ABSTRACT

The purpose of this study is to analyze the relationship between customer relationship management (CRM) and competitive advantage and to analyze the role of innovation capabilities in mediating CRM with a competitive advantage. In addition, it examines the role of competitive advantage on retail business performance. The study was conducted on retail companies in Indonesia using a quantitative approach, and responses from 255 retail owners/managers were obtained via the random sampling method. The analysis technique used is structural equation modeling (SEM) using SmartPLS software. The research findings reveal that retail competitive advantage can be achieved through the implementation of customer-oriented CRM. CRM is also able to support innovation capabilities, which will further increase competitive advantage. It is important for retail companies to strengthen the implementation of customer relationship management in order to achieve business performance because CRM is proven to increase the ability of innovation and competitive advantage of retail companies. Research on a broader type of company is needed to provide a better level of generalization.

Contribution/Originality: This study contributes to the existing literature on the importance of increasing competitive advantage through the adoption of CRM and innovation capabilities. This will be useful for retail managers who want to adopt CRM in order to improve business performance.

1. INTRODUCTION

Indonesia’s population and consumption patterns are opportunities for retailers who serve daily needs. This opportunity has not been optimally utilized by small retailers but is more profitable for large retailers where the organization and work patterns are structured. In Indonesia’s current business climate, the competition between large retailers and small retailers is like the fight between David and Goliath, where large retailers dominate the market. The increase in modern market sales is demonstrated by data collected by Nielsen, which shows sales growth of fast-moving consumer goods (FMCG). If broken down, modern retail sales rose by 1.5%, while sales for traditional stores fell by 2.2%. From the data presented, it can be seen that Indonesian people tend to shop more in modern markets, which are large retail groups. The phenomenon of the power of large retailers represented by large companies against small retailers run by individuals causes many small retailers to collapse and fail to...
compete. However, there are still gaps that small retailers can exploit to compete and stay afloat. Customers have product or service needs that are not being met in the modern market, and these unmet needs create opportunities for small businesses if they can identify this market and provide better value than the offerings of incumbent firms (Ardichvili, Cardozo, & Ray, 2003). Developing the capacity to recognize customer needs and provide products or services of value to customers will enable small retailers to develop a loyal customer base to promote their business and maintain business viability. Here is where customer relationship management (CRM) plays a role in increasing customer value.

Implementation of CRM can be an alternative to developing a loyal customer base. CRM is one strategy that companies communicate with customers, and acquire and retain useful customers to create value for the companies and their customers (Wang & Kim, 2017). CRM can lead to a competitive advantage, as it allows a company to better understand its customers, define target customers, retain them, and forecast demand (Bhat & Darzi, 2016). CRM is related to competitive advantage because it provides a different shopping experience for consumers that will make consumers feel at home and encourage repeat purchases so that consumers will become loyal consumers (Bagdare & Jain, 2013).

Researchers have revealed that not all CRM practices are successful, one of the causes of failure is an excessive focus on the benefits of implementing technology, thus ignoring the customer-centric view of CRM (Bhat & Darzi, 2016). In fact, CRM success is also related to innovation ability, and researchers generally attribute the effect of innovation ability to better organizational performance (Soltani, Zareie, Milani, & Navimipour, 2018; Valmohammadi, 2017; Wang, Yang, & Chuang, 2020). However, there is still a limited number of studies about the mediating role of innovation in the relationship between CRM and competitive advantage. This study fills this gap by focusing on a CRM view that is centered on the competitive advantage that has an impact on business performance. The purpose of this study is to investigate the role of CRM on competitive advantage and its consequences on business performance in the retail sector in addition to exploring the role of innovation as a mediator of the relationship between CRM and competitive advantage.

1.1. Customer Relationship Management (CRM)

Five CRM activities that are often used include information sharing, customer involvement, partnership, problem solving, and technology-based CRM (Valmohammadi, 2017). CRM capabilities can be seen from customer interaction management, customer relationship improvement, and customer win-backs (Wang et al., 2020). Customer interaction management skills are skills to identify and acquire customers and retain them for the benefit of the company. Customer relationship improvement capability is the ability to analyze customer data to increase sales, while the customer win-back capability is the skill to rebuild relationships with inactive customers.

1.2. CRM and Competitive Advantage

CRM supports the customer knowledge creation process (Khodakarami & Chan, 2014). Increased customer knowledge includes two aspects, namely customer orientation and innovation orientation (Fidel, Schlesinger, & Emilo, 2018), which are useful for obtaining a sustainable competitive advantage (Chengwu, 2020; Lin, Chen, & Chiu, 2010). CRM is one of the innovation-oriented strategies of a sustainable business model (Gil-Gomez, Guerola-Navarro, Oltra-Badenes, & Lozano-Quilis, 2020).

CRM is a mutually beneficial relationship-oriented business strategy, aimed at increasing customer engagement and company performance (Wang & Kim, 2017). Currently, the marketing strategy is changing from transaction-oriented to relationship-oriented as CRM is key to achieving mutually beneficial relationships with customers and achieving competitive advantage (Chengwu, 2020), which is difficult for competitors to imitate (Zhang, Guo, Hu, & Liu, 2017). Based on the above information, this study proposes the following hypothesis:

H1. CRM is positively related to competitive advantage.
1.3. Competitive Advantage and Business Performance

Studies have shown that the key to successful strategy implementation depends on how a company is able to optimize its resources (Barney, 1986), and when that happens, a company will gain a competitive advantage (Kim & Hoskisson, 2015; Marinagi, Trivellas, & Sakas, 2014; Urbancova, 2013). Based on the perspective of a resource-based view, competitive advantage will be achieved if a company has superior resources, including capabilities, processes, attributes, and knowledge, compared to its competitors (Barney, 1991). Competitive advantage will give the organization the possibility to select and implement strategies that will differentiate it from its competitors. All parts of the organization, whether in the form of resources or activities, can bring a competitive advantage (Lee & Chu, 2011) and contribute to the company's level of performance (Ferreira & Fernandes, 2017).

Previous studies have revealed that competitive advantage supports the achievement of business performance (Kiyabo & Isaga, 2020; Yang, Ishtiaq, & Anwar, 2018; Yasa, Giantari, Setini, & Rahmayanti, 2020; Zainol & Al Mamun, 2018). Companies that have a competitive advantage will provide economic value that is difficult to obtain by competitors (Helfat & Peteraf, 2015), so it is important for managers to develop competitive advantages for improving business performance (Rua, França, & Fernández Ortiz, 2018).

H2. Competitive advantage is positively related to business performance.

H3. The relationship between customer relationship marketing and business performance is mediated by competitive advantage.

1.4. CRM, Innovation Capabilities, and Competitive Advantage

The role of CRM becomes very important in an increasingly competitive market (Valmohammadi, 2017) because it will increase innovation capabilities (Lin et al., 2010; Wang et al., 2020). Basically, innovation depends on the ability to integrate resources with capabilities (Inauen & Schenker-Wicki, 2011). CRM is a strategy to develop innovation capabilities that will encourage the achievement of competitive advantage (Lin et al., 2010; Ramani & Kumar, 2008). Through innovation, effectiveness and efficiency will be achieved through process improvement, which will result in a competitive advantage. Innovation is considered important to realize a competitive advantage because innovative companies will have the ability to adapt to changes (Valmohammadi, 2017). In the service sector, innovation will encourage companies to develop their services, which will create and maintain value for stakeholders (Dervitsiotis, 2010).

H4. CRM is positively related to innovation capabilities.

H5. Innovation capabilities are positively related to competitive advantage.

H6. The relationship between CRM and competitive advantage is mediated by innovation capabilities.

CRM is an important key to achieving mutually beneficial relationships with customers and achieving competitive advantage. The relationship between CRM, innovation capability, competitive advantage, and business performance is formulated in the research model presented in Figure 1.

![Figure 1. Research Model.](image-url)
2. METHODS

2.1. Sample and Data Collection

The study was conducted to determine the relationship between CRM and innovation with a competitive advantage and its impact on business performance. Using quantitative research, primary data collection was done through questionnaires, which were distributed to retail owners/managers. The sample was selected using a simple random sampling technique that ensures that each individual from a population has the same probability of being included in the sample. This study’s sample consists of 255 retailers in East Java Province, Indonesia, spread over four cities and 15 districts.

2.2. Measurement

CRM measurement was adopted from Wang et al. (2020), which consists of three dimensions, namely:

a. Customer interaction management capability.
b. Customer relationship upgrading capability.
c. Customer win-back capability.

The competitive advantage dimensions were adopted from Wang & Feng (2012), namely:

a. Efficiency (one of the company's advantages over competitors).
b. Quality (the quality of the product or service can be trusted, and it becomes the company's advantage over competitors).
c. Customer response (the ability to meet customer needs faster than competitors and provide satisfaction to customers, which will form a competitive advantage for the company).

The measurement of innovation capability was adopted from Valmohammadi (2017) using two dimensions, namely product innovation and process innovation.

a. Product innovation (the ability to develop an entirely new product or service).
b. Process innovation (the ability to create products or services through new innovations).

Business performance was adopted from Wang & Feng (2012) using the dimensions of profitability, sales growth, market share, and customer satisfaction.

Each construct was measured using multiple items, which were operationalized using a five-point Likert Scale, ranging from 1 (strongly disagree) to 5 (strongly agree).

2.3. Data Analysis

The primary data obtained from the respondents was analyzed using PLS-SEM to determine the relationships between the constructs. PLS-SEM makes it easy for researchers working with structural equation models. In SEM, the notion of the relationship of various variables is expressed in a picture, both for relatively simple relationships and more difficult ones.

3. RESULT AND DISCUSSION

The first step in the analysis is to evaluate the validity and reliability of the constructs, namely the value of factor loading, composite reliability, convergent validity, and discriminant validity (see Table 1 and Table 2). Table 1 shows that the indicator for each construct has a factor loading value of more than 0.7, and the composite reliability value of each construct is more than 0.7, explaining that the construct has a satisfactory degree of reliability. Furthermore, the AVE value of each construct is more than 0.5, so the construct meets the convergent validity criteria.
Table 1. Factor loadings, validity and reliability.

<table>
<thead>
<tr>
<th>Variables &amp; Indicators</th>
<th>Factor Loading</th>
<th>Composite Reliability</th>
<th>AVE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Business Performance (BP)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>BP1</td>
<td>0.930</td>
<td>0.905</td>
<td>0.706</td>
</tr>
<tr>
<td>BP2</td>
<td>0.894</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BP3</td>
<td>0.796</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BP4</td>
<td>0.725</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Customer Relationship Management (CRM)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>CRM1</td>
<td>0.733</td>
<td>0.893</td>
<td>0.737</td>
</tr>
<tr>
<td>CRM2</td>
<td>0.882</td>
<td></td>
<td></td>
</tr>
<tr>
<td>CRM3</td>
<td>0.946</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Competitive Advantage (CA)</td>
<td></td>
<td>0.920</td>
<td>0.794</td>
</tr>
<tr>
<td>CA1</td>
<td>0.907</td>
<td></td>
<td></td>
</tr>
<tr>
<td>CA2</td>
<td>0.861</td>
<td></td>
<td></td>
</tr>
<tr>
<td>CA3</td>
<td>0.904</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Innovation Capability (IC)</td>
<td></td>
<td>0.847</td>
<td>0.735</td>
</tr>
<tr>
<td>IC1</td>
<td>0.855</td>
<td></td>
<td></td>
</tr>
<tr>
<td>IC2</td>
<td>0.860</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

The discriminant validity test uses the Fornell–Larcker criteria. The test results in Table 2 show that the AVE value is higher than the highest value of the quadratic correlation between constructs (0.635), so the construct meets the criteria of discriminant validity.

Table 2. Discriminant validity.

<table>
<thead>
<tr>
<th>Variables</th>
<th>Business Performance</th>
<th>CRM</th>
<th>Competitive Advantage</th>
<th>Innovation Capability</th>
</tr>
</thead>
<tbody>
<tr>
<td>Business Performance (BP)</td>
<td>0.706*</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>CRM</td>
<td>0.224</td>
<td>0.737*</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Competitive Advantage (CA)</td>
<td>0.469</td>
<td>0.146</td>
<td>0.794*</td>
<td></td>
</tr>
<tr>
<td>Innovation Capability (IC)</td>
<td>0.635</td>
<td>0.131</td>
<td>0.436</td>
<td>0.735*</td>
</tr>
</tbody>
</table>

Note: * AVE value.

The evaluation of the model in this study uses the criteria of the coefficient of determination ($R^2$), $Q^2$ value, and $f$ (Hair, Ringle, & Sarstedt, 2011). $R^2$ describes the level of variance described by the construct, as a measure of the model's prediction accuracy; $Q^2$ is cross-validated redundancy, a measure of predictive relevance of the construct; and $f$ examines the effect size of the path model. In testing the first model for an endogenous competitive advantage variable with an $R^2$ value of 46.9% (see Figure 2), the model has a moderate level of accuracy. The second model test has two endogenous variables, namely CRM and innovation capabilities, and with an $R^2$ value of 46%, the model has a moderate level of accuracy (Hair et al., 2011). The result of the cross-validated redundancy test for the competitive advantage construct is $Q^2 = 0.334$, and the innovation capabilities construct is $Q^2 = 0.088$. Since the $Q^2$ value of each construct is greater than zero, the model has predictive relevance criteria. Furthermore, the value of $f$ for competitive advantage on business performance of 0.883 shows a very large effect, but the effect of CRM on competitive advantage is $f = 0.04$ (very low), while the effect of CRM on innovation capabilities is $f = 0.150$ (the effect size is moderate) (Cohen, 2013).

The next stage is to obtain the test results for the research hypotheses. We view and test the hypotheses by looking at the results of the calculations.

Hypothesis testing is done by looking at the t-value and p-value of each relationship between variables; the hypothesis is supported if the p-value is less than 0.05. Table 3 shows that the relationship between CRM and competitive advantage is positive and significant ($\beta = 0.165$; p-value = 0.006), thus H1 is supported. The relationship between competitive and business performance is positive and significant ($\beta = 0.362$; p-value = 0.000), thus H2 is supported. The relationship of CRM and innovation capability is positive and significant ($\beta = 0.685$; p-
value = 0.000), thus H4 is supported. Innovation capability has a positive and significant relationship with competitive advantage ($\beta = 0.600$; $P$ value = 0.000), thus H5 is supported.

<table>
<thead>
<tr>
<th>Relationship</th>
<th>$\beta$</th>
<th>T-value</th>
<th>P-value</th>
<th>Hypothesis Result</th>
</tr>
</thead>
<tbody>
<tr>
<td>CRM $\rightarrow$ CA</td>
<td>0.165</td>
<td>2.761</td>
<td>0.006</td>
<td>H1 is supported</td>
</tr>
<tr>
<td>CA $\rightarrow$ BP</td>
<td>0.362</td>
<td>20.668</td>
<td>0.000</td>
<td>H2 is supported</td>
</tr>
<tr>
<td>CRM $\rightarrow$ CA $\rightarrow$ BP</td>
<td>0.113</td>
<td>2.687</td>
<td>0.007</td>
<td>H3 is supported</td>
</tr>
<tr>
<td>CRM $\rightarrow$ IC</td>
<td>0.685</td>
<td>6.286</td>
<td>0.000</td>
<td>H4 is supported</td>
</tr>
<tr>
<td>IC $\rightarrow$ CA</td>
<td>0.600</td>
<td>12.669</td>
<td>0.000</td>
<td>H5 is supported</td>
</tr>
<tr>
<td>CRM $\rightarrow$ IC $\rightarrow$ CA</td>
<td>0.217</td>
<td>5.569</td>
<td>0.000</td>
<td>H6 is supported</td>
</tr>
</tbody>
</table>

The results of the analysis also show the role of competitive advantage mediates the relationship between CRM and business performance ($\beta = 0.113$; $P$ value = 0.007), thus H3 is supported. Furthermore, innovation capability mediates the relationship between customer relationship management and competitive advantage ($\beta = 0.217$; $P$ value = 0.000), thus H6 is supported.

The study increases understanding of the effects of CRM on competitive advantage loyalty and its impact on retail business performance in developing countries such as Indonesia. The empirical model is tested by emphasizing customer-based CRM that combines innovation and outcome variables, namely competitive advantage and business performance.

Studies have revealed that CRM has a significant positive relationship with competitive advantage. This explains that retailers who run CRM effectively by identifying, acquiring, and retaining profitable customers, driving increased sales based on customer data analysis, and rebuilding relationships with inactive customers will be able to create and deliver value to customers. The ability to retain customers will be useful in providing a sustainable competitive advantage (Bhat & Darzi, 2016; Chengwu, 2020). Companies that implement CRM will have a competitive advantage, which is difficult for competitors to imitate (Zhang et al., 2017). CRM is critical to competitive advantage by not only acquiring and retaining customers, but also being able to rebuild relationships with inactive customers and leverage customer data analytics to increase sales.

This study also reveals that that competitive advantage will improve business performance. Competitive advantage is the achievement of a company's strategy that is difficult for competitors to imitate, which will give the organization the possibility to choose and implement a strategy that will distinguish the organization from its competitors.
competitors. Retailers that have a competitive advantage must have better product or service quality and be able to provide superior services compared to competitors. Competitive advantage will provide economic value for the company, which competitors do not have (Helfat & Peteraf, 2015), thus developing a competitive advantage will contribute to improving business performance (Rua et al., 2018; Yang et al., 2018; Yasa et al., 2020; Zainol & Al Mamun, 2018). This study provides insight into the mediating role of competitive advantage on the relationship between CRM and business performance. CRM plays a role in increasing competitive advantage and its impact results in an increase in business performance.

Another finding of this study is that innovation capability acts as a partial mediation between CRM and competitive advantage. This is indicated by a significant direct and indirect relationship between CRM and competitive advantage, namely through innovation capabilities. Retailers that implement CRM will encourage efforts to innovate both products and processes. Product innovation is the ability to find completely new products or services, while process innovation is the ability to produce products or services through new methods. If both can be implemented, it will create a competitive advantage for the company. These results are relevant to literature regarding CRM and its ability to increase innovation capability (Lin et al., 2010; Wang et al., 2020).

4. CONCLUSIONS

This study was conducted to test the empirical model that aims to analyze and prove the effect of CRM and innovation on competitive advantage, and their effect on improving retail business performance. The results of the analysis revealed that CRM plays a role in building the competitive advantage of retail companies, and it was also empirically proven that the relationship is mediated by innovation capability. Another finding from the research is that retailers have a competitive advantage over competitors due to improved business performance, and that competitive advantage can be achieved from CRM. So competitive advantage acts as a mediation of the relationship between CRM and business performance.

This study identifies practical implications for retail about the importance of building increasing competitiveness, namely through CRM strategies and innovation capabilities. This requires retail companies to focus on the ability to provide better value to their customers, as well as innovate products, services, and processes. The model in this study can help retail managers to retain their customers through CRM improvement. The theoretical implications of the results of this study have identified the importance of CRM and innovation capabilities as a precursor to competitive advantage, which strengthens academics’ propositions about the importance of CRM, and its impact on the achievement of retail business performance.

The study is limited to retail companies in the East Java region of Indonesia according to the phenomena identified, thus limiting the external generalizability of the results. Research on several types of companies and a wider sample will provide a better level of generalization. In addition, CRM in this study is focused on a strategic perspective, specifically CRM, to create and provide value for customers. Further research can be developed by considering CRM from an operational perspective and include business process automation through technology adoption as well as adopting an analytical perspective relating to the integration of customer data to increase customer and company value.

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