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PRODUCT INNOVATION AND BUSINESS SURVIVAL AMONG ZAKAT ENTREPRENEURS: A QUALITATIVE COST-BENEFIT ANALYSIS

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Abstract

Product innovation is an important strategy for microentrepreneurs operating with limited resources, but its value depends on whether the benefits generated outweigh the costs incurred. In the context of zakat entrepreneurs, innovation is often practical, low-cost, and survival-oriented rather than technology-intensive. Therefore, this study aims to analyse the costs and benefits of product innovation among zakat entrepreneurs and examine its implications for business survival. This study employed a qualitative multiple-case study approach involving eight zakat entrepreneurs who received entrepreneurial assistance under the i-TEKAD under Lembaga Zakat Negeri Kedah (LZNK) programme. Data were collected through semi-structured in-depth interviews and analysed using thematic and narrative analysis. The analysis is based on qualitative cost–benefit analysis and frugal innovation perspectives. The findings show that frugal product innovation among zakat entrepreneurs can be grouped into three types namely as simple and affordable new products, improvement or adaptation of existing products, and product diversification based on existing resources. These innovations generated clear economic benefits, including new sales opportunities, increased product value, faster cash flow, repeat purchases, multiple income streams, and stronger business continuity. However, they were also accompanied by significant costs, such as higher raw material and equipment expenses, labour and time burdens, operational risk, product wastage, delayed capital recovery, and more complex management responsibilities. The cost–benefit analysis indicates that the benefits were more evident in terms of cash flow stability, customer loyalty, income diversification, and business continuity than in large profit increases. Thus, product innovation functions more strongly as a resilience and survival mechanism than as a short-term profit maximisation strategy. The study implies that support programmes should strengthen costing skills, product development, marketing capability, operational management, and risk-reduction mechanisms to ensure sustainable innovation benefits.

Keywords: product innovation, cost-benefit analysis, entrepreneurs, business sustainability

INTRODUCTION

Product innovation is widely recognised as one of the key drivers of firm competitiveness and performance, particularly among small and medium-sized enterprises. In increasingly competitive markets, firms can no longer depend solely on existing products without improvement, as customers are often presented with many alternatives that are similar in function, price, and presentation. Product innovation therefore becomes a strategic necessity for maintaining business

relevance, creating added value, and differentiating products from competitors. Previous studies consistently show that innovation capability is positively associated with product development, market position, marketing performance, and business returns (Julienti Abu Bakar & Ahmad, 2010; O'Cass & Carlson, 2012; Oura et al., 2016; Saunila, 2020). In the context of zakat entrepreneurs, the need for product innovation is even more pressing because most of them operate on a micro scale with limited resources, including capital, equipment, labour, and market access. As a result, the ability to improve products, introduce new variations, shift product focus, or enhance packaging and sales models can become a critical factor in determining whether a business is able to grow or at least sustain its operations.

More broadly, product innovation can help small entrepreneurs improve the quality of their offerings, build customer confidence, and reduce dependence on a single product or one main source of income (Oura et al., 2016; Zhang & Hartley, 2018). However, innovation among zakat entrepreneurs does not necessarily take the form of complex technological breakthroughs or large-scale investments. Instead, their innovations are more often practical and incremental, such as adding product variations, adapting packaging, improving production methods, or modifying sales models according to operational capacity and customer needs. These patterns of change can be linked to the concept of frugal innovation, which emphasises the development of affordable, functional, and practical solutions under conditions of severe resource constraint (Hossain, 2018, 2020). From this perspective, frugal innovation does not prioritise technological sophistication, but rather the efficient use of limited resources to create products that are sufficiently useful, valuable, and relevant to underserved or cost-sensitive markets (Hossain, 2020; Dabić et al., 2022). This makes product innovation among zakat entrepreneurs not merely a marketing strategy, but also a form of economic adaptation that supports business survival and continuity.

Small entrepreneurs, including zakat entrepreneurs, usually operate in highly competitive markets with products that are very similar to one another. This situation is particularly evident in food businesses, snacks, traditional cakes, tailoring, small crafts, and home-based enterprises. When the products offered are similar in terms of function, taste, packaging, and price, customers find it difficult to distinguish one product from another. In such circumstances, competition tends to focus on price, and this creates strong pressure on small entrepreneurs because they must compete in the same market without enjoying the cost advantages or economies of scale available to larger firms (Rajapathirana & Hui, 2018; Saunila, 2020). This price competition creates a serious problem for the ability of small entrepreneurs to generate sustainable profit. In order to attract customers, entrepreneurs are often forced to maintain low prices or match market prices even when their actual production costs may be higher. As a result, sales may still occur, but profit margins become too small and unstable. In some cases, continuous price competition may cause businesses to operate close to the cost, making it difficult for entrepreneurs to expand, improve products, or face rising operating costs. This indicates that without clear product differentiation, zakat entrepreneurs not only face difficulty in building market advantage, but are also exposed to a higher risk of failing to sustain their businesses in the long run.

In this context, product innovation is often seen as one possible solution. However, product innovation is not a cost-free process. In microenterprises, the cost of innovation involves not only raw materials, packaging, equipment, transportation, and labour, but also time, effort, experimentation risk, and additional operational burden. At the same time, the benefits of innovation may appear in the form of increased product value, higher sales, better use of resources, stronger performance, and improved opportunities to sustain the business over a longer period.

Therefore, the key question is not merely whether product innovation is implemented, but whether the benefits of innovation truly outweigh the costs borne by zakat entrepreneurs (Rezapouraghdam et al., 2018; Kramer & Timu, 2023). Based on this situation, there remains an important gap in knowledge regarding how product innovation affects zakat entrepreneurs in terms of profitability and business continuity simultaneously. Many studies discuss the general relationship between innovation and firm performance, but there is still limited research

specifically examining the balance between the costs and benefits of innovation in the context of zakat entrepreneurs operating with limited resources. Accordingly, this study focuses on the cost–benefit analysis of product innovation to assess the extent to which innovation truly contributes to strengthening the profitability and business continuity of zakat entrepreneurs.

LITERATURE REVIEW

Innovation can be defined as the ability to transform existing ideas and knowledge into something new. Product, service, process, and marketing innovation are all capable of creating value for business firms. Being innovative is important for firms to maintain their market position and strengthen performance. However, becoming innovative is difficult and involves various challenges, especially for small and medium-sized enterprises (SMEs) (Chong et al., 2019; Edeh et al., 2020; Hanaysha et al., 2022; Khusna Mustafa et al., 2018; Rajapathirana & Hui, 2018; Saunila, 2020; Sumiati, 2020a, 2020b). According to Torres et al. (2015), among the major challenges hindering innovation activities in SMEs are the lack of investment and human resources in research and development, which need to be addressed in order to improve business performance. This indicates that innovation is a key factor in enhancing the competitiveness of a firm. The increasingly uncertain and constantly changing market environment and business competition require firms to innovate continuously in order to sustain and strengthen competitiveness.

Higgins (1995) stated that competitiveness can be enhanced through innovation. Hogan and Coote (2014) defined innovation as one of the efforts undertaken by firms to improve performance. Innovation may be driven by changes in both the internal and external environments of the firm, which subsequently provide opportunities for firms to create new procedures or more systematic processes to improve overall performance. Innovation can be categorised into several forms, such as product innovation (Julienti Abu Bakar & Ahmad, 2010; Zhang & Duan, 2010), process innovation (Chong et al., 2019; Khusna Mustafa et al., 2018; Sumiati, 2020a), and marketing innovation (Zhang & Duan, 2010; Murat Ar & Baki, 2011).

According to O'Cass and Carlson (2012), Oura et al. (2016), and Zhang and Hartley (2018), there is a positive relationship between innovation capability and firm business performance. Innovation capability is able to improve performance through the development of new products (Zhang & Hartley, 2018), the creation of new brands (Odoom & Mensah, 2018), enhancement of brand image (Expósito & Sanchis-Llopis, 2019), and improvement in marketing performance (Dadfar et al., 2013). Furthermore, innovation capability contributes to operational performance (Kafetzopoulos & Psomas, 2015), increases business returns (Maldonado-Guzmán et al., 2018), and ultimately strengthens firm competitiveness (Expósito & Sanchis-Llopis, 2019).

Organisational innovation, including product innovation, is also believed to stimulate marketing innovation within SMEs, which subsequently has a positive effect on market position and business performance (Ozkaya et al., 2015; Bodlaj et al., 2018). In this regard, besides product innovation, marketing innovation has also been identified as one of the main determinants contributing to increased competitiveness (Cruz-Ros et al., 2017). It is considered a fundamental factor in evaluating firm success (Tan & Sousa, 2015). In addition, marketing innovation enables firms to create products that are new and different from existing products, while also developing strong brands that are difficult for competitors to imitate (Murray et al., 2011).

Therefore, for microenterprises, product innovation usually does not occur in the form of large-scale breakthroughs. Rather, it is more likely to emerge through practical steps such as improving existing products, introducing new variations, improving packaging, and changing sales approaches with limited resources. This pattern is highly consistent with the logic of frugal innovation. Hossain (2018) describes frugal innovation as a process shaped by resource constraints, affordability requirements, and the need to create value with fewer inputs. His later work further explains that frugal innovation develops through practical entrepreneurial responses that are capable of producing commercially viable outcomes in low-resource contexts (Hossain, 2020).

Therefore, frugal innovation enables firms to create affordable and functional products while maximising the use of limited resources (Dabić et al., 2022; Hossain, 2020). Empirical evidence further shows that frugal innovation contributes positively to firm performance, resilience, sustainability, and competitiveness, particularly among SMEs operating in uncertain business environments (Rehman et al., 2024; Dost et al., 2024). Recent reviews also highlight that frugal innovation has evolved beyond a cost-saving strategy and is increasingly recognised as a mechanism for long-term business sustainability and value creation (Escudero-Cipriani & García-del Junco, 2024; Kusumawardhany et al., 2025).

This perspective is highly relevant to zakat entrepreneurs because they typically operate under limited financial, material, and organisational capacity. Their innovation activities are therefore more likely to involve practical adaptation than radical transformation. In this sense, zakat entrepreneurs may be viewed as engaging in frugal innovation when they modify products and business practices to meet customer needs without relying on high technology or large capital investment. A broader multidisciplinary review also confirms that frugal innovation commonly emphasises doing more with fewer resources, while focusing on practicality, affordability, strategy, and sustainability (Dabić et al., 2022).

From the perspective of economic evaluation, cost–benefit analysis provides an important framework for assessing whether innovation is truly worthwhile. It enables the benefits and costs of innovation to be examined systematically, not only in terms of financial return but also in relation to broader implications for welfare and sustainability. Rezapouraghdam et al. (2018) demonstrate that qualitative cost–benefit analysis can be used to examine the benefits and costs of an economic phenomenon based on the lived experiences of actors directly involved in it. This is especially useful in small business contexts, where the effects of innovation are often embedded in everyday practices and cannot always be fully captured through numerical indicators alone.

Recent literature also suggests that conventional cost–benefit analysis focusing only on income changes or cash flow may be insufficient, particularly for innovations intended to strengthen resilience and continuity. Kramer and Timu (2023) argue that cost–benefit analysis should move beyond net present value and include non-monetary outcomes such as risk reduction, changes in labour time, workload, and well-being. In the context of zakat entrepreneurs, this argument is especially relevant because the real value of product innovation may not lie only in increased profit, but also in the ability of innovation to help the business survive under challenging conditions.

Overall, the literature suggests that product innovation has strong potential to help small entrepreneurs improve business performance and resilience. At the same time, the literature also indicates that innovation under severe resource constraints is best understood through the lens of frugal innovation, where practicality, affordability, and efficient resource use are scarce. Nevertheless, there remains a limited explanation of how product innovation affects zakat entrepreneurs in terms of both profitability and business continuity. Therefore, this study focuses on the cost–benefit analysis of product innovation to assess the extent to which innovation contributes to strengthening the profitability and business continuity of zakat entrepreneurs.

RESEARCH METHODS

Research design

This study applies a qualitative approach with a multiple-case study design. This approach was selected because the study aims to develop an in-depth understanding of how product innovation is implemented by zakat entrepreneurs, what costs are incurred, what benefits are obtained, and how both influence profitability and business continuity.

Population and respondent selection

The study population consists of zakat entrepreneurs who received entrepreneurial assistance under the i-TEKAD programme through the Kedah Zakat Board (Lembaga Zakat Negeri Kedah, LZNK). Based on Table 1, respondents were selected through purposive sampling because the study required participants who clearly met specific criteria, such as still being actively involved in business, having received entrepreneurial assistance, and having implemented at least one form of product innovation.

Table 1. Respondent selection criteria

Selection criteria	Description
Assistance status	Recipient of i-TEKAD entrepreneurial assistance / LZNK entrepreneurial assistance
Business status	Still actively operating the business
Innovation characteristic	Has implemented at least one form of product innovation
Data suitability	Willing to share experiences related to the costs, benefits, challenges, and outcomes of innovation

Based on this screening process, eight (8) entrepreneurs were selected as the main cases for the study. This selection also took into consideration the diversity of business types so that the analysis could reflect variations in the forms of product innovation among zakat entrepreneurs.

Unit of analysis

The unit of analysis in this study is the individual business of each zakat entrepreneur. This means that the study's focus is not merely on the entrepreneur's personal background, but on how each business implements product innovation, incurs costs, derives benefits, and adapts its operations to survive in the market.

Data collection method

Data were collected through semi-structured in-depth interviews. This method was chosen because it allows the researcher to explore the entrepreneurs' experiences in a more flexible manner while still remaining within a clear framework of research questions. In general, the interviews focused on business background, forms of product innovation, associated costs, benefits, and the impact of innovation on profitability and business continuity.

Table 2. Main interview components

Interview component	Main content
Business background	Type of product, length of time in business, source of assistance
Form of product innovation	New product, flavour variation, packaging, sales model
Cost of product innovation	Raw materials, equipment, packaging, time, labour, risk
Benefits of product innovation	Sales, customers, income, survival, business expansion

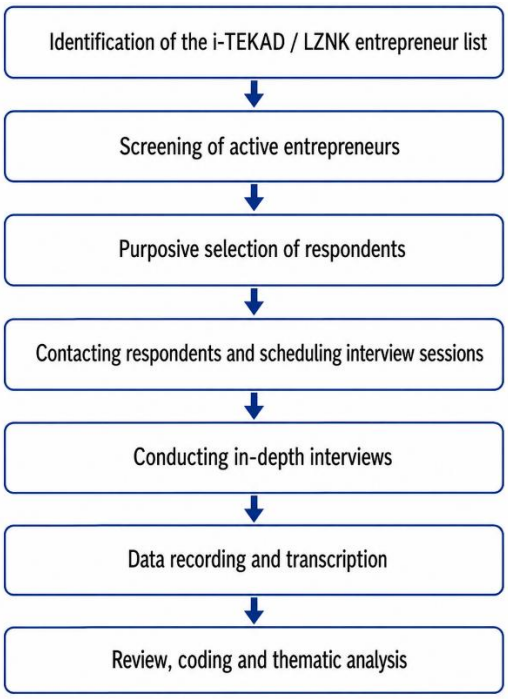


Figure 1. Data collection and analysis procedure

Figure 1 shows the main stages of data collection and analysis in this study. It begins with the identification of the i-TEKAD under LZNK entrepreneur list, followed by the screening of active entrepreneurs and the purposive selection of respondents. Next, respondents were contacted, and interview sessions were arranged. The study then proceeded with in-depth interviews, followed by data recording and transcription. Finally, the collected data were reviewed, coded, and analysed thematically to identify the key patterns and findings of the study.

Analytical framework

The analysis of this study is guided by two key perspectives, namely qualitative cost–benefit analysis and frugal innovation. The qualitative cost–benefit analysis perspective is used to evaluate whether product innovation produces benefits that exceed the costs incurred, considering not only financial returns but also non-monetary aspects such as time, labour, effort, and operational challenges. Meanwhile, the frugal innovation perspective is relevant because the innovations introduced by zakat entrepreneurs are often developed under resource-constrained conditions. These innovations are typically practical, affordable, and solution-oriented, relying largely on the availability of resources to improve business performance and sustainability. Table 3 presents the analytical framework of the study, which links the main analytical dimensions with the focus of evaluation. The framework shows that product innovation is examined based on the form of innovation implemented by the entrepreneurs. The cost dimension focuses on the resources and burdens involved in innovation activities, including raw materials, packaging, machines, transportation, labour, time, energy, risk, and operational burden. The benefit dimension evaluates the positive outcomes of innovation, such as sales, customers, cash flow, income, and customer confidence. Finally, the impact dimension assesses how product innovation contributes to profitability and business continuity among zakat entrepreneurs.

Table 3.Analytical framework of the study

Analytical dimension	**Evaluation focus**
Form of product innovation	What form of innovation is implemented

Economic costs	Raw materials, packaging, machines, transportation, labour, time, energy, risk, and operational burden
Economic benefits	Sales, customers, cash flow, income, customer confidence
Impact	Impact on profitability and business continuity

Data analysis method

The data were analysed using thematic analysis supported by narrative analysis. Thematic analysis was used to identify the main recurring themes across the interviews, while narrative analysis was used to understand the flow of each entrepreneur's experience, particularly how they moved from one type of product to another form of innovation.

Overall, this study employs a qualitative multiple-case study approach involving zakat entrepreneurs who received i-TEKAD / LZNK assistance in Kedah. Data were collected through in-depth interviews and analysed using thematic and narrative analysis. The analytical framework was guided by the lenses of qualitative cost–benefit analysis and frugal innovation in order to assess how product innovation influences the profitability and business continuity of zakat entrepreneurs

RESULTS AND DISCUSSION

This section presents the findings of the study based on in-depth interviews with eight zakat entrepreneurs who received entrepreneurial assistance under the i-TEKAD programme and the Kedah Zakat Board (Lembaga Zakat Negeri Kedah). The analysis was conducted thematically, focusing on product innovation, innovation-related costs and benefits, and the implications for profitability and business continuity. The findings are organised into four main areas: entrepreneur profiles, evidence of frugal innovation, costs and benefits of innovation, and the role of product innovation in supporting income generation and business survival among zakat entrepreneurs.

Entrepreneur case profiles and types of innovation

Respondent Profile

The respondents represented a range of microenterprise activities, including food-based products, snacks, tailoring, craft-based products, and home-based production. This variation provides a useful basis for examining different forms of product innovation undertaken within resource-constrained business settings. To ensure confidentiality, the respondents were anonymised and labelled as Entrepreneur 1 to Entrepreneur 8. The profiles of the respondents are presented in Table 4.

Table 4. Profile of respondents

Respondent	Type of business	Main product
Entrepreneur 1	Food and snack business	Popcorn and crispy burger
Entrepreneur 2	Craft and customised product business	Wood carving, acrylic products and laser-based products
Entrepreneur 3	Food-based business	Pickles, fermented fish, bulk pickling gravy, seasonal cakes
Entrepreneur 4	Frozen food and traditional food business	Frozen curry puff, ketupat and kerisik

Entrepreneur 5	Ready-to-eat food business	Food products after shifting from cosmetics and skin care
Entrepreneur 6	Mixed home-based business	Tailoring, muruku, bahulu, roast chicken and other products
Entrepreneur 7	Snack and food business	Banana chips, batang buruk, kuih koci, popia Nestum and burger
Entrepreneur 8	Snack business	Rempeyek

As shown in Table 4, the respondents were involved in diverse microenterprise activities and demonstrated different approaches to product innovation. Some entrepreneurs introduced new products, while others improved existing products, diversified their product range, or shifted towards products that were more practical and marketable. These profiles indicate that product innovation among zakat entrepreneurs is generally small-scale, practical, and closely linked to income generation and business continuity.

Product innovations

All eight respondents demonstrated different forms of product innovation. These innovations were closely associated with their efforts to respond to actual market demand and operational constraints. Some entrepreneurs introduced new products, while others added flavour variations, shifted towards more practical products, or adjusted their sales models to minimise the risk of tied-up capital. In this context, the innovations undertaken by the respondents can be linked to the concept of frugal innovation, as they did not require substantial technological investment. Instead, these innovations emerged from the entrepreneurs' ability to use limited resources more efficiently in order to create value for customers. Thus, the innovations undertaken by the entrepreneurs were practical, based on limited available resources, and closely linked to business survival, reflecting the key features of frugal innovation in microenterprise settings.

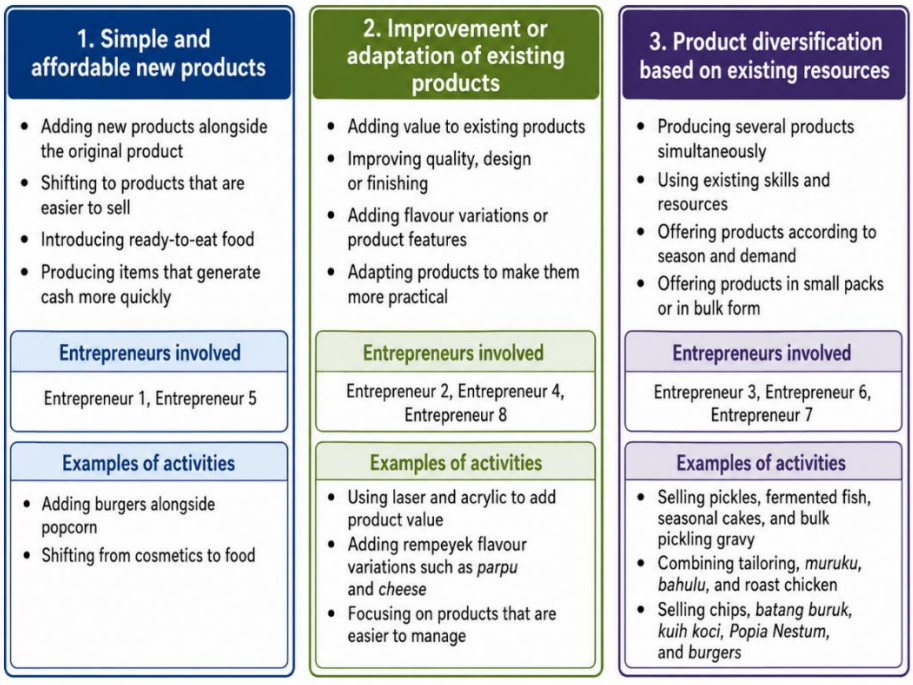


Figure 2. Product innovation according to *frugal innovation*

Based on Hossain (2020), product innovation in resource-constrained businesses can be understood as a practical and affordable response to market needs rather than a technology-intensive change. As illustrated in Figure 2, product innovation among zakat entrepreneurs can be classified into three main forms.

The first form is the introduction of simple and affordable new products. This refers to the development of new products that are easier to sell, require relatively limited resources, and are able to generate cash flow more quickly. This form of innovation is evident when entrepreneurs add new products to complement their existing offerings or shift towards products that are more aligned with immediate market demand. The emphasis is therefore placed on practicality, affordability, and responsiveness to customers rather than product sophistication.

The second form is the improvement or adaptation of existing products. This involves efforts to enhance the value of products already offered by the entrepreneurs without requiring major changes to the overall business structure. Such improvements may include better product quality, more attractive design, enhanced product presentation through packaging and labelling, flavour variations, and changes in product size or selling form, such as small packs, bulk packs, ready-to-eat packs, or frozen packs, to improve production and marketing efficiency. In this form, innovation occurs through refinement and adjustment, indicating that entrepreneurs can strengthen their competitiveness by improving existing products rather than developing entirely new ventures.

The third form is product diversification based on existing resources. This occurs when entrepreneurs produce several types of products by building on their existing skills, materials, experience, and ability to produce within their available resources. This form of innovation is particularly important in microenterprise settings because it enables entrepreneurs to reduce dependence on a single product, respond to changing demand, such as festive food orders or customer preferences for new flavours and product sizes, and create multiple income streams without requiring substantial additional financial resources.

Overall, the figure indicates that product innovation among zakat entrepreneurs is generally small-scale, feasible, and based on available resources. Rather than engaging in large-scale or technology-intensive product development, these entrepreneurs introduce modest but purposeful changes that suit their limited financial resources and operational constraints. This pattern is consistent with Hossain's (2020) concept of frugal innovation, where entrepreneurs develop products that are functional, affordable, and responsive to customer needs while making effective use of limited resources. In this regard, Figure 2 shows that product innovation among zakat entrepreneurs is not merely about creating new products, but also about improving and adjusting existing products to enhance business continuity, flexibility, and long-term resilience.

Economic Benefits and Economic Costs of Product Innovation

This subsection discusses the economic benefits and costs associated with product innovation among zakat entrepreneurs. Figure 3 shows that product innovation generates both positive outcomes and additional burdens for the entrepreneurs. In terms of cost, innovation may increase expenditure on raw materials and equipment, require more time and labour, create operational risks, and add complexity to business management. Meanwhile, the benefits of innovation include new sales opportunities, increased product value, diversified income sources, and improved cash flow. This reflects the qualitative cost–benefit approach used by Rezapouraghdam et al. (2018), in which costs and benefits are understood as occurring simultaneously in the entrepreneurial process.

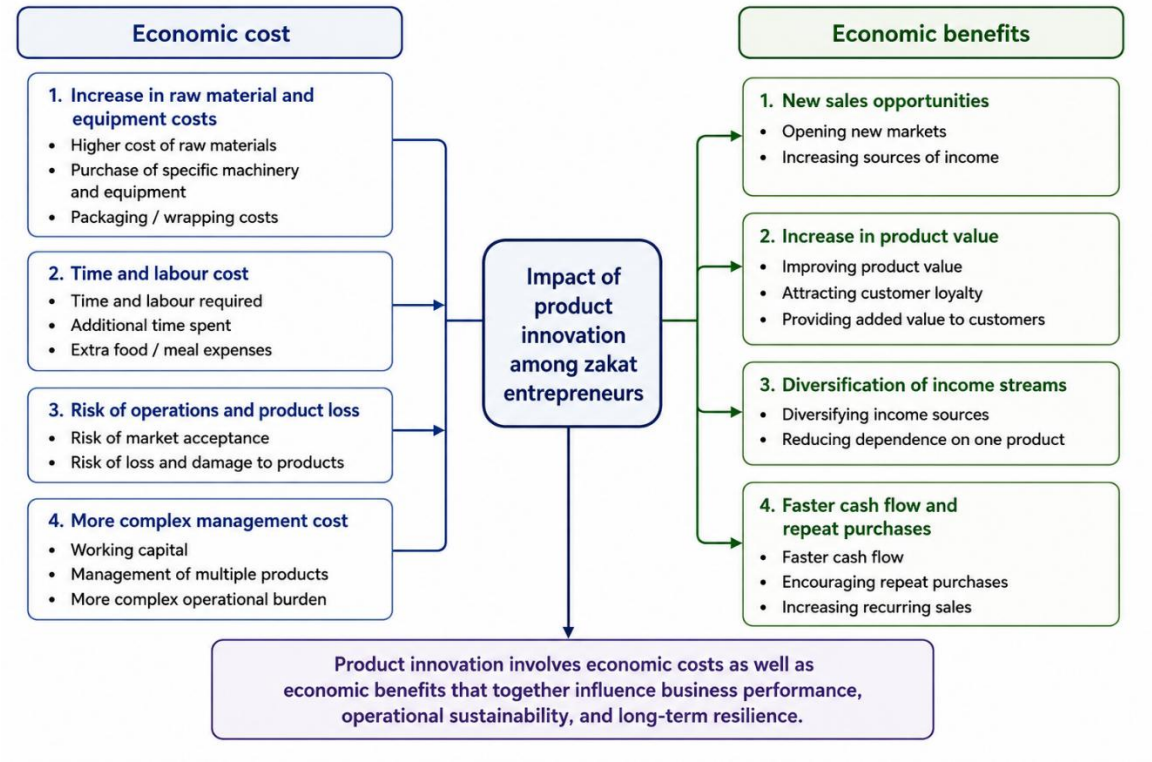


Figure 3. Cost and benefit product innovation framework

Economic costs

i. Increased raw material and equipment costs

One of the most significant costs identified by the respondents was the increase in raw material and equipment expenses. Entrepreneur 8 highlighted the burden of rising input prices, stating, *"We have to use bottled cooking oil, and the price of bottled oil has increased threefold".* She also explained that although a machine could increase production output, the cost of purchasing such equipment was high. This indicates that even when products have strong market demand, rising input costs can still place pressure on business operations. A similar issue was observed in the case of Entrepreneur 2, who faced equipment-related costs in improving product quality. He stated, *"The machine costs around RM8,000, and delivery expenses have also risen, from around RM30 in the past to RM70"*. This indicates that improving product quality requires substantial financial commitment. For Entrepreneur 3, the cost structure was also explicit. She stated, *"For one pot of pickles, the capital is about RM450, including wages. For fermented fish, the starting capital is high because the cost of fish is already expensive."* This shows that product diversification and bulk production may generate income, but require substantial working capital to cover raw materials, wages, and production expenses.

ii. Time and labour burden

Another important cost associated with product innovation is the burden of time and labour. The respondents frequently described innovation as a process that was not only financially demanding but also physically and mentally challenging. Entrepreneur 5, for example, highlighted the labour-intensive nature of her business, explaining that most of the tasks were carried out independently. As she stated, *"I do it alone… otherwise, I simply would not have enough time."* This indicates that product innovation imposed not only financial costs, but also substantial time and labour costs, as the entrepreneur had to manage production largely by herself.

Also described the challenge of balancing business activities with household responsibilities. She explained, *"Managing time properly is essential. I have to manage household chores and also*

production." She described starting domestic work early in the morning and then continuing product preparation once household responsibilities were completed. She further described how her daily routine began with domestic work early in the morning before continuing with product preparation. This indicates that the labour burden of innovation extends beyond business operations, as it is closely connected to the entrepreneur's overall daily responsibilities. Similarly, Entrepreneur 8 emphasised the labour intensity of manual production. She explained, "We do not use machines. We use our hands," and added that, "One production cycle takes nearly two hours." During periods of high demand, production had to begin earlier because the process was still fully manual. This shows that while product innovation may increase sales opportunities, it can also intensify labour pressure when production continues to depend heavily on hand-made processes.

iii. Operational risk and product loss

In addition to the costs discussed earlier, product innovation also involved operational risks and potential product losses. Although innovation can create new business opportunities, it may also involve uncertainty, unstable returns, and additional pressure on business operations. In this study, operational risk appeared in several forms, including unstable market demand, delayed capital recovery, dependence on consignment arrangements, unsold products, production wastage, and limited production capacity due to manual processes. These risks indicate that product innovation does not necessarily lead to stable returns, as entrepreneurs must also manage weak sales, delayed payments, inefficient production, and possible financial losses. For Entrepreneur 1, the main risk was related to unstable and seasonal demand. He explained, *"Popcorn sells well during the wedding season, but when the season is over, it becomes difficult to sell." This shows that products connected to specific occasions may face lower demand outside peak periods.*

For Entrepreneur 4, the risk was reflected in delayed returns and unsold products under the consignment system. She stated*, "When the products placed in frozen food shops on consignment remained unsold, we could not recover our working capital quickly." Entrepreneur 5 experienced risk through delayed payment and difficulty recovering sales revenue. She* explained*, "Previously, I sold cosmetics and skin care products, but many customers owed me money, and it was difficult to collect the payment. Because of that, I shifted to the food business."* This indicates that innovation may also involve shifting to products that provide faster and more reliable cash returns. For Entrepreneur 8, operational risk was linked to manual production and limited capacity to meet demand. She stated*, "We do not use machines; everything is done by hand, and one production cycle takes nearly two hours."* This shows that although demand may increase, production constraints can limit the entrepreneur's ability to expand output efficiently. Overall, the findings indicate that product innovation provides zakat entrepreneurs with new business opportunities, but also exposes them to several operational challenges, including uncertain demand, delayed cash recovery, unsold products, and limited production capacity.

iv. More complex management cost burden

Another important cost associated with product innovation is the increasing burden of business management. The findings show that innovation can make microenterprises more difficult to manage, particularly when entrepreneurs move beyond a single product and begin improving, modifying, or diversifying their offerings. As their product range expands, entrepreneurs must manage more complex production processes, customer orders, pricing, stock, sales channels, and daily operations. In microenterprise settings, these responsibilities are often carried out by the entrepreneurs themselves. Therefore, innovation is not only a production-related activity, but also a coordination and management challenge.

This burden is clearly reflected in the experience of Entrepreneur 3. She explained that running the business required careful coordination between household responsibilities, cooking, product preparation, and customer orders. As she stated, "*Managing time properly is important. I*

have to manage household chores, cooking, and production." Her business had also expanded to include different product forms, such as small packaged products and bulk pickling gravy, which increased the need for planning and monitoring. This suggests that product diversification may create more income opportunities, but it also increases management complexity because several activities must be handled simultaneously. Entrepreneur 2 also associated management complexity with the need to maintain product quality. He explained, *"We have to maintain our quality. If the product is made too simply, it does not look attractive, and people will not buy it."* This indicates that innovation in his business was not only about producing improved products, but also about ensuring that each stage of production met customer expectations. As a result, the management burden increased because better products required closer attention to materials, production methods, product presentation, and delivery.

The case of Entrepreneur 4 further illustrates this issue. Her earlier business experience showed that rapid expansion without proper costing and supervision could create serious problems. She stated, *"At that time, we did not really know how to calculate the costs properly."* She later realised that the business had expanded too quickly. This indicates that product innovation and business expansion may be difficult to sustain when management systems are weak. In such cases, the challenge is not only to produce and sell the product, but also to supervise workers, monitor production, control costs, and ensure that sales revenue is recovered on time.

Overall, product innovation increases the management responsibilities placed on zakat entrepreneurs. When products are improved, diversified, or sold through different channels, entrepreneurs are required to coordinate more tasks, make more business decisions, and monitor operations more closely. Although innovation can create valuable business opportunities, it also requires stronger planning, better costing, closer supervision, and more disciplined time management. For microentrepreneurs with limited labour and support, this management burden represents an important economic cost.

Economic benefits

i. New sales opportunities

One important benefit of product innovation is the creation of new sales opportunities. For zakat entrepreneurs, innovation allows the business to respond more effectively to changes in customer demand, reduce dependence on products with unstable sales, and explore products that can generate income more consistently. In this study, new sales opportunities were created not through large-scale innovation, but through practical changes such as introducing alternative products, shifting to more marketable items, and selecting products with faster cash returns. This can be seen in the case of Entrepreneur 1, whose popcorn business depended heavily on wedding and event demand. Since sales were seasonal and could decline outside peak periods, he used the available capital to introduce another product that was less dependent on seasonal demand. As he stated, *"That is why I now sell burgers."* This shows that product innovation enabled the entrepreneur to create a new sales channel and maintain income when demand for the original product declined. A similar pattern was observed in the case of Entrepreneur 5. She shifted from cosmetics and skin care products to ready-to-eat food because the previous business involved delayed payments and customer debt. She explained, *"Selling food is better because customers buy and consume it immediately. Cosmetics involved too much debt."* This indicates that the shift to food products created a more practical and immediate sales opportunity, as payment could be received more quickly and the risk of unpaid sales was reduced.

Overall, these findings show that product innovation helps zakat entrepreneurs identify products that are more suitable for their market conditions and business capacity. By introducing or shifting to products with more stable demand and faster cash returns, entrepreneurs are able to strengthen their income flow and reduce their exposure to sales uncertainty.

ii. Increased product value

The findings further show that product innovation helped entrepreneurs improve the value and market appeal of their products. Innovation can make products more attractive, competitive, and responsive to customer preferences. In this study, product value was enhanced through product improvements in quality, design, presentation, and flavour variation. This can be seen in the case of Entrepreneur 2, who linked innovation directly to product quality and customer appeal. He explained, *"We have to maintain our product quality. If the product looks too ordinary, customers may not be interested in buying it."* He further explained that he wanted to improve his earlier products by producing items that were more refined and of higher quality, which led him to buy laser technology. This indicates that innovation was used to enhance both the visual appeal and the perceived market value of the product. Entrepreneur 8 also demonstrated how small product changes could increase value. She explained that the business initially produced only peanut rempeyek, but later introduced additional flavours. As she stated, *"Now we have cheese rempeyek, and cheese is the best-selling flavour."* This shows that even a simple change, such as flavour variation, can enhance the market appeal of an existing product and attract stronger customer demand.

iii. Multiple income streams

The findings also show that product innovation helped entrepreneurs broaden their sources of income by reducing dependence on a single product. In the context of microenterprises, this is an important benefit because relying on only one product may expose entrepreneurs to unstable demand, seasonal sales, and limited cash flow. Through product diversification, entrepreneurs were able to generate income from different product lines, respond to varying customer needs, and strengthen the overall stability of their businesses.

Entrepreneur 3 provides a clear example of this benefit. Her business was not limited to one main product, as she produced and sold pickles, fermented fish, seasonal cakes, and bulk pickling gravy. She explained that the bulk pickling gravy could generate a substantial return, stating, *"One large pot costs RM800. With only two customers, the sales can already reach RM800."* This indicates that selling in bulk created an additional income channel beyond the smaller packaged products sold to regular customers. Her experience also shows that diversification allowed the business to serve different types of demand. While small packaged products were suitable for individual customers, bulk pickling gravy was more appropriate for larger orders and wholesale customers. This helped the entrepreneur increase sales volume and improve cash flow, especially during periods of higher demand. In addition, the income generated from the business was meaningful enough to support household asset formation, as she linked her business profits to the purchase of goats using her net earnings.

Overall, the case of Entrepreneur 3 suggests that product diversification does not merely expand the range of products offered. More importantly, it creates multiple income streams, improves financial flexibility, and strengthens the entrepreneur's ability to sustain the business under changing market conditions.

iv. *Faster cash flow and repeat customers*

Product innovation also contributed to faster cash flow and the development of repeat customers. In microenterprise settings, this benefit is particularly important because business sustainability depends not only on the total amount of sales, but also on how quickly revenue returns to the entrepreneur and how consistently customers make repeat purchases. Faster cash flow enables entrepreneurs to cover daily operating costs, purchase raw materials, and continue production without excessive dependence on credit or delayed payments.

This benefit is clearly reflected in the case of Entrepreneur 5. Her shift from cosmetics and skin care products to ready-to-eat food improved cash recovery because food products were purchased for immediate consumption. As she explained, "*With food, customers buy it and*

consume it immediately." This was different from her previous business, where many customers bought products on credit and delayed payment. The shift to food products therefore, created a more practical sales arrangement, as payment was received more quickly and the risk of unpaid sales was reduced. This indicates that product innovation did not only create a new product line, but also improved business liquidity and strengthened daily cash turnover. A similar benefit can be observed in the case of Entrepreneur 3, where innovation supported repeat purchases and continuous customer demand. She explained that many regular customers continued to buy her products, while new customers often placed orders after tasting them at events. This suggests that customer satisfaction, product quality, packaging, and product variety helped encourage repeat orders. Her ability to offer both small packaged products and bulk pickling gravy also allowed her to serve different customer needs, ranging from individual buyers to larger orders.

This pattern is significant because repeat customers reduce uncertainty in daily sales. For small businesses with limited capital, regular customers provide a more stable source of income and reduce the need to constantly search for new buyers. In the case of Entrepreneur 3, repeat purchasing was closely linked to her ability to maintain product appeal through taste, packaging, and flexible product offerings. As a result, innovation improved not only immediate sales but also the continuity of sales over time.

Overall, faster cash flow and repeat customers represent important economic benefits of product innovation. Innovation helped the entrepreneurs move away from slow or uncertain payment arrangements, improve liquidity, and strengthen customer loyalty. In practical terms, product innovation contributed not only to higher sales potential, but also to more reliable and continuous business income. These findings show that product innovation among zakat entrepreneurs should be understood as a combination of economic gains and economic burdens, consistent with the qualitative cost–benefit analysis discussed by Rezapouraghdam et al. (2018). The benefits of innovation are reflected in new sales opportunities, increased product value, multiple income streams, faster cash flow, and repeat customers. At the same time, these benefits are accompanied by costs such as higher raw material and equipment expenses, greater labour demands, operational risks, and more complex business management.

Innovation impacts

When discussing the impact of product innovation, it's essential to consider how these changes affect both the immediate performance and the long-term sustainability of the business.

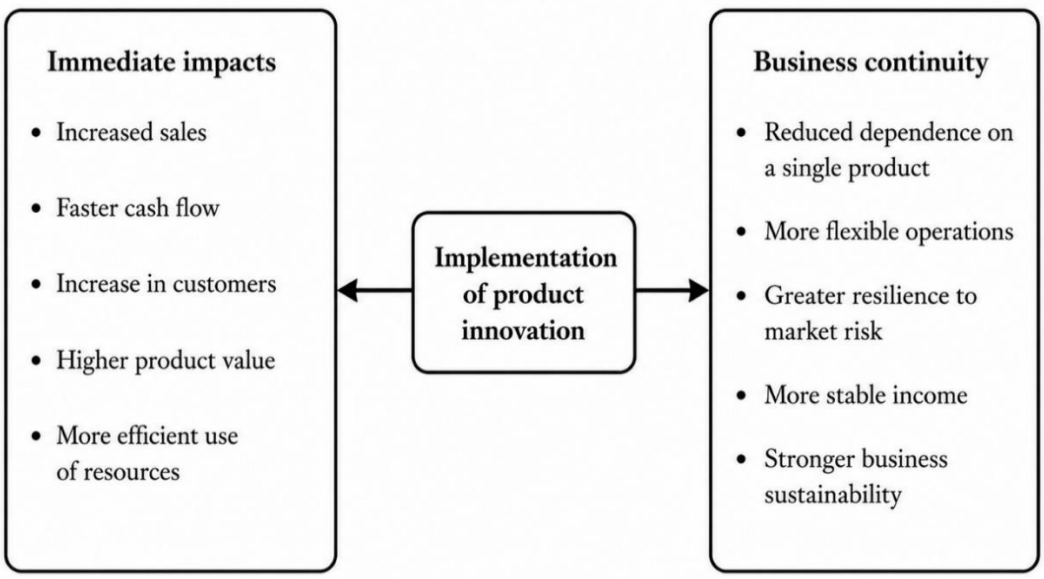


Figure 4. Product innovation and impact on entrepreneurs

Figure 4 shows that the implementation of product innovation produces both immediate impacts and longer-term effects on business continuity. In the short term, innovation helps entrepreneurs increase sales, improve cash flow, attract more customers, and raise the value of their products while using resources more efficiently. In the longer term, product innovation supports business continuity by reducing dependence on a single product, improving operational flexibility, strengthening resilience to market risk, and creating more stable income. Overall, the figure suggests that product innovation is not only a short-term business response but also an important strategy for sustaining and strengthening microenterprise performance over time.

CONCLUSION

This study examined the costs and benefits of product innovation among zakat entrepreneurs who received entrepreneurial assistance under the i-TEKAD and LZNK programme in Kedah. Using a qualitative multiple-case study approach, the findings reveal that product innovation among zakat entrepreneurs is largely practical, gradual, and survival-oriented, rather than technology-intensive or capital-driven. The entrepreneurs introduced innovation through product diversification, flavour variation, packaging improvement, changes in selling methods, and adjustments to production processes based on their financial and operational capacity.

The key finding of this study is that product innovation among zakat entrepreneurs represents a form of frugal innovation. The entrepreneurs did not depend on advanced technology or large financial resources to innovate. Instead, they used available skills, materials, equipment, and market knowledge to create products that were functional, affordable, and attractive to customers. This shows that frugal innovation is highly relevant in explaining how microentrepreneurs improve and sustain their businesses under resource-constrained conditions.

From the qualitative cost–benefit perspective, product innovation generated several important benefits, including increased sales, faster cash flow, repeat customers, wider market opportunities, and stronger business continuity. Innovation also helped entrepreneurs reduce dependence on a single product and respond more effectively to changing customer demand. However, these benefits were accompanied by several economic costs, including higher raw material and equipment costs, greater labour and time demands, operational risks, product loss, and more complex business management responsibilities.

Overall, the main contribution of this study is that product innovation among zakat entrepreneurs should not be understood only as a strategy to increase profit. More importantly, it functions as a survival and resilience strategy for microenterprises. Its value lies not only in short-term financial returns but also in its ability to improve flexibility, strengthen business continuity, and help entrepreneurs remain competitive in uncertain market conditions.

Therefore, support programmes for zakat entrepreneurs should not focus only on financial assistance, but also on strengthening self-motivation, confidence, and entrepreneurial resilience. Continuous encouragement, mentoring, and business advisory support are important to help entrepreneurs remain committed, proactive, and willing to improve their products despite limited resources. In addition, sharing sessions with successful entrepreneurs should be introduced, as these experiences can provide practical guidance, inspiration, and real examples of how small businesses overcome challenges and sustain growth. More importantly, frugal innovation should be developed one step further, not only as a survival strategy but also as a pathway for business upgrading. This can be done by helping entrepreneurs improve product quality, packaging, branding, costing, digital marketing, and market access while still maintaining the low-cost and practical nature of their innovation. In the longer term, such support is expected to help zakat entrepreneurs become more financially independent, contribute back to society through zakat payment, create employment opportunities, and strengthen the local microenterprise ecosystem. By combining financial support, business advice, peer learning, personal motivation, and structured

product development, frugal innovation can contribute more effectively to long-term business growth, business continuity, and socio-economic empowerment.

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