IMPACT OF MARKET INNOVATION STRATEGY ON PERFORMANCE OF DATA SERVICE PROVIDERS IN KENYA

Lazarus N. Nduati  
Jomo Kenyatta University of Agriculture and Technology (JKUAT)

Prof. Mike Iravo (Ph. D)  
Jomo Kenyatta University of Agriculture and Technology (JKUAT)

Dr. Kepha Ombui (Ph. D)  
Jomo Kenyatta University of Agriculture and Technology (JKUAT)


ABSTRACT

In the wake of the 21st century, data and technological based means of communication has been the order of the day in both developed and developing countries. Data service providers stand to be critical in promoting technology based business world hence they are very crucial to the modern economy. However, their performance has always been minimal as evidenced by increased retrenchment and closure of operational doors of some emerging data service providers. On the other hand, market innovation stands to be critical in enhancing firm performance and competitiveness. Through establishment of new markets and new procedures to exploit the existing market, firms are able to enhance their market share and promote performance. However, very little has been done to link market innovation and performance of data services providers hence the purpose of this study. The study was informed by disruptive innovation theory. Descriptive research design was employed and the target population was 316 managers from data service provider companies in Kenya out of which simple random sampling was used to select 177 managers. Primary data was collected using questionnaires while secondary data was collected through reviews of both theoretical and empirical literatures. The collected data was analyzed using the statistical package for social sciences (SPSS) version 23.0. The software was used to produce frequencies, descriptive and inferential statistics which was used to derive generalizations and conclusions regarding the population. The study found that market innovation had a positive and significant influence on the performance of data service providers in Kenya and entrepreneurial orientation had a moderating effect on the relationship between market innovation and performance. The study concluded that as a result of market innovation, performance of data service provider companies in Kenya was deemed possible. The study recommended that managers in data service provider companies should embrace market innovation to steer their performance and competitiveness.

Key Words: Innovation Strategy, Market Innovation, Firm Performance, Data Service Providers.
1.0 INTRODUCTION

Innovation is considered a key strategic element by most organizations and is considered to have a direct effect on organization performance, (Baregheh, Rowley, Vinarski-Peretz & Carmeli, 2011). The ability to innovate has been seen as a key competitive tool in the dynamic-progressive economic environment since the Schumpeterian time. Among the major innovation strategies considered critical is the market innovation. This is concerned about the ability of the firm to come up with new markets and enhance their penetration in the already existing markets through which they gain competitiveness and performance.

Marketing innovation strategies involve the implementation of new marketing methods and models that would significantly change the product design or packaging, product placement or pricing, (Tavassoli & Karlsson, 2015). Marketing innovation strategies are targeted at meeting the customer’s needs and opening up new markets or giving the firm’s products a new position in the market to increase the firm sales hence income. Common marketing innovation strategies include; market pricing strategies, product offers, design properties, product placements strategies and promotion activities. According to Hong (2015), innovative marketing strategies improve brand relationship and experiences with customers by exerting their influence on brand marketing efforts and allowing brands to be customer centric. Market innovation is concerned with noting and adopting changing customer needs.

As business environment changes, the components of customer value are likely to change. As a result, valuable experience creation can be achieved through innovations based on the interactions with the consumer that often requires that firms anticipate future customer needs and the market dynamics. The service firm’s ability to reconfigure the service process and create innovation through the interactions with the consumers remains core to the operational success and competitiveness. Kirzner (2009) compliments the view by arguing that entrepreneurial alertness or recognition of opportunities is a propensity to notice and be sensitive to information about objects, incidents, and patterns of behavior in the environment, with special sensitivity to make and use problems, unmet needs and interests, and novel combinations of resources.

Locally, the government and other stakeholders have been keen to enhance and ensure incorporation of market innovation for better business performance in both private and public corporations. The Government particularly has committed itself to facilitate the identification,
acquisition, transfer, diffusion and application of relevant technology and innovation knowledge in all sectors of the economy. In this regard, the Government seeks the concerted and supportive efforts by all stakeholders in the Kenyan national innovation system to re-engineer structures, institutions and sectorial policies or successful implementation of the technology and innovation policy and strategy (RoK, 2010). The national system of innovation in its broadest conception is the means through which Kenya seeks to acquire, exploit and diffuse knowledge for the achievement of individual and collective goals.

On the same breath, Data service provider companies have been critical in enhancing integration of technology and innovation across the World. In Africa and in Kenya particularly, data provider companies have been on the high notch as every organization whether public or private is turning to technological based operational base so as to secure a better competitive ground. In Kenya, there are a number of these companies with most of them trying to struggle for the market. Most of the companies offer integrated services such as internet, TV and telephone services, Internet transit, domain name registration and hosting, dial-up access, leased line access and server collocation. These are all critical services as far as business performance and adoption of ICT is concerned hence performance of these companies is equally critical.

1.2 Statement of the Problem

In the 21st century, data service remains an important subject that plays a key role in promoting integration of ICT in modern-day business. Data service provider companies therefore stand at the core of enhancing access and connectivity to data. Performance of these companies is therefore critical not only to themselves but also to the economy and other companies as well. Despite the anticipated market expansion and growth of these companies, their performance remains minimal as evidenced by continued recording of low growth rate and profit margin and retrenching to save on costs. Despite the great potential of the data service market in Kenya, observable performance gaps conspicuously exist among individual firms. In addition to performance paradox, revenue and investment in the Data Market excluding data revenues from the mobile sector for year 2016 (CA, 2017), showed that there was a continued drop in investment and revenues from this market. The revenues declined from KES 10,158 Million in 2014 to KES 8,498 million in 2015 while investments recorded declined from KES 3,440 Million in 2014 to KES 2,233 million in 2015 and this downward trend had been observed since 2012.
Empirical studies have revealed a conflicting argument on the relationship between innovation strategies and firm performance. A good number of studies have revealed that innovation strategies significantly contributes to firm performance while others have shown a insignificant relationship between strategic innovation and firm performance. From the evidence herein, it is concretely clear that performance of data service provider companies is a nerve hub to the country’s economy. However, very little has been done to address the performance of these firms as far as research is concerned. The study therefore seeks to fill the existing gaps by unveiling the impact of market innovation on the performance of data service companies in Kenya.

1.3 Objective of the Study

1) To determine the effect of market innovation strategy on the performance of data service providers in Kenya
2) To analyse the moderating effect of entrepreneurial orientation on the relationship between market innovation strategy and performance of data service providers in Kenya.

1.4 Research Hypotheses

1) \( H_0_1 \): Market innovation does not have a significant effect on the performance of data service providers in Kenya
2) \( H_0_2 \): Entrepreneurial orientation has no moderating effect on the relationship between market innovation strategy and performance of data service providers in Kenya.

2.0 LITERATURE REVIEW

2.1 Theoretical Framework

2.1.1 Disruptive Innovation Theory

The disruptive innovation theory was developed by Christensen in 1997. According to Christensen, (1997), in a dynamic and uncertain world, innovation is the key to competitive advantage while Lettice & Thomond, (2006) suggested that it also increases uncertainty and market pressure. Disruptive innovation is “a successfully exploited product, service or business model that significantly transforms the demand and needs of an existing market and disrupts its former key players”, (Lettice & Thomond, 2006).
Lettice, (2006) then again characterizes problematic developments as "… those that create principal changes in the exercises of an association and speak to an expansive takeoff from existing practices". The more extraordinary the advancement, the more troublesome it is to gauge its market acknowledgment and potential, in this way expanding unpredictability. Troublesome advancements change the amusement through assaulting on the current business and offer incredible open doors for new benefit development. Hamel, (2003) affirm that lone radical advancements is a prompt to development. In relation to this study, it was concluded that one of the ways in which data service providers can achieve competitive advantage is through adopting disruptive innovation strategies. These strategies may aptly ensure that firms remain relevant in the current market and that they are able to venture into new markets.

2.2 Conceptual Framework

![Conceptual Framework Diagram]

Figure 2.1: Conceptual Framework

2.3 Empirical Review

Feshchuk, (2017) studied the effect of innovation strategies on the performance of ICT-industry’s companies. The study focused on internal resources, experience on the market, investments and business environment innovations. The sample included 22 ICT companies from North America,
EU and Asia region. The examined data cover period from 2011 to 2015. The study used the mixed research design and found that investments in R&D and business environment have significant impact on the performance of innovative activities. The results suggest that large established ICT companies are less efficient in studied categories than the smaller and younger ICT firms. Moreover, the younger and smaller companies showed higher efficiency in terms of such outcomes and in R&D intensity plus number of published patents.

Simiyu, (2013), conducted a study on market innovations adoption by commercial banks in Kenya. The study findings revealed that commercial banks had adopted several market innovation strategies including creating and nurturing strong brands, aggressive anti-competitors marketing, creating value through pricing, environmental analysis and response to changes, customer satisfaction and retention. In addition, the study established that the banks had adopted product innovation strategies. Aswani (2013), found that strategic innovation in universities is mostly done by the universities continuously engaging in branding and marketing activities. The study results revealed that there was a strong positive relationship between strategic innovation indicators and the performance of the public universities. The results further demonstrated that a large proportion of the public universities performance could be accounted for by combined effect of strategic innovation.

Waweru (2012) carried out a study on the effect of financial innovation on risk management of commercial banks in Kenya. In retrospect the study concluded that financial innovations have exposed commercial banks in Kenya to various market risks e.g. credit risks, liquidity risk, interest rate risk and compliance risks. The researcher opined that the risks should inform overall risk management of institutions through realistic risk index factors at any period. The researcher recommended a more robust risk mitigation practices and policies to ensure that all elements of risks are captured in the risk index factors of commercial banks.

Anderson, Covin, & Slevin (2009) explored the relationship between strategic learning capability, a firm's proficiency at generating, and then acting on, strategic knowledge and entrepreneurial orientation (EO). While theory posited the inevitability of building strategic learning capability from behaving entrepreneurially, there was found little empirical research to validate this proposition and even less understanding of how and why entrepreneurial orientation contributes to strategic learning capability. Empirical results from 110 manufacturing firms confirmed the
direct effect of entrepreneurial orientation on strategic learning capability, and support was found for three constructs, structural organicity, market responsiveness, and strategy formation mode that fully mediate the entrepreneurial orientation strategic learning capability relationship.

3.0 RESEARCH METHODOLOGY

3.1 Research Design

The study adopted descriptive research design which is a method of collecting data by interviewing or administering a questionnaire to a sample of individuals which can be used when collecting information about peoples’ attitudes, opinions, habits or any other social issues. The design is useful in describing the features of a population that has been earmarked for study and to provide answers to research questions.

3.2 Target Population

The target population comprised of 316 managers of all the data service providers in Kenya (Communication Authority of Kenya, 2018). The managers were selected since they had a clear and comprehensive understanding of their firms’ innovation strategies.

3.3 Sampling

The sampling frame for the study comprised all the managers from all the 35 Data service providers. The choice of managers was justified as the sampling units because they had a clear and comprehensive understanding of their firms’ innovation strategies.

Sloven's formula was used to calculate the sample size (n) given the population size (N) and a margin of error (e). It’s a random sampling technique formula to estimate sampling size (n). According to Yamane (1967) where n is the sample size, N is the population size and e is the level of precision at 95% confidence level n is computed as follows:
\[ n = \frac{N}{1 + N(e)^2} \]

N = Target population, (316)
e = the level of precision, 5%

Where \( n \) is the sample size,

\[ n = \frac{316}{1+316 \times (0.05)^2} \]

\[ n = \frac{316}{1.79} \]

n= 177

Therefore, the sample size was 177

3.4 Data Collection Instruments

The study used both primary and secondary data. The choice of the instrument used was influenced by the nature of the problem in the Data Service Providers and dictated by the availability of time and budget just as observed by Cooper and Schindler (2011). This study collected primary data through the use of questionnaires. Kothari, (2008) observes that collecting data through the questionnaires saves time since it is possible to collect huge amount of information especially when the population of interest is large.

3.5 Data Collection Procedures

Data collection procedure that was chosen by the study was determined by the objectives of the current study. The questions addressed by questionnaires sought to identify the effect of innovation strategies on Data Service Providers in Kenya. Questionnaires were distributed to the target population. Prior to conducting questionnaire interviews on the selected respondents, letters requesting for permission were distributed to respondents. Through the help of the research assistants, a total of 177 questionnaires were administered to the selected respondents.
Questionnaires were self-completion questionnaire administered by researcher with the help of research assistants. Respondents were asked to anonymously complete the questionnaire for immediate collection.

3.6 Data Analysis and Presentation

A multiple linear regression model was used to measure the relationship between the independent variables and the dependent variable. Multi-linear regression model is a statistical tool which allows for the prediction of response variables based on a set of independent variables. In this study, data collected using questionnaires was coded, verified for completeness and accuracy and then analyzed using quantitative approaches to derive descriptive statistics/outputs. This study used the Statistical Package for Social Scientists (SPSS version 23) to process the data. The software was used to produce frequencies, descriptive and inferential statistics which were used to derive generalizations and conclusions regarding the population. Quantitative data analysis allowed the study to make inferences by objectively and systematically identifying specified characteristics of data flow.

The following regression equation model was used to test the statistical significance of the study hypotheses:

Régression Model

\[ Y = \beta_0 + \beta_1 X_1 + \varepsilon \]  
Equation (i)

Where:

\( Y \) = Performance

\( X_1 \) = Market Innovation

\( \beta_0, \beta_1, \) = Regression coefficients of changes included in \( Y \) by each \( X \) value

\( \varepsilon \) = Error term which is normally distributed with a mean and variance of zero.

The moderating variable in this study was entrepreneurial orientation. To determine the presence of moderating effect, the OLS model was compared with the MMR model. Equation (ii) shows the Ordinary Least Squares (OLS) regression equation model predicting \( Y \) scores from the first-order effects of \( X \) and \( Z \) observed scores.

\[ FP = \beta_0 + \beta_1 Z + \varepsilon \]  
Equation (ii)
4.0 RESEARCH FINDINGS AND DISCUSSION

4.1 Response Rate

The sample size for the study consisted of 177 respondents from 316 managers of Data Service Providers in Kenya. Out of 177 respondents that formed the sample size, 120 questionnaires were returned correctly filled representing a response rate of 68%. This response rate was appropriate representation of respondents in providing information for analysis and conclusions.

4.2 Descriptive Analysis

4.2.1 Market Innovation Strategies

The study sought to investigate how market innovation strategies influence performance of Data Service Providers. The respondents were asked to indicate whether market innovation strategies influence performance. From the findings as shown in table 4.1, all the respondents who participated in the study (100%) agreed that market innovation strategies influence performance of Data Service Providers.

<table>
<thead>
<tr>
<th>Influence of Innovation Strategies</th>
<th>Frequency</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yes</td>
<td>120</td>
<td>100.0</td>
</tr>
</tbody>
</table>

The study also sought to understand the extent to which market innovation strategies influence firm performance. The findings are presented in figure 4.1 below. From the findings, majority of the respondents (50.8%) indicated that market innovation strategies influenced firm performance to a moderate extent, 46.7% indicated that market innovation strategies influenced firm performance to a great extent while 2.5% of the respondents said that market innovation strategies influenced firm performance to a small extent.
The study also sought to determine the influence of market innovation strategies on performance of Data Service Providers. The response was rated on a scale of 1-5 on which: 1= strongly disagree, 2= disagree, 3= neither agree or disagree, 4= agree and 5= strongly agree. Table 4.2 below shows the descriptive statistics describing the data in details. From the findings, majority of the respondents in the study agreed with the statement that listening to customers’ opinion is key to effective market innovation strategies as shown by a mean score of 4.08. on the other hand, respondents agreed that new product pricing is important in the realization of effective market innovation strategies as shown by a mean score of 4.29. A majority of the respondents widely held the opinion that new product design is important in the realization of effective market innovation strategies as shown by a mean score of 4.25. The level of agreement was also extended to other statements as follows: The company focuses on the market in which it has competitive strength as shown by a mean score of 4.24. New product promotion techniques are important in realization of effective marketing strategies as shown by a mean score of 4.35. Product replacement is important in the realization of effective marketing strategies as shown by a mean score of 4.32 and application of changing market orientation is an effective market innovation strategy as shown by a mean score of 4.42. This is summarized in table 4.10 below.
Table 4.2: Market innovation Strategies and Performance

<table>
<thead>
<tr>
<th>Statement</th>
<th>Mean</th>
<th>Std. Dev.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Listening to customers opinion is key to effective market innovation</td>
<td>4.08</td>
<td>.751</td>
</tr>
<tr>
<td>New product pricing is important to effective market innovation</td>
<td>4.29</td>
<td>.824</td>
</tr>
<tr>
<td>New product design is important to realize effective market innovation</td>
<td>4.25</td>
<td>.713</td>
</tr>
<tr>
<td>Company focuses on market which has competitive strength</td>
<td>4.24</td>
<td>.733</td>
</tr>
<tr>
<td>New product promotion techniques are important in realization of effective marketing strategies</td>
<td>4.35</td>
<td>.718</td>
</tr>
<tr>
<td>Product replacement is important to market strategy</td>
<td>4.22</td>
<td>.909</td>
</tr>
<tr>
<td>Application of changing market orientation</td>
<td>4.42</td>
<td>.762</td>
</tr>
</tbody>
</table>

4.2.2 Entrepreneurial Orientation

The study sought to investigate how entrepreneurial orientation influence performance of Data Service Providers. The respondents were asked to indicate whether entrepreneurial orientation influence performance Data Service Providers. From the findings as indicated in table 4.3, majority of the respondents (93.3%) agreed that entrepreneurial orientation influence performance of Data Service firms while only 6.7% of the respondents said that entrepreneurial orientation does not influence performance.

Table 4.3: Entrepreneurial Orientation

<table>
<thead>
<tr>
<th>Influence of Entrepreneurial Orientation on Performance</th>
<th>Frequency</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yes</td>
<td>112</td>
<td>93.3</td>
</tr>
<tr>
<td>No</td>
<td>8</td>
<td>6.7</td>
</tr>
<tr>
<td>Total</td>
<td>120</td>
<td>100.0</td>
</tr>
</tbody>
</table>

The study sought to determine the influence of entrepreneurial orientation on the performance of Data Service Providers. The response was rated on a scale of 1-5 on which: 1= strongly disagree, 2= disagree, 3= neither agree or disagree, 4= agree and 5= strongly agree. Table 4.4 below shows
the descriptive statistics describing the data in details. Through entrepreneurial orientation, the firm is able to influence market environment as shown by a mean score of 4.12. Further, majority of the respondents in the study agreed with the following statements: Entrepreneurial orientation facilitates the firm to penetrate into new ventures as shown by a mean score of 4.11. Through entrepreneurial orientation, the firm is able to adopt new technologies as shown by a mean score of 4.27 and moreover, through entrepreneurial orientation, the firm is able to introduce new processes as shown by a mean score of 4.33.

**Table 4.4: Entrepreneurial Orientation and Performance**

<table>
<thead>
<tr>
<th>Statement</th>
<th>Mean</th>
<th>Std. Dev.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Introduce new product/service through orientation</td>
<td>3.95</td>
<td>.829</td>
</tr>
<tr>
<td>Anticipate the future through orientation</td>
<td>4.12</td>
<td>.852</td>
</tr>
<tr>
<td>Influence market environment</td>
<td>4.12</td>
<td>.871</td>
</tr>
<tr>
<td>Penetration into new ventures</td>
<td>4.11</td>
<td>.838</td>
</tr>
<tr>
<td>Source for external finances</td>
<td>4.10</td>
<td>.929</td>
</tr>
<tr>
<td>Adopt new technologies</td>
<td>4.27</td>
<td>.857</td>
</tr>
<tr>
<td>Introduce new processes</td>
<td>4.33</td>
<td>.909</td>
</tr>
</tbody>
</table>

**4.2.3 Performance of Data Service Providers**

The researcher sought to assess the performance of the Data Service Providers. The respondents were asked to indicate the effectiveness of the process innovation, product innovation, market innovation and technological innovation strategies in influencing performance of the Data Service Providers. From the findings as shown in table 4.5, 45.8% of the respondents indicated that process innovation strategies were most effective in influencing performance, 42.5% of the respondents said that product innovation strategies were most effective in influencing performance, 35.8% of the respondents said that market innovation strategies were most effective in influencing performance and 46.7% of the respondents said that technological innovation strategies were most effective in influencing performance.
Table 4.5: Effectiveness of Innovation Strategies

<table>
<thead>
<tr>
<th>Innovation Strategy</th>
<th>Most effective</th>
<th>Effective</th>
<th>Neutral</th>
<th>Least effective</th>
</tr>
</thead>
<tbody>
<tr>
<td>Process innovation</td>
<td>45.8%</td>
<td>27.5%</td>
<td>11.7%</td>
<td>15.0%</td>
</tr>
<tr>
<td>Product innovation</td>
<td>42.5%</td>
<td>20.8%</td>
<td>17.5%</td>
<td>19.2%</td>
</tr>
<tr>
<td>Market innovation</td>
<td>35.8%</td>
<td>18.3%</td>
<td>15.8%</td>
<td>30.0%</td>
</tr>
<tr>
<td>Technological innovation</td>
<td>46.7%</td>
<td>12.5%</td>
<td>14.2%</td>
<td>26.7%</td>
</tr>
</tbody>
</table>

Table 4.6: Performance of Data Service Providers

<table>
<thead>
<tr>
<th>Statement</th>
<th>Mean</th>
<th>Std. Dev.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Product innovation Improve profitability</td>
<td>4.07</td>
<td>.742</td>
</tr>
<tr>
<td>Process innovation Improve profitability</td>
<td>4.23</td>
<td>.775</td>
</tr>
<tr>
<td>Improvement in innovation increase sales</td>
<td>4.09</td>
<td>.789</td>
</tr>
<tr>
<td>Modern technology service delivery</td>
<td>4.23</td>
<td>.772</td>
</tr>
<tr>
<td>Customer satisfaction goal adoption of innovation</td>
<td>4.31</td>
<td>.731</td>
</tr>
<tr>
<td>Efficiency in service delivery</td>
<td>4.55</td>
<td>.708</td>
</tr>
</tbody>
</table>

4.3 Inferential Analysis

4.3.1 Correlation Analysis

This study sought to establish whether there was any form of correlation between market innovation strategies and performance of Data Service Providers in Kenya. The findings are summarized in Table 4.7. From the table, a positive correlation coefficient of .521 (or 52.10%) existed between market innovation strategies and performance of Data Service Providers. The existence of positive correlation highlights the importance of market innovation strategies contribution in influencing performance of Data Service Providers. This is in line with study findings by Hong (2015), that innovative marketing strategies improve brand relationship and experiences with customers by exerting their influence on brand marketing efforts and allowing brands to be customer centric which is critical in developing a profitable business.
Table 4.7: Correlation between Market Innovation Strategies and Performance

<table>
<thead>
<tr>
<th>Market Innovation Strategies</th>
<th>Pearson Correlation</th>
<th>Performance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sig. (2-tailed)</td>
<td>.000</td>
<td></td>
</tr>
<tr>
<td>N</td>
<td>120</td>
<td>120</td>
</tr>
</tbody>
</table>

4.3.2 Testing Hypothesis one

The results presented in table 4.8 present the fitness of model used of the regression model in explaining the study phenomena. Market innovation strategies explained 49.9% of the performance of Data Service Providers in Kenya.

Table 4.8: Model Fitness

<table>
<thead>
<tr>
<th>Model</th>
<th>R</th>
<th>R Square</th>
<th>Adjusted R Square</th>
<th>Std. Error of the Estimate</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>.670</td>
<td>.449</td>
<td>.436</td>
<td>.35705</td>
</tr>
</tbody>
</table>

Table 4.9 provides the results on the analysis of the variance (ANOVA). The results indicate that the overall model was statistically significant as supported by a p value of 0.015 which is less than the critical p value of 0.05. This implying that market innovation strategies is a good predictor of the performance of Data Service Providers.

Table 4.9: Analysis of Variance

<table>
<thead>
<tr>
<th>Model</th>
<th>Sum of Squares</th>
<th>df</th>
<th>Mean Square</th>
<th>F</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Regression</td>
<td>.770</td>
<td>1</td>
<td>.770</td>
<td>6.042</td>
</tr>
<tr>
<td></td>
<td>Residual</td>
<td>15.043</td>
<td>118</td>
<td>.127</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>15.813</td>
<td>119</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Regression of coefficients results in table 4.34 shows that there is a positive significant relationship between market innovation strategies and the performance of Data Service Providers. The results indicate that the overall model was statistically significant as supported by a p value of 0.005 which is less than the critical p value of 0.05. This therefore imply that product innovation strategies are a good predictor of the performance of Data Service Providers as shown by a p value of 0.015 which is less than the critical p value of 0.05. This was supported by the t values whereby \( t_{cal}=2.456 > t_{critical}=1.96 \) at a 95 percent confidence level which depicts that we reject the null hypothesis and accept the alternative hypothesis. This implies that market innovation strategies influence the performance of Data Service Providers.

The findings are in congruence with the study by Simiyu, (2013), on market innovations adoption by commercial banks in Kenya. The study findings revealed that commercial banks had adopted several market innovation strategies including creating and nurturing strong brands, aggressive anti-competitors marketing, creating value through pricing, environmental analysis and response to changes, customer satisfaction and retention. As an outcome, the study found out that the said strategies had helped banks earn incremental profit, faster business growth, and improved firm’s productivity.

**Table 4.10: Regression Coefficients**

<table>
<thead>
<tr>
<th>Model</th>
<th>Unstandardized Coefficients</th>
<th>Standardized Coefficients</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 (Constant)</td>
<td>2.640</td>
<td>.318</td>
</tr>
<tr>
<td>Market Innovation</td>
<td>.210</td>
<td>.085</td>
</tr>
<tr>
<td>Strategies</td>
<td></td>
<td>.221</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>t</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td>(Constant)</td>
<td>8.305</td>
<td>.000</td>
</tr>
<tr>
<td>Market Innovation Strategies</td>
<td>2.458</td>
<td>.015</td>
</tr>
</tbody>
</table>
4.3.3 Moderating effect of Entrepreneurial Orientation

Table 4.11: Moderating Effect

<table>
<thead>
<tr>
<th>Independent variable</th>
<th>Model 1</th>
<th></th>
<th></th>
<th>Model 2</th>
<th></th>
<th></th>
<th>Model 3</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Beta</td>
<td>t</td>
<td>P-value</td>
<td>Beta</td>
<td>t</td>
<td>P-value</td>
<td>Beta</td>
<td>t</td>
<td>P-value</td>
</tr>
<tr>
<td>(Constant)</td>
<td>.202</td>
<td>4.348</td>
<td>.012</td>
<td>.236</td>
<td>2.309</td>
<td>.063</td>
<td>.034</td>
<td>1.426</td>
<td>.160</td>
</tr>
<tr>
<td>Market Innovation Strategy</td>
<td>.235</td>
<td>4.890</td>
<td>.000</td>
<td>.229</td>
<td>6.515</td>
<td>.000</td>
<td>.317</td>
<td>6.640</td>
<td>.000</td>
</tr>
<tr>
<td>Entrepreneurial Orientation</td>
<td>.023</td>
<td>1.043</td>
<td>.348</td>
<td>.046</td>
<td>1.108</td>
<td>.022</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Interaction Effect</td>
<td></td>
<td></td>
<td></td>
<td>.284</td>
<td>3.707</td>
<td>.030</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

The results show that all the market innovation strategy (independent variables) had a significant influence on performance of Data Service Providers in Kenya. The coefficients also showed a positive relationship between all the variables and performance of Data Service Providers in Kenya. This is according to the significance values and the coefficients obtained against each variable.

CONCLUSION

The study singled out customer involvement as a kind of interactivity innovation, that can drive service firms to create environment that involve customers in the service delivery processes. The success of such initiative can allow data-service firms to provide innovative experiences that enhance customer value. Value is produced out of the interaction with the customer who is the target of service innovations. This interactive configuration created out of the collaboration is enabled through an innovative service system. Therefore, data-service firms must look for interactivity innovations within the service system which creates competitive value. This value innovation in data-service firms may come in the form of customization, timing and involvement of value innovations.
RECOMMENDATION

The study recommends market innovation strategies in the context of listening to customers’ opinion as helping tool in customizing value innovation which can be furthered by altering service products, process and personnel structure to meet customers special needs in specific use situations. Moreover, the study recommends firms to offer their products by focusing on the market in which it has competitive strength while applying changing market orientation to reflect mutating business environment plus changing components of customer value. Therefore, the study recommends creating valuable experience through innovations based on the interactions with the consumer.

The study found that in the joint model with the innovation strategies, entrepreneurial orientation had a significant direct influence on performance of Data Service Providers in Kenya. To this end, the study recommends managers to encourage entrepreneurial behavior through recognition and subsequent exploitation of entrepreneurial opportunity within employees. This may be put achieved by screening for entrepreneurial behavior and potential during recruitment of new staff. Managers can as well upgrade employees existing levels of entrepreneurial potential through case scenario training programs by use of real-world entrepreneurial success case studies. Summing up, the study recommends entrepreneurial orientation programs to enable firms penetrate into new ventures, introduce new processes, source for external finances and to adopt new technologies.
REFERENCES


Communication Authority of Kenya, (2017)


