The Influence of Product Innovation and Prices on The Purchase Intention of Vivo Handphone Products in Anita Posel Pancur Batu Store

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Abstract
This study aims to find out whether Product Innovation has a significant effect on the intention to buy vivo cellphone products at the Pancur Batu anita cellphone shop, and to find out whether the price has a significant effect on the purchase intention of vivo cellphone products at the Pancur Batu cellphone anita store. The population in this research is the consumer of anita handphone shop. The sample in this study was 71 respondents using multiple linear regression analysis. The results of this study can be seen that Product Innovation (X1) has a significant positive effect on the purchase intention of vivo cellphone products at the Pancur Batu cellphone anita store. Price (X2) has a significant positive effect on the purchase intention of vivo cellphone products at the Pancur Batu cellphone anita store.

Keywords: Product Innovation; Price; Purchase Intention

INTRODUCTION

Currently the public’s demand for smartphones is increasing and this provides a huge opportunity for smartphone manufacturers to continue to make new innovations in the manufacture of these smartphones. Starting from a better form, applications and features that are completer and more sophisticated also make people happy and satisfied with the results that have been produced. (Hasibuan, H, 2020; Izar, Nasution, and Ratnasari, 2020; Tarigan, 2017; Tarigan, 2016).

Innovation is creating new products and services that are of value to customers in a way that is supported by a sustainable and profitable business model. (Atrizka et al., 2020; Danilwan et al., 2020; Hutagalung, 2020; Saragih et al., 2020; Silitonga et al., 2020). One of the reasons for this is because many mobile phones are starting to innovate a lot, especially in a very advanced era, plus consumer decisions are starting to be varied and critical in making purchasing decisions, especially since the variety of mobile phone competitors is already very diverse. (Candrasa et al., 2020; Danilwan et al., 2020; Harahap, 2020; Kumar et al., 2015; Sibuea et al., 2020).

Here, Vivo continues to innovate in various functions and forms, such as finger print display applications, water resistance, which are only owned by Vivo phones to attract consumers’ attention. Vivo also continues to innovate so as not to lose to its competitors by displaying its newest products and being able to meet consumer tastes that are always evolving and changing. (Pratama, 2022; Susilawati et al., 2021; Tarigan, 2020; Wardhani et al., 2022).

In addition to product innovation, price also affects consumers’ purchase intentions. Price is the amount of money that consumers have to pay to get a product or service. (Pratami et al., 2022; Yuvira et al., 2021). Price is one of the factors that must be controlled in a harmonious and in line with the goals to be achieved by a company. Price is also a consideration for consumers in choosing the product to be used, currently many communication companies are competing to produce mobile phones whose features are quite complete and attractive at very competitive prices in each class, products that carry out the same innovation but set a price. A relatively cheap product will provide a higher value to its customers and generate purchase intentions for the product. (Aribowo et al., 2020; Danilwan et al., 2020; Pratama et al., 2019; Saragih et al., 2020; Sujianto et al., 2020; Tambunan et al., 2018).

<table>
<thead>
<tr>
<th>Cellphone type</th>
<th>Vivo cell phone price</th>
</tr>
</thead>
<tbody>
<tr>
<td>Vivo Y11</td>
<td>Rp.1,799,000</td>
</tr>
<tr>
<td>Vivo Y19</td>
<td>Rp.3,199,000</td>
</tr>
<tr>
<td>Vivo Z1 Pro</td>
<td>IDR 3,499,000</td>
</tr>
<tr>
<td>Vivo V17 Pro</td>
<td>Rp. 4,999,000</td>
</tr>
<tr>
<td>Vivo S1 Pro</td>
<td>Rp. 3,699,000</td>
</tr>
<tr>
<td>Vivo V19</td>
<td>Rp. 3,999,000</td>
</tr>
<tr>
<td>Vivo Y51</td>
<td>Rp. 3,599,000</td>
</tr>
</tbody>
</table>

From the data above, we see that there are various types of vivo cellphones with relatively stable prices, these prices are made according to the specifications of the vivo cellphone itself. As for the city of Medan, especially in Pancur Batu, there is an Anita Ponesl shop which is one of the shops that sells various brands of cellphones and cellphone accessories which is located on Jalan Jamin Ginting, Pancur Batu District. This shop was founded in 2015 and has been operating for 5 years until now, the background of the establishment of this cellphone shop is to provide experience in the business field and create business fields for the community and be able to serve the community well and there are many people around who buy various brands of cellphones in the anita cellphone store, including vivo. (Lovenda et al., 2020; Tarigan, 2018)

The specific objectives of the research can be explained as follows:
1. To find out the effect of innovation on the intention to buy vivo cellphone products at the Pancur Batu Anita cellphone shop.
2. To find out the effect of price on the intention to buy vivo cellphone products at the Pancur Batu Anita cellphone shop.
3. To find out the effect of innovation and price on the intention to buy vivo cellphone products at the Pancur Batu Anita cellphone shop.

**RESEARCH METHOD**

This research is entitled the effect of innovation and price on the purchase intention of vivo handphone products in anita handphone pancur batu. This research is quantitative descriptive. Descriptive quantitative research collects data in order to be able to test the proposed hypothesis or to answer questions about the state/status of the subjects studied. Typical descriptive research is to find out attitudes, opinions (opinions), demographic information, circumstances, and procedures (Sigit, 2001; Tarigan et al., 2021; Tarigan et al., 2020).

**A. Data analysis technique**

1. Multiple Linear Regression Analysis is used to determine a relationship between the independent variables (distribution costs and distribution channels) to the dependent variable (sales).

2. Classic assumption test
   
   a. Normality test is carried out in research to determine whether the data is given normally or not.
   
   b. Heteroscedasticity test is used to determine whether there is a comparison between one variable and another.

   c. The multicollinearity test was carried out to see whether or not there was interference with the data, where multicollinearity occurred, if there was a correlation between independents.

3. Partial test (t test) was conducted to find out partially whether there is a positive and significant effect between the independent variable (X) on the dependent (Y). The t test is declared significant if, if the value of sig < 0.05 or t count > t table, then there is a partial effect of the X variable on the Y variable. If the sig value > 0.05 or t count < t table, then there is no effect of the variable X partially to the Y variable.

4. Simultaneous significant test (Test–F) was used to determine the effect of the variable independent (X) simultaneously on the variable dependent (Y). The F test is declared
significant if, if the value of sig < 0.05 or F count > F table, then there is a simultaneous influence of the X variable on the Y variable. If the sig value > 0.05 or F count < F table, then there is no effect of the variable X simultaneously on the Y variable.

5. The coefficient of determination test (R^2) aims to find out how much influence the variable independent (X) simultaneously on the variable dependent (Y).

RESULT AND DISCUSSION
1. Normality test

Kolomogorov Smirnov, in this test the guidelines used in decision making are:

a. If the Asymp sig value > 0.05 then the data is normally distributed.

b. If the value of Asymp sig < 0.05 then the data is not normal.

<table>
<thead>
<tr>
<th>Table 2. One-Sample Kolmogorov-Smirnov Test</th>
</tr>
</thead>
<tbody>
<tr>
<td>Normal Parameters, b</td>
</tr>
<tr>
<td>N</td>
</tr>
<tr>
<td>Std. Deviation</td>
</tr>
<tr>
<td>Absolute</td>
</tr>
<tr>
<td>Most Extreme Differences</td>
</tr>
<tr>
<td>Negative</td>
</tr>
<tr>
<td>Kolmogorov-Smirnov Z</td>
</tr>
<tr>
<td>a. Test distribution is Normal.</td>
</tr>
<tr>
<td>b. Calculated from data.</td>
</tr>
</tbody>
</table>

Based on the table above, the significant value of 0.776 is greater than 0.05, so it can be concluded that the data that the researcher tested was normally distributed.

2. Heteroscedasticity Test

Based on the results of the heteroscedasticity test shows that the points spread above and below the number 0 on the Y axis. It does not collect in only one point and the spread of points does not form a pattern, it can be concluded that there is no heteroscedasticity.

3. Multicollinearity Test

Based on the table, it can be seen that the tolerance value for product innovation and price = 0.924 > 0.10 while the VIF value for product innovation and price = 1.078 < 10. Therefore, this
shows that there is no correlation between the independent variables or there is no multicollinearity.

Table 3. Multicollinearity Test Results

<table>
<thead>
<tr>
<th>Model</th>
<th>Unstandardized Coefficients</th>
<th>Standardized Coefficients</th>
<th>Collinearity Statistics</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B</td>
<td>Std. Error</td>
<td>Beta</td>
</tr>
<tr>
<td>(Constant)</td>
<td>9.294</td>
<td>4.498</td>
<td>.2067</td>
</tr>
<tr>
<td>Product Innovation</td>
<td>.429</td>
<td>.138</td>
<td>.314</td>
</tr>
<tr>
<td>Price</td>
<td>.536</td>
<td>.144</td>
<td>.376</td>
</tr>
</tbody>
</table>

a. Dependent Variable: Purchase Intention

4. Multiple Linear Regression Analysis

Table 4. Multiple Linear Regression Calculation Results

<table>
<thead>
<tr>
<th>Model</th>
<th>Unstandardized Coefficients</th>
<th>Standardized Coefficients</th>
<th>T</th>
<th>Sig.</th>
</tr>
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</tr>
<tr>
<td>Price</td>
<td>.536</td>
<td>.144</td>
<td>.376</td>
<td>3.711</td>
</tr>
</tbody>
</table>

The table above produces multiple linear regression equations between independent variables on related variables as follows:

\[ Y = 9.294 + 0.429X_1 + 0.536X_2 + e \]

a) Constant \( (\alpha) = 9.294 \), which means that if the product innovation variable \( (X_1) \) and price \( (X_2) = 0 \), then the purchase intention \( (Y) \) is 9.294. This shows that the constant value has a positive effect on the \( Y \) variable.

b) The product innovation coefficient \( (X_1) = 0.429 \), which means that if product innovation \( (X_1) \) increases by one percent, it will have the effect of increasing purchase intention \( (Y) \) by 42.9%. This shows that product innovation \( (X_1) \) has a positive effect on purchase intention \( (Y) \).
c) The price coefficient ($X_2$) = 0.536, which means that if the price ($X_2$) increases by one percent, it will have an effect on purchase intention ($Y$) of 53.6%. This shows that the price ($X_2$) has a positive effect on purchase intention ($Y$).

5. Partial Test (t Test)

![Table 5. t test results](image)

In table 4.28 it can be seen that the product innovation sig value = 0.003, where 0.003 <0.05 and the t-count value 3.100 > t table 1.99547, so it can be concluded that H1 is accepted which means that there is a partial effect of product innovation on purchase intention. It can also be seen that the value of price sig = 0.000, where 0.000 <0.05 and t count 3.711 > t table 1.99547, so it can be concluded that H2 is accepted which means that there is a partial price effect on purchase intention.

6. F Test (Simultaneous Test)

![Table 6. F Test Results](image)

Based on table 4.29 above, it can be seen that the sig value for the effect of product innovation and price simultaneously on purchase intention is 0.000, where 0.000 <0.05 and the F-count value 15.935 > F-table 3.132, it can be concluded that H3 is accepted which means there is the effect of product innovation and price simultaneously influence the purchase intention.

7. Coefficient of Determination R²

![Table 7. Coefficient of Determination Test Results](image)
Based on the table above, it is known that the R square value is 0.304, this means that the effect of product innovation and price simultaneously on purchase intention is 30.4%. While 69.6% is influenced by other variables not found in this study.

CONCLUSION

Based on the results of the discussion in the previous chapter, it can be concluded that:
1. Partially, product innovation has a significant effect on the purchase intention of Vivo Mobile at the Anita Ponsel Pancur Batu Store. This is evidenced by the t-count value 3.100 > t-table 1.99547 and the significant value of product innovation 0.003 <0.05.
2. Partially, the price has a significant effect on the purchase intention of Vivo Mobile at the Anita Ponsel Pancur Batu store. This is evidenced by the t-count value of 3.711 > t-table 1.993 and a significant value of 0.000 <0.05
3. Simultaneously product innovation and price have a significant effect on the purchase intention of Vivo Mobile at the Anita Ponsel Pancur Batu Store. This is evidenced by the F-count 15.935 > F-table 3.12 and a significant value of 0.000 <0.05.

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