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Administrative Sciences

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Suggested Citation: Gošnik, Dušan; Kavčič, Klemen; Meško, Maja; Milost, Franko (2023) : Relationship between changes in the business environment, innovation strategy selection and firm's performance: Empirical evidence from Slovenia, Administrative Sciences, ISSN 2076-3387, MDPI, Basel, Vol. 13, Iss. 4, pp. 1-13, <https://doi.org/10.3390/admsci13040099>

This Version is available at:

<https://hdl.handle.net/10419/275564>

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Article

Relationship between Changes in the Business Environment, Innovation Strategy Selection and Firm's Performance: Empirical Evidence from Slovenia

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Abstract: This article studies the relationship between changes in the external business environment, a firm's innovation strategies towards customers, and performance. A model of relations was developed, as well as a hypothesis: "The use of the differentiation strategy has a positive effect on firm's performance. SMEs that use the differentiation strategy achieve better performance than those who use one of the other strategies (low-cost strategy, focus strategy, or an overtaking strategy)". The empirical study includes a population of 3007 SMEs and a sample of 163 SMEs. The firm's performance was measured using financial measures such as return on equity (ROE) and return on assets (ROA), operational measures such as economic value added (EVA) and comprehensive measures such as credit rating (CR). The structural equation modelling (SEM) approach was used for data analysis. Based on the results, we can confirm that changes in a firm's external environment affect the firm's strategy towards customers, which influences the performance of a firm. The empirical study confirmed that firms using the differentiation strategy indicate higher performances (ROA, EVA, and CR) than those using any other strategy. Results also show that high-performance SMEs incorporate customer perspectives into strategy selection. The most significant influence on the firm's selection of the differentiation strategy was found in cases when the firm cooperates with new customers with whom it has not collaborated thus far. SMEs that use a low-cost strategy, focus strategy, or overtaking strategy are less successful than companies that use a differentiation strategy. The developed model of relations in this research has special meaning for researchers and managers in the field of strategic management, strategy selection and implementation, as well as performance of SMEs.

Keywords: strategic management; changes; strategy; innovations; customer; differentiation; performance; SMEs



Citation: Gošnik, Dušan, Klemen Kavčič, Maja Meško, and Franko Milost. 2023. Relationship between Changes in the Business

Environment, Innovation Strategy Selection and Firm's Performance: Empirical Evidence from Slovenia.

Administrative Sciences 13: 99.

<https://doi.org/10.3390/admsci13040099>

Received: 27 February 2023

Revised: 25 March 2023

Accepted: 25 March 2023

Published: 27 March 2023



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1. Introduction

The achievement of optimal firm performance is a process. This process requires careful planning and directing of the firm's business operation towards achieving a particular objective, which we refer to as a strategy. Wang et al. (2020) noted that a strategy is, in particular, the key element of developing a competitive advantage and ensuring the performance of the firm. Strecker (2009) concluded that if we remain focused on the competition, it is easier to recognize the branch trends regarding the customers' needs and technology, which is cheaper than exploring the market all by ourselves. Dobni et al. (2021) noted the positive impact of modern technology on the firm's performance and that firms directed towards the use of advanced technologies tend to be more successful on the market. In addition, good relationships with suppliers enable a firm to achieve higher efficiency and better performance (Rezaei et al. 2018). Norsalehe and Idris (2022) stated that innovativeness positively influences SME performance. Sahu et al. (2023) discovered that a firm's technological awareness positively impacts the implementation of

new technologies by the suppliers and the supply chain. Liao et al. (2020) also showed that a firm's technological capability strengthens the influence of innovations and firm performance. Kapoor (2023) demonstrated that learning in organizations can encourage and enable their employees to own and drive their personal development for the future. Strecker (2009) claimed that being competitive means serving customers in a better way compared to other competitors. Therefore, high-performance firms must adjust to their industry competitors to a certain degree. However, there are particular advantages and disadvantages to doing so. Excessive concentration on competitors can mean, on the other hand, that a firm puts too much emphasis on costs. Strecker (2009) revealed that firms that use advanced technologies are more successful in the market.

Comprehensive research establishing a relationship and investigating the relationship between three areas: (1) changes in the external business environment, in particular; (2) firm innovation strategy selection toward customers; and (3) firm performance is scarce in the literature. As a research gap, the opportunity to develop a model of relationships between the external business environment of the firm's strategy selection towards customers and thus related firm performance has also been identified.

Our study investigates how changes in the external business environment impact firm innovation strategy selection and firm performance. Our research is focused on SMEs. In our research, we measure firm performance with many measures, not only financial. For example, we included financial measures (return on equity—ROE; return on assets—ROA), operational measures (economic value added—EVA) and comprehensive measures (credit rating—CR) for firm performance.

This study aims to show the relationship between changes in the external business environment, the selection of the strategy towards customers, and the impact on firm performance. Based on the theoretical background from the literature and the detected research gap, we formulated a model of links between selected factors such as changes in the environment, firm strategies towards customers, and firm performance.

Following findings in the literature and research gap, particular research questions arose:

- Which external factors of the external business environment influence the selection of the firm strategy towards the customers to the greatest measure?
- Which firm strategy towards customers (differentiation strategy, low-cost strategy, focus strategy and overtaking strategy) is related to the performance of SMEs?
- To which firm performance measures, such as ROE, ROA, EVA, and CR, is the use of the selected firm strategy related?

This research aims to emphasize the importance of the impact of changes in the external business environment and their relationship to a firm's innovation strategy selection and, thus, related firm performance.

This article presents new findings about how changes in the external business environment impact innovation strategy selection towards customers and firm's performance. Studying environmental impacts, firm strategies towards customers, and their impact on business performance is complex. Firm performance is influenced by many factors that cannot be captured in one study at the same time, so we treated the links between only selected factors in this research as a model. In the empirical section, we checked the validity of the developed model of relations.

The originality of this research is represented by an overview of the latest literature on the field of strategy use in SMEs: the presentation of unique relationships between (1) changes in the external business environment, including the aspect of customers, competitors, technology, and suppliers; (2) firm's strategies towards customers; and (3) the performance of SMEs. Relationships were studied with SEM model. A unique contribution is also a measurement of firm performance. Firm performance was measured using financial measures such as return on equity (ROE) and return on assets (ROA), operational measures such as economic value added (EVA), and also comprehensive measures such as credit rating (CR).

2. Theoretical Basis and Literature Review

Strategy is how a firm chooses to compete. [Strecker \(2009\)](#) and others ([Signoretti 2020](#); [Alzahrani 2019](#); [Bellamy et al. 2019](#); [Davis 2020](#); [Liao et al. 2020](#); [Signoretti 2020](#); [Wurthmann 2020](#); [Borgersen 2022](#); [Hossain et al. 2022](#); [Khan 2022](#); [Kapoor 2023](#); [Sahu et al. 2023](#)) also noted that a firm's strategy is key to achieving a competitive advantage and positive firm performance and others. [Hoverstadt et al. \(2020\)](#) connected the strategies used with firm performance; and pointed out that with respect to the firm business management, several different aspects have to be incorporated, including the strategic outlook of the firm's development and the market orientation. When choosing a firm's strategy concerning the customers, the firm has several options: the differentiation strategy, the low-cost strategy, the focus strategy, and the overtaking strategy (2014). [Trkman et al. \(2015\)](#) stated that a lack of customer orientation results in a firm's poor performance. [Vom Brocke et al. \(2014\)](#) and [Lattuch et al. \(2023\)](#) claimed that competitors, technology, and suppliers cause changes in the environment that impact a firm's strategy and long-term performance. Moreover, [Liao et al. \(2020\)](#) and others ([Khan 2022](#); [Norsalehe and Idris 2022](#)) highlighted the importance of the firm's technological capability and its influence on firm performance.

Therefore, high-performance firms must adjust to their competitors. By being focused on the competitors, it is easier to recognize the branch trends, including the needs of the customers as well as with respect to technology, which is cheaper than exploring the market all by ourselves ([Strecker 2009](#)). This can be the basis for the development of relevant strategies towards customers. Furthermore, for organizations operating in a fast-changing environment, reactions to the changes by using proper strategy are vital for survival ([Armanious and Padgett 2021](#)). Therefore, it is appropriate to include changes in the external environment as a key factor in the firm selection of the strategy and its impact on a firm's performance.

2.1. Changes in the External Business Environment and Firm Strategies towards Customers

Products and services represent a firm's outputs and are intended for customers. In this regard, a particular question arises on how to include the customers in a firm's business operations, considering the customer aspect is the key factor of a firm's performance. [Trkman et al. \(2015\)](#) also saw a connection between customers and the prompt and future achievement of objectives not only of the owners but of other partakers too. [Lattuch et al. \(2023\)](#) proved that implementing organizational changes can help develop a customer-based perspective and frame a firm culture that supports organizational development. Thus, it is appropriate to include the response to environmental changes regarding customers in the model of firm performance impacts. Other authors ([Strecker 2009](#); [Vom Brocke et al. 2014](#); [Gošnik 2019, 2020](#)) also exposed other external factors that affect firm performance, such as competitors, technology, and suppliers and their impact on innovation strategy selection and performance.

[Vom Brocke et al. \(2014\)](#) established that nowadays, the use of modern information technology represents a precondition for successful change implementation within a firm. [Lattuch et al. \(2023\)](#) proved that implementing organizational changes can help develop a customer-based perspective and frame a firm culture that supports organizational development. According to [Strecker \(2009\)](#), technological changes represent one of the main change initiators in today's business environment. This is also reflected in terms of the firm's strategies. [Strecker \(2009\)](#) stated that if we remain focused on the competition, it is easier to recognize the branch trends regarding the customers' needs and technology, which is cheaper than exploring the market all by ourselves. Customers are an important issue because each firm needs to be directed towards producing products/providing services for the benefit of customers ([Trkman et al. 2015](#)). This can be the basis for developing relevant firm strategies that consider the customer's perspective. We can conclude that firms perform better if they incorporate a customer-based perspective into their business decisions ([Sahu et al. 2023](#)).

Kapoor (2023) demonstrated that learning in organizations can encourage and enable their employees to own and drive their personal development for the future. Khan (2022) also stated that the collaboration capabilities of a firm positively influence its differentiation strategies and marketing performance. Collaboration with suppliers can be related to organizational learning and development.

Firms also achieve this by cooperating with suppliers. Suppliers enable faster access to new technologies while specializing in a particular field of business operations. Due to their specialization, suppliers help us achieve lower costs and more efficient utilization of resources (financial resources can be invested in our central capacity) and thus optimize business operations. Cooperation with suppliers is the only way of achieving business operation optimization in terms of, e.g., stocks, logistics, supplies accuracy, etc. (Angulo et al. 2004). Rezaei et al. (2018) established that poor relationships with suppliers have a negative impact on a firm's performance. On the other hand, good relationships with suppliers can enable a firm to achieve higher efficiency in production and better sales results (Rezaei et al. 2018).

Moreover, new skills from suppliers can enable a firm to prevail over the competition by maintaining lower costs and, consequently, lower prices, enabling differentiation. Suppliers can also become a source of new ideas and strategies (Kapoor 2023; Sahu et al. 2023).

2.2. Innovation Strategies towards Customers and Firm Performance

Firm strategies towards customers include many options: differentiation strategy, low-cost strategy, focus strategy, and overtaking strategy, as claimed by Strecker (2009). The differentiation strategy means that a firm offers a unique product/service that fulfills customer requirements more effectively than the competition (Banker et al. 2014). It requires that the firm provides a different, adjusted, and innovative product, while the customers are expected to pay extra for it. Strecker (2009) also noted that Firms using the differentiation strategy tend to be more innovative than those that do not use this strategy. Innovations are also essential for customer retention and result in higher firm performance (Bayo-Moriones et al. 2021). Hossain et al. (2022) and Borgersen (2022) stated that differentiation strategies influence the performance of firms. A firm's performance can be supported by the collaboration capabilities of the firm and the use of a differentiation strategy (Khan 2022).

Firms using the differentiation strategy must pay attention to their price position in the market. This is why firms often combine the latter with the low-cost strategy, as described below in further detail. The low cost strategy emphasizes the efficiency (productivity) of the firm's internal processes while focusing on the entire value chain, the suppliers, the processes in the firm and the post-sale processes (Strecker 2009). This strategy protects the firm from pressures stemming from the environment, requires significant effort and is associated with particular risks in the event of major technological changes in the market. Ge and Ding (2005) established that Firms using the low-cost strategy can increase their market share and profit, especially when combining it with the differentiation strategy. Kim et al. (2004) and Parnell (2006) suggested a combination of strategies for better performance. Focus refers to a strategy where a firm focuses its capacities on a narrow group of customers, a narrower market, or a narrower selection of products/services. Focus enables the firm to achieve better resource profitability, optimizing the scope of operation and activities and, thus, the optimization of processes. This can be associated with purpose-driven technology and other solutions adjusted to the focus strategy and with higher operating costs (investments in purpose-driven equipment are higher, and the return on investments is slower than universal solutions). The efficiency of the focus strategy is subject to the question of whether the wishes of the customers are differentiated enough, as claimed by Porter (1980). Firms often use this strategy in cases where the low-cost strategy is not applicable (Strecker 2009). The overtaking strategy means that a firm spends less time implementing changes, developing products/services and launching on the market than the competition. The overtaking strategy enables more efficient customer service,

improvement on existing and formation of new processes, and puts special emphasis on the process implementation time as a key competitive factor (responsiveness to environmental changes, overtaking competitors).

In the literature, the firm’s performance is tackled in various ways. The scientific literature uses the term “performance” as the idea of a firm’s success (Rezaei et al. 2018; Banker et al. 2014; Bartz and Winkler 2016. Al Issa (2021) suggested that a firm’s performance is shown in its achieved financial results (profit). Performance can be assimilated into a firm’s innovativeness, as a firm’s profit is the result of innovativeness (Khan 2022; Norsalehe and Idris 2022; Lu et al. 2021). Regarding performance measurement, De Wall (2008) suggested measuring with the help of the degree of achieving objectives (financial aspect). Performance measuring should include primary and secondary data and at least the past five years of business operation (De Wall 2008; Gošnik 2018; Yoshikuni et al. 2021; Gošnik and Stubelj 2021).

A firm’s performance is subject to several factors, all of which, however, cannot be covered by this research. Hence, we only included selected factors such as (1) changes in the external business environment and (2) the firm’s strategy towards customers, for which, based on literature reviews in our research model, we assumed to have the strongest influence on a firm’s performance.

3. Research Methodology

The study of the relationship between changes in the external business environment, strategy selection, and company performance are affected by many factors that cannot be included in one study. We have only selected factors that have been identified as having the most impact in similar research (Strecker 2009). The relationships between factors that we have developed are presented as a model (Figure 1). The structural equation modelling (SEM) approach is commonly used to analyze such relations. SEM is one of the most popular methodologies in quantitative social sciences.

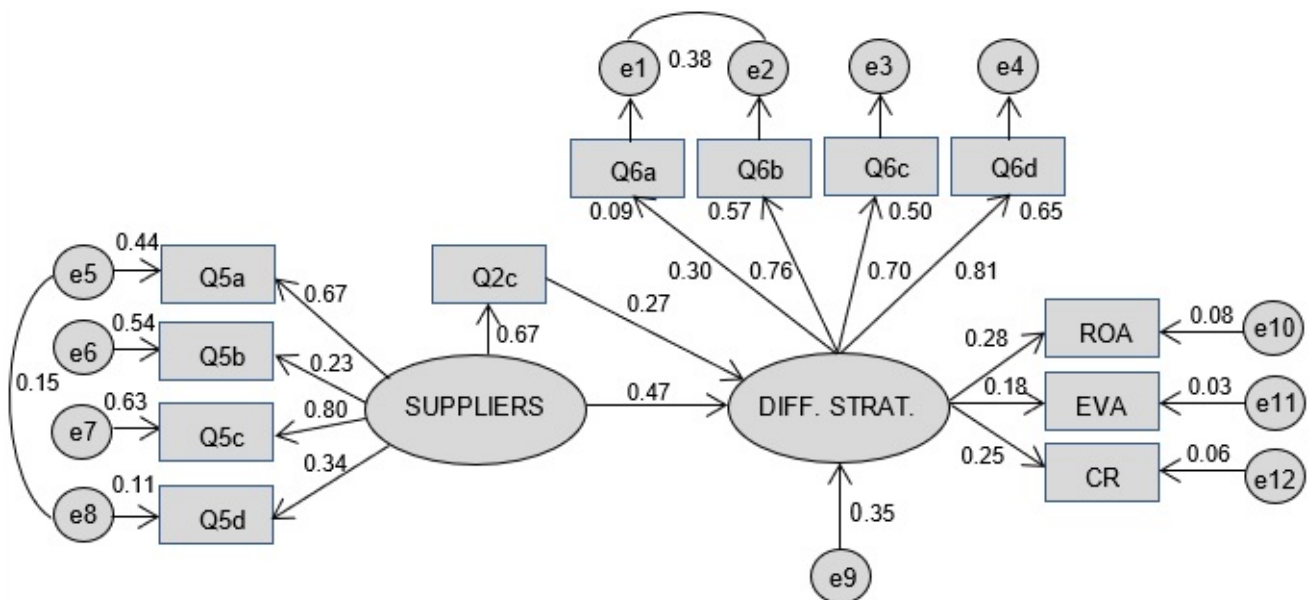


Figure 1. Structural equation model of the validation.

(DIFF. STRAT.—differentiation strategy; ROA—return on assets; EVA—economic value added; CR—credit rating; e—error; $p = 0.000$)

Based on the theoretical baselines in the literature review chapter, we established a model of relations between the following factors: (1) changes in the external business environment; (2) firm innovation strategy selection towards customers; and their relation to (3) firm performance. Factor (1), changes in the external business environment, includes

aspect of customers, competition, technology and suppliers. Factor (2), firm innovation strategy selection towards customers, includes the use of differentiation strategy, low-cost strategy, focus strategy, and overtaking strategy. Factor (1) and (2) were related to firm performance measured using financial measures (ROA, ROE, EVA) and business credit rating data (CR); Figure 1.

The developed hypothesis is: “The use of the differentiation strategy positively affects firm performance. SMEs that use the differentiation strategy achieve better performance than those who use one of the other strategies (low-cost strategy, focus strategy, or an overtaking strategy)”.

A hypothesis was developed based on previous findings of previous findings presented in the theoretical part of this study. [Norsalehe and Idris \(2022\)](#); [Kapoor \(2023\)](#); [Sahu et al. \(2023\)](#); and [Vom Brocke et al. \(2014\)](#) outlined the importance of including external changes in the business environment for firm performance. Separately, [Strecker \(2009\)](#); [Hossain et al. \(2022\)](#); [Borgersen \(2022\)](#); [Ge and Ding \(2005\)](#); [Khan \(2022\)](#); [Banker et al. \(2014\)](#); [Kim et al. \(2004\)](#); and [Parnell \(2006\)](#) demonstrated a positive relationship between the use of strategy and a firm’s performance. In the field of measuring a firm’s performance, [Al Issa \(2021\)](#) and [De Wall \(2008\)](#) suggested the use of financial measures (ROA, ROE, EVA) and business credit rating data (CR) for a more realistic evaluation of a firm’s performance. Thus, none of the previous research-related areas, such as (1) changes in the external business environment; (2) the firm’s strategy; and (3) the firm’s performance, have developed a model of relationships between these three areas. Furthermore, each of the three areas we relate to in the hypothesis is systematically discussed. Finally, we check the validity of the hypothesis in the empirical part of the research.

1. Changes in the external business environment include changes in the field of:
 - Customers;
 - Competition;
 - Technology;
 - Suppliers.
2. Firm innovation strategy selection towards customers, which includes:
 - Differentiation strategy;
 - Low-cost strategy;
 - Focus strategy;
 - Overtaking strategy.
3. Firm performance in our research includes financial measures (ROA, ROE, EVA) and business credit rating data (CR).

We studied how changes in the external business environment of the firm affect the firm selection of strategy towards customers and how the selected strategy affects firm performance.

In the context of statistical processing of the collected data in our model of relations in the empirical part, we used structural equation modelling—SEM. We supported each statement with each factor—(1) external business environment; (2) firm innovation strategy selection towards customers—by using a measuring scale according to Likert and included it in a survey questionnaire. As a starting point, we used similar research in this area, where individual statements were already used as part of a particular measuring instrument ([Jaworski and Kohli 1993](#); [Strecker 2009](#)).

The measurement of (3) firm performance was comprehensively designed based on secondary financial performance data (ROA, ROE), operating performance data (EVA), and business credit rating data (CR). Secondary data on firm performance were used over five years based on publicly available data.

The limitation of the research on SMEs in Slovenia is based on the following arguments: In the European Union (EU), most SMEs operate in the private sector and represent the driver of economic growth, innovations, and employment and constitute a pillar of the

European economy. Two-thirds of all jobs in the private sector are created by SMEs, which secures the employment growth rate. SMEs play an important role in creating new jobs. SMEs need to turn to external sources to achieve competitiveness (Rezaei et al. 2018).

4. Results

4.1. Data Collection and Population

The target population of our research was represented by 3007 SMEs from the public database of entities domiciled in Slovenia. We used an online survey questionnaire to collect the relevant data.

The questionnaire consisted of close-end questions from more subject areas. The questionnaire's introduction consisted of an affirming letter for the firm directors with an explanatory note regarding the research and instructions for completion. The first factor, (1) "Changes in the external business environment", included the subject areas customers, competitors, technology, and suppliers. The second factor, (2) "Firm's strategy towards customers", included subject areas relating to the differentiation, low-cost, focus, and overtaking strategies.

The respondents assessed their level of agreement with the statements made. A six-point Likert scale was used to avoid answers corresponding to the scale's mean value. The questionnaire included ordinal variables, numeric variables, and nominal variables. The ordinal variables (scale 1–6) were used to measure the environment's changes and the firm's strategy vis-à-vis the customers. The nominal variables were used to measure the firm's overall performance, which was measured using the CR.

4.2. Results of the Sample

The database of collected surveys contains a sample of 163 valid surveys. Most firms (37.4%) operate in the processing industry. The second most commonly represented industry (10.4%) of firms is wholesale and retail trade, followed by the construction industry (6.7%); agriculture, forestry and fishing (6.1%); professional and technical industry (4.3%); information and communication activities (4.3%); water supply and waste industry (3.2%); and others (27.6%). Regarding the number of employees in firms, our sample includes 73 small firms (44.8%) with 10–40 employees and 90 medium-sized firms (55.2%) with 50–249 employees. The questionnaire addressed the firm managers we assumed had the best firm strategy overview with invitations to include the most qualified employees to complete the questionnaire. Results show that 35.0% of respondents were business unit managers, 27.0% were firm managers, 7.4% were process managers, 4.3% were project managers, 2.5% were technical managers, and 23.9% were from other managerial positions.

4.3. Results of the Measuring System Testing

The validity of the questionnaire was ensured by developing applicable statements for measuring particular impacts and correlations in the theoretical part of the research. Factor (1), "Changes in the external business environment" included the following subject areas: customers, competitors, technology, and suppliers. Factor (2), "Firm's strategy towards customers", included the following subject areas: differentiation strategy, low-cost strategy, focus strategy, and the overtaking strategy (to outpace the competition). Individual statements for each subject area were used. We applied a factor analysis and thus additionally validated whether the variables (our statements) within each subject area indeed measure the individual factors.

4.4. Results of SEM Modelling

First, we entered our model of correlations between Factor (1), "Changes in the external business environment", the influencing factor, (2) "The firm's innovation strategy selection towards the customers", and the firm's performance in our research model. The analysis initially showed that the factor "Changes in the external business environment" and the factor "Strategy towards customers" were used as a unified factor of a larger number of

variables, which do not have a statistically significant impact on any of the selected response variables (ROA, ROE, EVA, CR). Subsequently, we gradually improved the model and explored the impact on firm performance at the level of individual statements (variables), keeping only variables (statements within a particular subject area) that had a statistical significance in explaining the firm's performance based on the structural model (Hox and Bechger 1999; Lleras 2005). As a result, achieved values of the parameters normed fit index (NFI), root mean square error of approximation (RMSEA), the Tucker–Lewis index (TLI), and the comparative fit index (CFI) for our model were interpreted and compared to suggested values of NFI, RMSEA, TLI, CFI of Bentler, and Bentler and Bonett (1980); Raykov and Marcoulides (2006); Blunch (2008). Figure 1 and Table 1 show the results of the model validation.

Table 1. Variable codes in the SEM model.

Code	Statement/Variable
Q5a	Our main suppliers are considered as leaders in their industry.
Q5b	We establish long-term strategic partnerships with our main suppliers.
Q5c	Our main suppliers quickly adjust to changes in the industry.
Q5d	The competitiveness of our products/services mainly depends on the innovativeness of our suppliers.
Q6a	Our products/services are substantially different from the products of our main competitor in the industry.
Q6b	Our marketing activities tend to be more innovative than our main competitor's activities in the industry.
Q6c	We strive to achieve wider recognition of our brand.
Q6d	We make larger investments in our marketing communication activities than our main industry competitors.
Q2c	Mainly new customers turn to us with whom we have not cooperated in the past.

Figure 1 shows the strength of the correlation using the Pearson coefficient (min. 0, max. 1). The higher values of the coefficients show a stronger correlation. Regarding the factor analysis, the beta value indicates the strength of the correlations.

The changes in the external business environment were measured using four groups of statements for the following subject areas: "Customers", "Competitors", "Technology", and "Suppliers", whereas in the final analysis, only a set of statements remain (Q5a, b, c, d), which applies to the suppliers and one of the statements (Q2c) for the subject area "Customers". The application of the differentiation strategy was validated using these statements (Q6a, b, c, d)—Table 1.

Our hypothesis was tested with the help of a linear structural model (SEM), where we used the path analysis method. The ROA data were obtained from publicly accessible databases from the past five years. A five-year average was considered in the analysis. The CR data were obtained from publicly accessible databases from the past four years. The CR variable is a descriptive variable to which we attributed a rank (numerical value) for the purpose of the analysis.

The results of the SEM model show that the NFI for our model is 0.759. According to Bentler and Bonett (1980), our model for the NFI value needs to provide an ideal value. An ideal value would be higher than 0.90. The RMSEA value for our model is 0.101. Bentler and Bonett (1980) indicate that it is close to the average adjustment value, which would be 0.08. The TLI value for our model is 0.727. According to Bentler and Bonett (1980), the ideal TLI value would be 0.950. The CFI value for our model is 0.825. According to Bentler and Bonett (1980), the ideal value should be 0.950 or more. According to Bentler and Bonett (1980), the CFI is irrelevant if the RMSEA value is under 0.158. Therefore, our model focuses on NFI, RMSEA, and TLI.

5. Discussion

The fact that the verification results of our proposed model show that the model does not provide ideal values can be explained by the following: (1) our model is relatively complex since we captured a relatively large number of subject areas; (2) we estimated that a larger sample could help achieve more optimal values and thus gain in the generalization of results; (3) the measuring instrument has proven to be weak in the field of measuring the external influences of a firm's environment of its performance even though we used similar measuring systems such as [Strecker \(2009\)](#). The model's validity could be improved by optimizing the number of links in the model (including fewer potential influencing factors) and increasing the sample size. A larger sample could have significantly impacted the results of this study.

Changes in the external business environment on the field of suppliers (Table 1, Figure 1) were observed as being the key external factor influencing firm performance. This is also supported by [Kapoor \(2023\)](#) and [Sahu et al. \(2023\)](#), who stated that suppliers are a key source of new ideas.

The findings of our research suggest managers to establish long-term cooperation with leading suppliers in the industry and to consider capability of suppliers to be able to quickly adjust to changes in the industry and innovativeness of suppliers, as this characteristic of suppliers positively supports the use of an SME's differentiation strategy of. These results are supported by findings of [Khan \(2022\)](#) who stated that the collaboration capabilities of a firm positively influence differentiation strategies and firm performance.

Similar previous research by [Strecker \(2009\)](#) only included selected external factors influencing firm innovation strategy selection such as environmental uncertainty and overall business strategy. Our research resulted in similar findings of [Strecker \(2009\)](#) and [Bayo-Moriones et al. \(2021\)](#), who confirmed that innovation field orientation and technology orientation positively influence firm performance, that innovations are essential for customer retention, and that they result in higher firm performance.

Our study also suggests that firms that use the differentiation strategy achieve better performance than those that use one of the other strategies (low-cost strategy, focus strategy, or an overtaking strategy). This is supported by findings of [Hossain et al. \(2022\)](#) and [Borgersen \(2022\)](#), who also stated that differentiation strategy positively influences the performance of firms. Finally, our findings suggest managers of SMEs to implement a differentiation strategy, as it positively affects firm performance as measured by ROA, EVA, and CR.

6. Conclusions

This article explores the relationship between the changes in a firm's external environment on the strategy towards customers and its impact on firm performance. First, based on the theoretical background from the literature, we formulated a model of relations between selected factors such as (1) changes in the environment, (2) firm strategies towards customers, and (3) firm performance. Then, we treated the relationships between these selected factors in this study as a model. Finally, in the empirical section, we checked the validity of the developed model.

Based on the results, we can confirm that changes in a firm's external environment affect its strategy towards customers, which influences firm performance. Firms that use the differentiation strategy have better performance (based on ROA, EVA, and CR) than those that use one of the other strategies (low-cost strategy, focus strategy, or an overtaking strategy).

The differentiation strategy in SMEs was used in cases where SMEs were cooperating with new customers with whom they had not cooperated thus far. We also found that suppliers influence the differentiation strategy and recognize that the most influential claim is "Our major suppliers are rapidly adapting to changes in the industry".

Firms have higher performance if they work with suppliers who are leaders in their field (industry leaders), if they establish long-term strategic partnerships with them for mu-

tual benefit, provided that the suppliers have the ability to adapt to changes in the industry quickly and if firms achieve product/service competitiveness through the innovation of their suppliers.

The results of this study help in understanding the relationship between changes in the external business environment to strategy selection and company performance from a theoretical and practical perspective. Thus, the implications of this research are divided into theoretical and practical.

- From a theoretical perspective, a key contribution of this research is the development of a new theoretical and empirically assessed model of relations between changes in the external business environment, strategy selection, and performance of SMEs. Changes in the external business environment in our study were related to innovation strategy selection towards customers and further on to firm performance, which has rarely been performed in prior studies. Our results suggest that researchers include changes in the field of customers, competition, technology and suppliers, as they were detected to impact on firm's strategy selection the most. We discovered that firms that cooperate with leading suppliers that possess high innovation capabilities support the use of differentiation strategy the most.
- Our study shows the relation of changes in the external business environment to four types of firm's strategies towards customers, such as differentiation strategy, low-cost strategy, focus strategy, and overtaking strategy, which were measured with a developed measurement system (statements). Our findings suggest that firms that use differentiation strategy achieve in better performance.
- Unique contribution of our research is in the use of financial (ROA, EVA) and comprehensive measures (CR) for measuring company performance, rarely carried out in prior studies. Existing theory and prior research in this field (Strecker 2009; Signoretti 2020; Alzahrani 2019; Bellamy et al. 2019; Davis 2020; Liao et al. 2020; Wurthmann 2020; Borgersen 2022; Hossain et al. 2022; Khan 2022; Kapoor 2023; Sahu et al. 2023) was upgraded by the use of financial (ROA, EVA) and comprehensive (CR) measures in our research, which we added for measuring firm performance. The methodological implications of our study concern the use of an SEM approach for studying the relations between changes in external business environment, strategy selection, and firm performance, rarely performed in prior studies.

The developed model of relations in our research also has some practical implications for managers on the field of strategic management and strategy selection and implementation, as well as the performance of SMEs. (1) This study helps managers to better understand the relationship between changes in the external business environment to strategy selection and firm performance. (2) The results of our study can improve decision making in SMEs and improve firm performance. (3) Our study reveals that firms that are using differentiation strategy result in better performance. Thus, managers should prioritize decisions that support the implementation and use of differentiation strategy. (4) Our study suggests that managers should, during a firm's strategy selection, take decisions that consider changes in the field of suppliers in particular, as they support the use of differentiation strategy the most. (5) In practice, managers are suggested to establish long-term cooperation with leading suppliers in the industry. (6) Managers should select suppliers based on their capability to quickly adjust to changes in the industry and suppliers' innovation capability, as this characteristic of suppliers positively supports the use of differentiation strategy. (7) Moreover, firms should focus on their cooperation with new customers with whom they have not cooperated in the past, as they positively affect the use of differentiation strategy in SMEs. (8) When measuring the effect of strategy use in SMEs, managers should use both financial (ROA, EVA) and comprehensive (CR) measures at the same time to evaluate firm's performance in the several-year period, as also suggested by De Wall (2008).

The limitation of this paper is the study of the impact of only well-chosen factors of the environment on the firm's innovation strategy selection regarding customers and

firm performance. We could not include all of them in one research paper; therefore, the correlations between the chosen factors were the considered models. This research is limited to SMEs in Slovenia. Using a survey as a measuring instrument also represents the limitation of this research. We used a quantitative method of data collection using an online survey questionnaire of close-ended questions. The limitation is the population of SMEs in Slovenia and the sample of 163 firms from which we obtained appropriately completed questionnaires.

As an opportunity for further research, we see the following opportunities: (1) optimization of the research model regarding the measurement instrument in the subject areas of “Changes of the environment” and “Customers”; (2) conducting periodical surveys over time to obtain comparative studies for the same population of firms; (3) research could be separately conducted for producing firms and utility firms; (4) in the same way, we could include other factors in the established model, which influence performance and were not included so far (e.g., ownership of the firm, type of product/service, strategy towards competitors, etc.) and explore their impact on a firm’s performance; (5) comparative studies in economies comparable to the Slovenian economy. In this way, our findings would obtain more credibility and achieve greater generalization of results. Furthermore, in the event of repeated research, the findings could help managers in SMEs to achieve greater firm performance.

Author Contributions: Conceptualization, D.G., K.K., M.M. and F.M.; methodology, D.G., K.K. and M.M.; software, D.G., K.K. and M.M.; validation, D.G., K.K., M.M. and F.M.; formal analysis, D.G., K.K., M.M. and F.M.; investigation, D.G., K.K., M.M. and F.M.; resources, D.G., K.K., M.M. and F.M.; data curation, D.G., K.K., M.M. and F.M.; writing—original draft preparation, D.G., K.K. and M.M.; writing—review and editing, D.G., K.K., M.M. and F.M.; visualization, D.G.; supervision, D.G., K.K. and M.M.; project administration, D.G., K.K. and M.M.; funding acquisition, M.M. All authors have read and agreed to the published version of the manuscript.

Funding: This research received no external funding.

Institutional Review Board Statement: Not applicable.

Informed Consent Statement: Not applicable.

Data Availability Statement: Public available financial data about Slovene business entities are available in database GVIN.

Conflicts of Interest: The authors declare no conflict of interest.

References

- Al Issa, Hussein-Elhakim. 2021. The impact of improvisation and financial bootstrapping strategies on business performance. *EuroMed Journal of Business* 16: 171–94. [[CrossRef](#)]
- Alzahrani, Joman. 2019. The impact of e-commerce adoption on business strategy in Saudi Arabian small and medium enterprises (SMEs). *Review of Economics and Political Science* 4: 73–88. [[CrossRef](#)]
- Angulo, Andres, Heather Nachtmann, and Mathew A. Waller. 2004. Supply chain information sharing in a vendor managed inventory partnership. *Journal of Business Logistics* 25: 101–20. [[CrossRef](#)]
- Armanious, Michael, and Jared D. Padgett. 2021. Agile learning strategies to compete in an uncertain business environment. *Journal of Workplace Learning* 33: 635–47. [[CrossRef](#)]
- Banker, Rajiv D., Raj Mashruwala, and Arindam Tripathy. 2014. Does differentiation strategy lead to more sustainable financial performance than a cost leadership strategy? *Management Decision* 52: 872–96. [[CrossRef](#)]
- Bartz, Wiebke, and Adalbert Winkler. 2016. Flexible or fragile? The growth performance of small and young businesses during the global financial crisis—Evidence from Germany. *Journal of Business Venturing* 31: 196–215. [[CrossRef](#)]
- Borgersen, T. A. 2022. Product differentiation and populist entry strategies in a mortgage market with Bertrand competition. *Journal of European Real Estate Research* 15: 263–77. [[CrossRef](#)]
- Bayo-Moriones, Alberto, Jose Enrique Galdon-Sanchez, and Sara Martinez-de-Morentin. 2021. Business strategy, performance appraisal and organizational results. *Personnel Review* 50: 515–34. [[CrossRef](#)]
- Bellamy, Lawrence, Nii Amoo, Kieran Mervyn, and Jacqueline Hiddlestone Mumford. 2019. The use of strategy tools and frameworks by SMEs in the strategy formation process. *International Journal of Organizational Analysis* 27: 337–67. [[CrossRef](#)]

- Bentler, Peter M., and Douglas G. Bonett. 1980. Significance tests and goodness of fit in the analysis of covariance structures. *Psychological Bulletin* 88: 588–606. [\[CrossRef\]](#)
- Blunch, Niels J. 2008. *Introduction to Structural Equation Modelling Using SPSS and AMOS*. Los Angeles: Sage.
- Davis, J. Paul. 2020. Getting employees involved in strategy planning. *Journal of Business Strategy* 41: 58–64. [\[CrossRef\]](#)
- De Wall, Andre. 2008. The Secret of High-Performance Organizations. *Management Online Review* 2: 100–8.
- Dobni, Brooke, Mark Klassen, and Alexander Wilson. 2021. Five strategy shifts for innovation. *Strategy & Leadership* 49: 36–40.
- Ge, Gloria L., and Daniel Z. Ding. 2005. Market orientation, competitive strategy and firm performance: An empirical study of Chinese firms. *Journal of Global Marketing* 18: 115–42. [\[CrossRef\]](#)
- Gošnik, Dušan. 2018. Model Managementa Temeljnih Procesov in Uspešnosti podjetja. Ph.D. dissertation, Univerza na Primorskem, Koper, Slovenia.
- Gošnik, Dušan. 2019. Core business process Management and company performance. *Management* 14: 59–86. [\[CrossRef\]](#)
- Gošnik, Dušan. 2020. *Strategije in Uspešnost Podjetja*. Koper: Založba Univerze na Primorskem.
- Gošnik, Dušan, and Igor Stubelj. 2021. Business process management and risk-adjusted performance in SMEs. *Kybernetes* 51: 659–75. [\[CrossRef\]](#)
- Hoverstadt, Patrick, Luck Loh, and Natalie Marguet. 2020. Measuring the performance of strategy. *Measuring Business Excellence* 7: 437–58. [\[CrossRef\]](#)
- Hossain, Kamal, Ahmad Sufian Che Abdullah, Mohd Abd Wahab Fatoni Mohd Balwi, Asmuliadi Lubis, Noor Azlinna Azizan, Mohammad Nurul Alam, and Azni Zarina Taha. 2022. Linking entrepreneurial orientation with export performance: Mediation effects of multiple differentiation strategies. *Journal of Business & Industrial Marketing*. [\[CrossRef\]](#)
- Hox, Joop, and Timo Bechger. 1999. An Introduction to Structural Equation Modelling. *Family Science Review* 11: 354–73.
- Jaworski, Bernard J., and Ajay K. Kohli. 1993. Market orientation: Antecedents and consequences. *Journal of Marketing* 57: 53–70. [\[CrossRef\]](#)
- Kapoor, Bhavya. 2023. A new perspective of learning in organisations: Eight strategies to develop skills and core competencies. *Development and Learning in Organizations* 37: 11–14. [\[CrossRef\]](#)
- Khan, Huda. 2022. Composite collaboration and the differentiation strategies adopted by emerging market firms in advanced markets during the COVID-19 pandemic. *International Marketing Review*. [\[CrossRef\]](#)
- Kim, Eonso, Dae-il Nam, and L. I. Stimpert. 2004. Testing the applicability of Porter's generic strategies in the digital age: A study of Korean cyber malls. *Journal of Business Strategies* 21: 19–45. [\[CrossRef\]](#)
- Lattuch, Frank, Christian Schlicht, and Patricia Dankert. 2023. Shaping the organizational learning strategy through customer journey mapping: Insights from shopping mall operators. *Development and Learning in Organizations*. [\[CrossRef\]](#)
- Liao, Suqin, Fu Lihua, and Liu Zhiying. 2020. Investigating open innovation strategies and firm performance: The moderating role of technological capability and market information management capability. *Journal of Business & Industrial Marketing* 35: 23–39.
- Lleras, Christy. 2005. Path analysis. *Encyclopedia of Social Measurement* 3: 25–30.
- Lu, Chang, Bo Yu, Jing Zhang, and Dan Xu. 2021. Effects of open innovation strategies on innovation performance of SMEs: Evidence from China. *Chinese Management Studies* 15: 24–43. [\[CrossRef\]](#)
- Norsalehe, Natalia Inani, and Aida Idris. 2022. Review on entrepreneurial orientation, economic stimulus packages, differentiation strategy and SME performance in Malaysia during the COVID-19 pandemic. *Journal of Research in Marketing and Entrepreneurship*. [\[CrossRef\]](#)
- Parnell, John A. 2006. Generic strategies after two decades: A reconceptualization of competitive strategy. *Management Decision* 44: 1139–54. [\[CrossRef\]](#)
- Porter, Michael E. 1980. *Competitive Strategy—Techniques for Analysing Industries and Competitors*. New York: The Free Press.
- Raykov, Tenko, and George A. Marcoulides. 2006. *A First Course in Structural Equation Modelling*. Mahwah: Laurence Erlbaum Associates Publishers.
- Rezaei, Jafar, Roland Ortt, and Paul Trott. 2018. Supply chain drivers, partnerships and performance of high-tech SMEs: An empirical study using SEM. *International Journal of Productivity and Performance Management* 67: 629–53. [\[CrossRef\]](#)
- Sahu, Atul Kumar, Abhijeet Katyayan, Umesh Khandey, Prashant Jangde, Anoop Kumar Sahu, and Nitin Kumar Sahu. 2023. Adaptation of block chain technology in SCM for steering managerial strategies: Investigative study under Indian context. *Journal of International Logistics and Trade*. [\[CrossRef\]](#)
- Signoretti, Andrea. 2020. Overcoming the barriers to the implementation of more efficient productive strategies in small enterprises. *Employee Relations* 42: 149–65. [\[CrossRef\]](#)
- Strecker, Nanja. 2009. *Innovation Strategy and Firm Performance*. Wiesbaden: GWV Fachverlage GmbH.
- Trkman, Peter, Willem Mertens, Stijn Viaene, and Paul Gemmel. 2015. From business process management to customer process management. *Business Process Management Journal* 21: 250–66. [\[CrossRef\]](#)
- Vom Brocke, Jan, Theresa Schmiedel, Jan Recker, Peter Trkman, Willem Mertens, and Stijn Viaene. 2014. Ten principles of good business process management. *Business Process Management Journal* 20: 530–48. [\[CrossRef\]](#)
- Wang, Shan-Huei, Chung-Jen Chen, Andy Ruey-Shan Guo, and Ya-Hui Lin. 2020. Strategy, capabilities, and business group performance: The endogenous role of industry diversification. *Management Decision* 58: 76–97. [\[CrossRef\]](#)

- Wurthmann, Kurt. 2020. The essential mix: Six tools for strategy-making in the next decade. *Journal of Business Strategy* 41: 38–49. [\[CrossRef\]](#)
- Yoshikuni, Adilson Carlos, Frederico Ribeiro Galvão, and Alberto Luiz Albertin. 2021. Knowledge strategy planning and information system strategies enable dynamic capabilities innovation capabilities impacting firm performance. *VINE Journal of Information and Knowledge Management Systems* 52: 508–30. [\[CrossRef\]](#)

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