can identify banks which are taking such risks as well as identify liquidity risk. The regulators will then respond to the signal by taking action to prevent the risk of default.

In reference to various prior studies, several proxies of the market's indicators have been used to indicate market discipline, including stock price changes or stock returns (Bliss and Flannery, 2002; Gropp, Vesala, and Vulpes, 2006), bond spread (Benink and Wihlborg, 2002; Morrison & Walther, 2020; Rommerskirchen, 2020), deposit growth (Calomiris & Jaremski, 2019; Hou, Gao, & Wang, 2016; Ioannidou & De Dreu, 2019), and interest expenses (Demirgüç-Kunt and Huizinga, 1999).

Based on those studies, we believe that withdrawal behaviour is a form of market discipline. This refers to Dangl, Wu, and Zechner (2006), who stated that investors in Sharia mutual funds could discipline the market to penalise fund managers who provide unsatisfactory services by withdrawing their investments. On the other hand, we also discovered a lack of studies investigating this form of market discipline from a behavioural perspective. This study conceptualises the construct of market discipline for Sharia mutual funds as withdrawal behaviour, thereby reflecting the investors' tendency to punish fund managers who take excessive risks as a result of their sensitivity to risk (Widyastuti et al., 2019).

2.2. The Factors Affecting Market Discipline Using TPB

The key to determining what factors affect the decision-making processes of individuals is gaining an understanding of the financial behaviour of individuals (East, 1993). However, studies to date have not sought to examine the psychological factors of investors or customers as the main players in Sharia mutual funds. As a result, an alternative theory emerged for exploring the role of social factors (such as psychology) in the decision-making process of investors; this is called behavioural finance (Kourtidis, Šević, and Chatzoglou, 2011). Ozmete and Hira (2011) reviewed some of the psychological, economic and sociological theories that are commonly used in behavioural finance when attempting to explain why people act as they do. Dewi, Febrian, Effendi, & Anwar (2020) stated that the TPB could be used to predict and understand financial behaviour. Thus, we propose the TPB model to explain the market discipline of investors in Sharia mutual funds.

The TPB has been proven empirically and has shown itself to be robust in predicting behaviour, including financial behaviour. Previous studies have applied the TPB to measure financial behaviour, including investment decisions (East, 1993), savings behaviour (Jamal, Ramlan, Karim, & Osman, 2015), credit card behaviour (Kennedy, 2013; Rutherford and DeVaney, 2009), debt-reducing behaviour (Xiao and Wu, 2006), and risk-taking behaviour (Xiao, Tang, Serido, and Shim, 2011).

Withdrawal behaviour reflects a kind of personal financial behaviour or a decision which is the result of a process involving many factors. With the TPB model, individual motivational factors are emphasised as being determinants of behaviour of certain types (Montano and Kasprzyk, 2015). By employing the TPB, this study explores the role of the motivational factors that influence withdrawal behaviour as a form of market discipline. In the context of the market discipline of investors in Sharia mutual funds, the withdrawal behaviour that we observed in this research also considered the conditions related to excessive risk-taking by fund managers who breach Sharia compliance.

Ajzen (1991) developed the TPB, which explains three major variables as antecedents of behavioural intentions. First, attitudes towards behaviour are defined as the beliefs and evaluations relating to the outcome of the behaviour engaged in by individuals. According to Fishbein and Ajzen (1975), the second variable, subjective norms, refers to one's perception that another person will assume someone is capable of performing a certain type of behaviour. Another person, in this sense, could be interpreted according to the context of the research and may include a friend, family member, co-worker or even a significant other. In many of the studies that are found in the literature, normative beliefs are referred to as subjective norms relating to whether a significant other will support individuals in performing certain kinds of behaviour. While the third variable, PBC, reflects beliefs about the ease or difficulty of performing a certain kind of behaviour (Ajzen, 1991; Ajzen & Madden, 1986). Schmidt (2010) defined the construct of PBC as "...beliefs regarding the access to resources and the fulfilment of the requirements needed to perform a certain behaviour covering two components: controllability (e.g. external constraints) and self-efficacy". The TPB explains that three major variables determine behavioural intentions and that it is the interaction of PBC and these behavioural intentions that affect behaviour. Intention reflects the motivational factors that influence behaviour and provides an indication of how hard someone is willing to try and realise a certain kind of behaviour (Ajzen, 1991). The stronger someone's behavioural intention is, the more likely it is that the behaviour in question will be realised.

RESEARCH METHODOLOGY

This study aims to determine the psychological and social factors influencing market discipline of investors in Sharia mutual funds, from a behavioural perspective, by employing the TPB. The unit of analysis observed in this research was investors in Sharia mutual funds. As the overall size of the population was unknown, a sample was collected using the purposive sampling technique. This sample comprised of investors who were employed as academicians and was based on the consideration that they had a high education. Klapper, Lusardi, and Oudheusden (2015) stated that people with high education tend to have a high financial literacy which is needed in financial decision making, including investment behaviour and also withdrawal behaviour. Using this sampling technique, we recruited 93 academicians in Greater Jakarta to complete the questionnaire.

The primary data obtained from the survey were measured using a 5-point Likert scale that contained the following responses: (1) strongly disagree, (2) disagree, (3) neither agree nor disagree, (4) agree and (5) strongly agree. The questionnaire for the three major variables in the TPB consisted of four items for measuring attitudes towards withdrawals, five items for the subjective norms, and five items for measuring PBC, adopted from Koropp, Kellermanns, Grichnik, and Stanley (2014), East (1993), Sivaramakrishnan, Srivastava, and Rastogi (2017)

and Pellinen, Törmäkangas, Uusitalo, and Munnukka (2015). The endogenous variable in the first model, the intention to withdraw, was measured using eight items which were adopted from Lee, Lee, and Yoo (2000), Athanassopoulos, Gounaris, and Stathakopoulos (2001) and Wu, Vassileva, and Zhao (2017). The second endogenous variable, market discipline, was reflected in eight items adopted from Soma, Primiana, Wiryono, and Febrian (2016) and developed based on regulations about Sharia compliance, with reference to Otoritas Jasa Keuangan (2017).

The data were analysed using a quantitative approach: partial least squares structural equation modelling (PLS-SEM). One of the reasons for using PLS-SEM to analyse the data was because this research employed unobserved variables and had a small sample size (Hair, Hult, Ringle, & Sarstedt, 2016). The exogenous variables' direct effect on the endogenous variables was analysed using PLS-SEM.

Based on the previous literature, this study conceptualised market discipline as a type of financial behaviour. This study also clearly defines the market discipline of investors in Sharia mutual funds as reflecting the investors' withdrawal behaviour. This study developed five hypotheses to be tested using a quantitative approach, as follows:

- H₁: there is a positive impact of the attitudes towards withdrawal on the intention to withdraw.
- H₂: there is a positive impact of the subjective norms on the intention to withdraw.
- H₃: there is a positive impact of PBC on the intention to withdraw.
- H₄: there is a positive impact of PBC on market discipline.
- H₅: there is a positive impact of the intention to withdraw on market discipline.

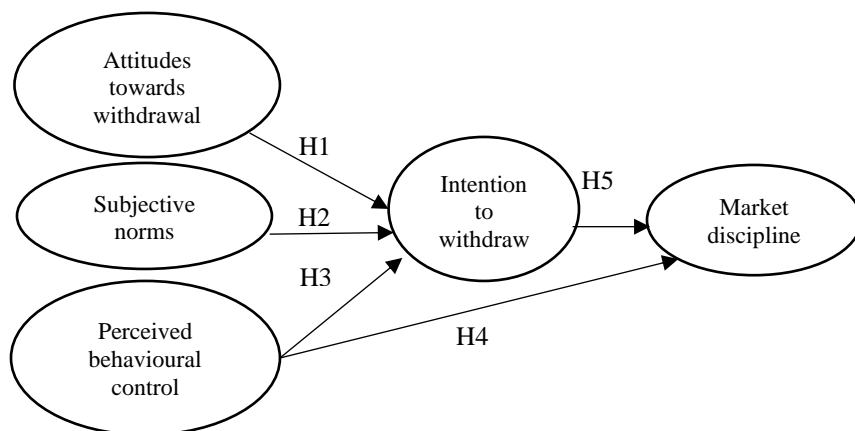


Figure 1. Theoretical Framework

RESULTS AND DISCUSSION

Table 1 displays the demographic factors used as the basis for defining the respondents' characteristics. The sample consists of 67 (72 per cent) males and 26 (28 per cent) females categorised into five age groups. The majority of the respondents (37.6 per cent) were 35 to 44 years old, while there were no respondents in the less than 18 to 24 years old age group who invested in Sharia mutual funds. The respondents were split into the following four groups based on the length of their investment: less than one year, 1 to 3 years, 3 to 5 years and more than five years.

A majority of the respondents had invested in Sharia mutual funds for 1 to 3 years. Categorising the respondents based on the size of their investment, 19 (20.4 per cent) had invested less than IDR 2 million, 38 (40.9 per cent) had investments in Sharia mutual funds of between IDR

2 to 4 million and 27 (29 per cent) had investments of IDR 4 to 6 million. Only 9 (9.7 per cent) investors were categorised in the fourth group with investments of between IDR 6 to 8 million, while no one had investments of more than IDR 8 million.

Table 1. Sample Characteristics based on Demographic Factors

Demographic Factors	Frequency	Percentage (%)
Gender:		
Male	67	72.0
Female	26	28.0
Age (years old)		
<18-24	0	0
25-34	28	30.1
35-44	35	37.6
45-54	24	25.8
>55	6	6.5
Period of investment:		
< 1 year	25	26.9
1-3 years	35	37.6
3-5 years	25	26.9
More than 5 years	8	8.6
The amount of investment:		
< IDR 2 million	19	20.4
> IDR 2-4 million	38	40.9
> IDR 4-6 million	27	29.0
> IDR 6-8 million	9	9.7
> IDR 8 million	0	0
Total	n = 93	100.0

The first step in the data’s analysis was a validity test, which was separated into convergent and discriminant validity. Hair, Hult, Ringle, and Sarstedt (2016) stated that the outer loading for each indicator is used to test the convergent validity, which reflects that one item positively correlates with another item of the same construct. When the outer loading exceeds 0.7, the indicator is deemed acceptable (Hair et al., 2016). In light of the first iteration, indicators not meeting the criteria were deleted from the outer model before a second iteration was conducted on the data. Table 2 shows the outer loading for all of the indicators, based on the second iteration.

Table 2. Validity and Reliability Test

Items	Loading
Attitudes towards withdrawal (CR = 0.882, CA = 0.823, AVE = 0.652)	
Att 1	0.779
Att 2	0.861
Att 3	0.790
Att 4	0.797
Subjective norms (CR = 0.894, CA = 0.853, AVE = 0.628)	
SN1	0.853
SN2	0.779
SN3	0.803
SN4	0.735
SN5	0.787
PBC (CR = 0.881, CA = 0.831, AVE = 0.597)	
PBC1	0.730
PBC2	0.757
PBC3	0.766
PBC4	0.777
PBC5	0.830
Intention to Withdraw (CR = 0.912, CA = AVE = 0.566)	

Items	Loading
Int1	0.715
Int2	0.722
Int3	0.776
Int4	0.764
Int5	0.760
Int6	0.767
Int7	0.773
Int8	0.737
Market Discipline (CR = 0.928, CA = 0.911, AVE = 0.616)	
MD1	0.774
MD2	0.720
MD3	0.783
MD4	0.791
MD5	0.771
MD6	0.801
MD7	0.817
MD8	0.814

Notes: CR = Composite Reliability, CA = Cronbach’s Alpha, AVE = Average Variance Extracted

The second alternative for ensuring the construct’s validity is its discriminant validity. We refer to the value of the square root of the average variance extracted (AVE) to test the discriminant validity (Hair et al., 2016). As presented in Table 3, the Fornell-Larcker criterion also suggests the square root of the AVE of each reflective construct is larger than the correlations with another construct in the model. It could be concluded that each construct in the model is different.

Table 3. Discriminant Validity

	Att	SN	PBC	Int	MD
Att	0.808				
SN	0.554	0.792			
PBC	0.349	0.377	0.773		
Int	0.502	0.663	0.551	0.752	
MD	0.199	0.408	0.615	0.540	0.785

Notes: Att = Attitude towards Withdrawal, SN = Subjective Norms, PBC = Perceived Behavioural Control, Int = Intention to Withdraw, MD = Market Discipline

The next step was to conduct a reliability test, to ensure that the questionnaire was reliable, using composite reliability and Cronbach’s alpha, as presented in Table 2. Hair *et al.* (2016) explained that composite reliability is used to test a construct’s reliability. A composite reliability value of more than 0.7 signifies that all the indicators are reliable. This study applied the same interpretation when using Cronbach’s alpha to test the construct’s reliability. Based on the results for the composite reliability and Cronbach’s alpha, the measurement of each variable was reliable.

Table 4 shows the inner model which explains the direct effect of each variable. The path coefficient can be seen and this explains each variable’s direct effect, namely: (1) the effect of attitudes towards withdrawal on the intention to withdraw, (2) the effect of the subjective norms on the intention to withdraw, (3) the effect of PBC on the intention to withdraw, (4) the effect of PBC on market discipline, and (5) the effect of the intention to withdraw on market discipline.

Based on the results presented in Table 4, the impact of attitudes towards withdrawal on the intention to withdraw is not significantly proven (path coeff. = 0.128, t-stat. = 1.279, $p > 0.05$). The study’s first hypothesis is thus rejected. Meanwhile, as hypothesised, the findings reveal there is a significant effect of the subjective norms on the intention to withdraw (path

coeff. = 0.128, t-stat. = 4.403, $p < 0.05$); therefore, the second hypothesis is accepted. It can thus be inferred that the social influence exerted by a friend or significant other may encourage someone to withdraw their investment in Sharia mutual funds.

Table 4. Hypotheses Testing and Effect Size (f^2)

	O	t-statistics	p-values	Result	f^2	t-statistics	p-values
Attitudes towards Withdrawal => Intention to Withdraw	0.128	1.279	0.101	Rejected	0.025	0.456	0.324
Subjective Norms => Intention to Withdraw	0.467	4.403	0.000	Accepted	0.322	1.810	0.035
PBC => Intention to withdraw	0.330	3.865	0.000	Accepted	0.203	1.734	0.042
PBC => Market Discipline	0.456	4.353	0.000	Accepted	0.257	1.458	0.073
Intention to Withdraw =>Market Discipline	0.289	3.002	0.001	Accepted	0.103	1.345	0.090

Notes: O = Original Sample, f^2 = effect size

The third hypothesis, which explains the positive impact of PBC on the intention to withdraw, is accepted (path coeff. = 0.330, t-stat. = 3.865, $p < 0.05$). This means that people with a higher PBC tend to have a greater intention to withdraw their investment. The fourth hypothesis stated that PBC had a positive impact on market discipline, and this is significantly proven (path coeff. = 0.456, t-stat. = 4.353, $p < 0.05$). This result is in accordance with the TPB. Testing of the fifth hypothesis also shows that it is accepted, meaning there is a significant positive impact of the intention to withdraw on market discipline (path coeff. = 0.289, t-stat. = 3.002, $p < 0.05$). From this we can conclude that investors with a greater intention to withdraw are encouraged to withdraw their investment if they have information that the fund manager has not maintained Sharia compliance.

According to Hair *et al.* (2016), when assessing a structural model, there are key criteria which are measured by the following four indicators: communality (q^2), coefficient of determination (R^2), effect size (f^2) and predictive relevance (Q^2). As represented in Table 5, the R^2 value is a reflection of the contribution the endogenous variables make to explaining the exogenous variables. Based on the results, the contribution of attitudes towards withdrawal, the subjective norms and PBC to explaining the intention to withdraw is 55.6 per cent. The second structural model, which explains market discipline, shows that the intention to withdraw and PBC make a contribution of 43.7 per cent to the market's discipline.

Table 5. Goodness of Fit Model

	q^2	R^2	Q^2
Attitudes towards Withdrawal	0.408		
Subjective Norms	0.427		
PBC	0.386		
Intention to Withdraw	0.425	0.556	0.286
Market Discipline	0.478	0.437	0.243

Notes: q^2 = communality, R^2 = coefficient of determination, Q^2 = predictive relevance

The predictive relevance (Q^2) explains the path model's predictive capability for certain endogenous variables, based on the blindfolding procedure. If Q^2 is more than zero, a possible interpretation is that the endogenous variables can be predicted by all of the exogenous variables. Referring to the value of the predictive relevance, attitudes towards withdrawal, the subjective norms and PBC are capable of predicting the intention to withdraw; while PBC and the intention to withdraw are also capable of influencing the market's discipline. Hair *et al.* (2016) stated that the relative measures of the predictive relevance (q^2) were categorised into small ($q^2 = 0.02$), medium ($q^2 = 0.15$) and large ($q^2 = 0.35$).

Another basis upon which to evaluate the goodness of fit is the effect size f^2 . Table 4 also contains the results for the effect size f^2 , which assesses the contribution made by an exogenous construct to the R^2 value of an endogenous latent variable. The f^2 values are categorised into small ($f^2 = 0.02$), medium ($f^2 = 0.15$) and large ($f^2 = 0.35$). The findings show that the highest effect size is attained from the influence of the subjective norms on intention. The impact of the subjective norms and PBC on market discipline is categorised as a medium effect.

According to the TPB, the three major variables that determine behavioural intentions are attitudes towards behaviour, the subjective norms and PBC, while certain prior studies have proved that these variables significantly influence behavioural intentions (Alleyne & Broome, 2011; East, 1993; Kennedy, 2013; Schmidt, 2010). On the other hand, this study has shown that attitudes towards withdrawal have an insignificant effect on the intention to withdraw. We may interpret from this that the academicians, as Sharia mutual funds investors, form a negative evaluation of the outcome of the withdrawal behaviour. They do not perceive the withdrawal behaviour to be either a good idea, beneficial, wise or a very important decision. In our case, we argue that the market discipline of investors in Sharia mutual funds has a negative meaning, as it acts as a punishment for a fund manager who fails to maintain Sharia compliance when managing the investors' funds. Therefore, attitudes towards withdrawal did not impact positively on the intention to withdraw the investment in Sharia mutual funds. This result is supported by Mahastanti and Hariady (2014), who found that the attitude towards behaviour did not influence the investment intention; however, the finding was not consistent with the TPB (Ajzen, 1991). This hypothesis was also proven in various prior studies, which found that attitudes towards behaviour had a positive influence on the intention to invest (Ali, Zani, and Kasim, 2014) or investment intentions (Sondary and Sudarsono, 2015), the intention to behave (Abduh, Duasa, and Omar, 2011) and the intention to remain in debt management (Xiao and Wu, 2006). Shahrabani (2012) found that the more positive someone's financial attitude was, the greater their intention was of managing their budget without resorting to debt. These studies indicated that attitudes towards behaviour had a positive influence on investment intentions.

The two major variables of the TPB in this model are able to prove the robustness of the TPB in predicting behavioural intentions. This finding tells us that the subjective norms and PBC determine the intention to withdraw investments from Sharia mutual funds. The positive impact of the subjective norms on the intention to withdraw from Sharia mutual funds is consistent with the

results of several studies (Alleyne and Broome, 2011; East, 1993; Kennedy, 2013). It means that friends and significant others play an important role in influencing investors' intentions to withdraw their investments in Sharia mutual funds when the fund managers are seen to take excessive risks by offering products and services that do not comply with Sharia's principles. PBC positively affects the intention to withdraw investments from Sharia mutual funds. Investors with a higher PBC will tend to have a higher intention to withdraw their investments from Sharia mutual funds. This higher PBC indicates that the academicians feel more confident and have complete control over when to withdraw their investments from Sharia mutual funds. On the other hand, they do not feel that the procedures involved, or the time and expense, act as external barriers when they want to withdraw their investments. This result is supported by Schmidt (2010), who focused on investment intentions in mutual funds. It was also proven by Mahastanti and Hariady (2014), who revealed that women feel more confident that they have enough opportunities and knowledge to invest in financial products, thus giving them a higher intention to invest.

The second model of this study seeks to explain the antecedent of withdrawal behaviour as a form of market discipline for Sharia mutual funds. The result shows that PBC has a positive and significant effect on market discipline, which is supported by scholars who have observed various aspects of financial behaviour (East, 1993; Magendans, Gutteling, and Zebel, 2017; Xiao and Wu, 2006). Hrubes, Ajzen, and Daigle (2001) and Rutherford and DeVaney (2009) proved that PBC directly influenced certain kinds of behaviour. Xiao and Wu (2006), meanwhile, found that PBC had a positive effect on remaining as a client for debt management planning. Magendans, Gutteling, and Zebel (2017) showed that financial self-efficacy had a positive influence on savings behaviour. A higher level of PBC will thus encourage people to adopt better savings behaviour; the easier it feels, the greater is the possibility of the behaviour being realised. The findings show that the academicians feel confident, have complete control and face no obstacles in realising their withdrawal behaviour, as a form of market discipline. Withdrawal behaviour occurs, in respect of investments in Sharia mutual funds, when fund managers take excessive risks by offering products that are non-halal and contain elements of *gharar* (uncertainty) and *riba* (interest). Along with PBC, another variable that contributes to explaining market discipline is the intention to withdraw investments from Sharia mutual funds. The construct of the intention to withdraw has been developed by some scholars based on behavioural intentions; thus, an intention to withdraw in this study is formulated to be an antecedent of withdrawal behaviour as a type of market discipline. According to the TPB, a behavioural intention has the ability to influence certain types of behaviour (Ajzen, 1991). As hypothesised, an individual with a greater intention to withdraw will tend to redeem their investment in Sharia mutual funds. This result supports the findings reported by Abduh (2014) and Xiao, Tang, Serido, and Shim (2011). Previous studies also have proved that intention behaviour has a direct influence on the behaviour in question. East (1993) showed that investment intentions have a positive influence on investment decisions. Several studies have found a significant influence of behavioural intention on financial behaviour, including continuing to use debt management planning (Xiao & Wu, 2006), and risky credit behaviour (Xiao et al., 2011). Based on these studies, it could be interpreted that a greater behavioural intention will encourage an individual to perform the behaviour. Meanwhile, Abduh (2014) found that the intention to avoid bank interest had a significant influence on withdrawal behaviour in Islamic banks. In this case, an individual who has a greater intention tries to avoid interest-based financial products. Therefore, when Islamic banks breach Islamic principles, the intention to avoid interest will increase and thus the withdrawal behaviour will also tend to increase.

Based on the data's analysis, we compared the contribution of the endogenous variables in the first model and determined the subjective norms to be the most important factor in predicting the intention to withdraw from Sharia mutual funds; while in the second model PBC made a larger contribution than the intention to withdraw in determining the market discipline of investors in Sharia mutual funds.

CONCLUSION

This study developed a model to determine market discipline by employing the TPB as one of the psychological theories that can be applied as part of a behavioural approach to finance. The results show that the subjective norms and PBC have a positive and significant influence on the intention to withdraw from an investment in Sharia mutual funds. The findings also show that the intention to withdraw and PBC have a positive effect on market discipline. However, attitudes towards withdrawal were not proven to influence the intention to withdraw investments in Sharia mutual funds, which is contrary to the TPB. As a limitation of this study, it did not include any other psychological and social factors that may also have contributed to determining market discipline from a behavioural finance point of view. This therefore leaves additional variables to explore as part of future research.

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