UNDERSTANDING INDONESIAN CONSUMER’S INTENTION TO PURCHASE ORGANIC FOOD PRODUCTS: THE MODERATING ROLE OF PRICE SENSITIVITY

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ABSTRACT

As climate change is one of the major challenges of our time, green products that benefit sustainable production, such as organic agriculture is not only a trend but a necessity. The purpose of this study was to investigate consumer’s value perceptions and their intentions to purchase organic food products. In addition, the study examined the moderating role of price sensitivity between perceived value and purchase intention. Survey data from 203 people in the Jabotabek were used to test our hypotheses, We found that only one value (emotional) had a significantly positive effect on organic food product purchase intention. The moderating effect of purchase experience was found only on the path between emotional value and organic food product purchase intention. The findings offer implications for academics, practitioners, and marketers in determining strategies that encourage people to purchase organic food products. We conclude that marketers should design strategies that maximize that emotional value of organic food products.

Keywords: Functional value; emotional value; social value; green value; price sensitivity; organic food purchase intention.

ABSTRAK

Seiring dengan perubahan iklim yang menjadi salah satu tantangan utama pada masa ini, produk ramah lingkungan yang memiliki manfaat berkelanjutan, seperti produk pertanian organik, tidak hanya sebagai tren tetapi menjadi suatu kebutuhan. Tujuan dari penelitian ini adalah untuk meneliti persepsi nilai konsumen pada niat konsumen dalam membeli produk makanan organik. Selain itu, penelitian ini juga meneliti peran moderasi sensitivitas harga antara persepsi nilai konsumen dan niat konsumen dalam membeli produk makanan organik. Data yang digunakan untuk menguji hipotesis dalam penelitian ini terdiri dari 203 orang sampel di Jabotabek. Hasil penelitian menunjukkan bahwa hanya satu persepsi nilai yaitu emosional yang memiliki pengaruh yang signifikan dan positif terhadap niat pembelian produk makanan organik. Efek moderasi dari pengalaman pembelian hanya diteliti pada nilai emosional dan niat pembelian produk makanan organik. Temuan ini menawarkan implikasi bagi akademisi, praktisi, dan pemasar dalam menentukan strategi yang dapat mendorong konsumen untuk membeli produk makanan organik. Berdasarkan hasil penelitian ini, kami menyarankan bahwa penelitian harus merancang strategi yang memaksimalkan nilai emosional produk dalam memasarkan produk makanan organik.

Kata kunci: nilai fungsional, nilai emosional, nilai sosial, nilai hijau, sensitivitas harga, dan niat membeli pada produk makanan organik.
INTRODUCTION

Over the past few years, consumption style of the society tends to show a negative trend in terms of environmental sustainability. In the last 30 years, 1% of natural forests in Sumatera are lost every year to fulfill consumer needs for tissue, paper, and palm oil production (WWF Indonesia, 2015). The value of water deficit in Java continues to increase at this time which in 2015 has reached minus 134 million cubic meters per year and 75% of Indonesia’s fishery resources are on the threshold of sustainability due to destructive and exploitative fisheries practices to meet world market demands (WWF Indonesia, 2015). If the current trends continue, and the world fails to enact solutions that improve patterns of production and consumption, then the state of the world’s environment will continue to decline.

To prevent the environmental deterioration caused by over consumption, government and some pro-environmental organizations try to devise more sustainable growth pathways that are supposed to preserve the environment. One of them is by encouraging a more environmentally friendly agricultural system that is currently known as organic farming. Organic farming is an agricultural cultivation technique that rely on natural ingredients without using synthetic chemicals such as synthetic pesticides and chemical fertilizers (Silitonga & Salman, 2014). The main objective of organic farming is to provide agricultural products, especially food that is safe for the health of producers and consumers and also does not damage the environment (Silitonga & Salman, 2014). The development of organic food is quite good, especially in European countries. The organic agriculture sector in the European Union is increase up to 30% in 2010 from all agricultural areas, which in 2005 the organic agriculture sector reached 10% of the entire agricultural area. Britain as one of the market leaders of organic food in Europe has market value of 1.2 billion pounds in 2003 or about half of other market leaders such as Germany (Padel & Foster, 2005).

In Indonesia, organic food purchases are still relatively low. YLKI research survey results (2012) of 609 respondents in several areas of Jakarta showed only 24% consumers consume organic rice, 17% consume organic fruits, and 3% in the form of spices. Consumer’s reasons on why they do not buy organic food include expensive prices, affordability and difficult access to organic products. 34% (205 people) of the respondents do not even know about organic food.

To optimize the consumption of organic food, understanding factors that play a role in explaining the behavior of buying organic food is needed so that the intention to buy organic food in Indonesian society can be increased. Intention is important because it is a significant predictor of individual’s actual behavior in the future (Chen, 2013). The purchase intention of the consumer positively affects the probability of a consumer’s actual purchase decision to buy products (Chen, 2013). So, organic food purchase intention defined as the degree of willingness to purchase organic food product (Lee, Kim & Yu, 2015).

Consumer’s perceived value and purchase intention

In consumer behavior theory, one of the best ways to create and maintain consumers is to provide products that have value for consumers (consumer's perceived value) (Yang & Peterson, 2004). Consumer's perceived value is customer’s perceived preference to evaluate the attributes of a product, the performance of these attributes, and the consequences that arise from the use of the product that can facilitate (or block) consumers in achieving their goals (Woodruff, 1997). Sweeney and Soutar (2001) found that functional, emotional, and social values are three fundamental dimensions perceived value. Functional value is defined as the perceive utility for functional, utilitarian, or physical performance; then, emotional value refers to the product’s capacity to arouse feelings of affective states; and social value is the acquired from the product’s association with one or more social groups (Seth, Newman, & Gross, 1991).
Consistent with previous studies, we employed functional, emotional and social values as three reflective dimensions of general value that consumers can perceive from using organic food.

In addition to general value, consumers of organic food products also perceive the environmental performance of the products they are consuming. Chen and Chang (2012) propose the construct perceived green value to capture values derived from consumer’s environmental concerns. Perceived green value is defined as a consumer’s overall appraisal of the net benefit of a product or service between what is received and what is given based on the consumer’s environmental desires, sustainable expectations, and green needs (Chen & Chang, 2012). In this context, we argue that general product value combined with green value comprised the total perceived utility of organic food products. While general product value captures the attributes of a product that satisfies consumer’s general needs, green value would be a special type of perceived utility aimed at meeting consumer’s environmental needs.

Several previous studies that aim to identify factors that play a role in purchase intention show that consumer's perceived value is an essential factor that needs to be considered in consumer behavior research. Research conducted by Wei and Jung (2017) in China shows that general product value has a positive and significant impact on the purchase intention of sustainable fashion products. Meanwhile, green value does not have a significant impact on the purchase intention of sustainable fashion products. Other study conducted by Yu and Lee (2019) in US found that two values (green and emotional) had a significantly positive effect on both product attitude and purchase intention of upcycling products. Previous research in India also shows that functional and social values are influencing consumers to get involved in green purchase behavior of environmental friendly and energy efficient electronic products (Solaiman, Halim, Manaf, Noor, & Rana, 2017). The results of the study above study prove that consumer's perceived value is one of the most influencing factor for consumer’s buying intentions, but the results in each country are still not consistent. Therefore, to answer these differences, it is necessary for this present study to further investigate the factor that can mediate the relationship between consumer’s perceived value and purchase intention.

**Price Sensitivity**

Generally, organic products are priced higher than conventional products due to higher costs borne in the process. Consumers differ in how much they are willing to pay for a given product. In Indonesia, based on Mitel survey (2009), 78% Indonesian consumers are willing to buy more organic foods if the price is lower. This shows that Indonesian customers are generally priced sensitive as for organic food products and the price characteristics affect their purchasing decision (Anderson & Hansen, 2004). No matter how concerned they are, consumers can still be reluctant to pay price premiums for green products. Therefore, the notion of price sensitivity is highly beneficial to marketing managers to understand how they have to produce a product and adjust it to the market demand, cost, quality, and others (Goldsmith & Newell, 1997).

Price sensitivity is the level at which and how consumer behavior can be influenced by the price of a product or service (Goldsmith, 1996). This means how far a product's sales can be affected by price. In conclusion, the demand in the market can change only because of price (Goldsmith, 1996). This statement was verified by previous research, Erdil (2018) found that one of the most important factors which could affect green buying behavior is price itself. From his research, we can see that consumers whose price sensitivity is above average tend to choose not buying relatively high-priced green products independently of their environmental concern and environmental attitude. So, when it is scored high, it eventually hinders the involvement of consumers in green purchase intention (Erdil, 2018).
Conceptual framework and Hypotheses Development

After reviewing the relative literature, conceptual framework and formulated hypotheses are presented below.

Consumers’ behavioral intention to purchase product results from positive value delivery. That is, the more a product’s value is perceived, the higher the likelihood that consumers will purchase that product. Also, as green value is a type of perceived value provided by organic food products, we posited that general product values derived from organic food items (i.e., functional, emotional and social values) and green values would have a significant relationship with consumers’ purchase intention. Thus, we proposed the following hypotheses:

H1: There is significantly relationship between functional value and organic food purchase intention.
H2: There is significantly relationship between emotional value and organic food purchase intention.
H3: There is significantly relationship between social value and organic food purchase intention.
H4: There is significantly relationship between green value and organic food purchase intention.

Particularly for developing markets, the issue of price sensitivity is an important criterion for making a choice between green and conventional products. Since the environmental-friendly products are generally priced higher; this situation may induce unwillingness to buy them. In addition, the awareness of organic food product among Indonesian consumers has not be pervasive yet, thus they may rarely pay attention to the positive value of this product. Moreover, Indonesian consumers tend to believe it is the government that is responsible for environmental issues. Therefore, the framework examines the moderating effect of price sensitivity to understand the process leading to possible purchase intention.

H5: Price sensitivity moderates relationship between functional, emotional, social, green values and organic food purchase intention.

METHODOLOGY

Data collection and sample

An online survey was conducted using the Google Form tool to collect data for the empirical analysis. The survey was conducted in Januari 2020. A total of 203 respondents...
completed the entire survey. The criteria, namely: (a) in productive age group 18-58 years; (b) financially independent; (c) in Jabodetabek. A combination of two non-probability sampling techniques, snowball and accidental sampling, was used to obtain participants. We analysed the demographic data. In this study, 71.43% of respondents were woman, while 79.31% were between 20 and 29 years, 18.23% between 30 and 39 years, 1.97% between 40 and 49 years, and 0.49% over 50. In addition, their education backgrounds included bachelor or master degree (94.58%) and senior high school (5.42%). Then, the average income per month included > 6 million rupiah (52.71%), between 4 and 6 million rupiah (27.09%), between 2 and 4 million rupiah (13.3%), and below 2 million rupiah (6.89%).

**Instrument**

At the beginning of the survey, participants were asked some prescreening questions to rate their knowledge level of organic food product. The remainder of the survey contained several items intended to measure general product value functional value, social value, emotional value, green value, price sensitivity, organic food purchase intention, and individual characteristics (demographics). All items were measured on a six-point Likert scale, ranging from (1) strongly disagree to (6) strongly agree. Sum of the study measurements:

<table>
<thead>
<tr>
<th>Variable</th>
<th>Source</th>
<th>Total Item</th>
</tr>
</thead>
<tbody>
<tr>
<td>Functional value</td>
<td>Sweeney &amp; Soutar (2001)</td>
<td>4 items</td>
</tr>
<tr>
<td>Social Value</td>
<td>Sweeney &amp; Soutar (2001)</td>
<td>4 items</td>
</tr>
<tr>
<td>Emotional Value</td>
<td>Sweeney &amp; Soutar (2001)</td>
<td>5 items</td>
</tr>
<tr>
<td>Green Value</td>
<td>Chen &amp; Chang (2012)</td>
<td>4 items</td>
</tr>
<tr>
<td>Price Sensitivity</td>
<td>Goldsmith (1996)</td>
<td>6 items</td>
</tr>
<tr>
<td>Organic Food Purchase Intention</td>
<td>Lee, Kim, &amp; Yu (2015)</td>
<td>4 items</td>
</tr>
</tbody>
</table>

All of this measurements were back translated into Indonesian, and 30 participants were recruited to try out this survey. The result is, there were 6 items that must be cut so the final survey consists of 6 items for demographic information of the respondent, 3 items of prescreening questions, and 21 items to measure six variables above.

**Method**

We ran a path analysis using SPSS, for measuring the relationship between the four independent variables (functional, social, emotional, and green values) and the dependent variable which is organic food purchase intention. And also to test the moderation effect of price sensitivity on the relationship between each product values and organic food purchase intention. Before we ran the path analysis, we used the Kolmogorov-Smirnov test (K-S test) first to make sure the normality of the data distribution because normal distribution of variables was the important assumption to proceed to analysis.

**RESULTS AND DISCUSSION**

As we told above, we conducted path analysis using SPSS to test the hypothesis. Before applying the them, the normality of data distribution was assessed by K-S test. Based on the results of the normality test it is known that the significance value is 0.2 > 0.05, it can be concluded that the residual value is normally distributed, which were acceptable for the analysis.
Correlation of each product value and organic food purchase intention

Following validation of normality distribution, we used path analysis to assess the relationships among each product values and organic food purchase intention. The results are presented in Table 2.

Table 2. Results of hypothesis testing.

<table>
<thead>
<tr>
<th>H</th>
<th>Path</th>
<th>β</th>
<th>t</th>
<th>Sig.</th>
<th>Result</th>
</tr>
</thead>
<tbody>
<tr>
<td>H1</td>
<td>FV → PI</td>
<td>0.117</td>
<td>1.711</td>
<td>0.089</td>
<td>Rejected</td>
</tr>
<tr>
<td>H2</td>
<td>EV → PI</td>
<td>0.422</td>
<td>4.809</td>
<td>0.000*</td>
<td>Accepted</td>
</tr>
<tr>
<td>H3</td>
<td>SV → PI</td>
<td>-0.199</td>
<td>-1.579</td>
<td>0.116</td>
<td>Rejected</td>
</tr>
<tr>
<td>H4</td>
<td>GV → PI</td>
<td>0.080</td>
<td>1.063</td>
<td>0.289</td>
<td></td>
</tr>
</tbody>
</table>

Notes: FV: Functional value; EV: Emotional value; SV: Social value; GV: Green value; PI: Purchase intention; t > 1.96; *: p < 0.05.

Table 2 shows the standardized path coefficient and path significance for each path. Emotional value (β = 0.422, t = 4.809) had a positive and significant effect on consumer’s organic food purchase intention, as we hypothesized. Supporting H2, the emotional value of organic food products increased consumer purchase intention. However, the effects of functional value (β = 0.117, t = 1.711), social value (β = -0.199, t = -1.579), green value (β = 0.080, t = 1.063) were not significant. Thus, H1, H3, and H4 were not supported.

Moderating effect of Price Sensitivity

Hypothesis 5 (H5). Price sensitivity moderates relationship between functional, emotional, social, green values and organic food purchase intention.

The role of price sensitivity as a moderator could be seen in the indirect effect section below.

Table 3. Standardized direct Effects.

<table>
<thead>
<tr>
<th>Path</th>
<th>β</th>
<th>t</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td>FV → PI</td>
<td>0.117</td>
<td>1.711</td>
<td>0.089</td>
</tr>
<tr>
<td>EV → PI</td>
<td>0.422</td>
<td>4.809</td>
<td>0.000*</td>
</tr>
<tr>
<td>SV → PI</td>
<td>-0.199</td>
<td>-1.579</td>
<td>0.116</td>
</tr>
<tr>
<td>GV → PI</td>
<td>0.080</td>
<td>1.063</td>
<td>0.289</td>
</tr>
<tr>
<td>PS → PI</td>
<td>0.334</td>
<td>1.846</td>
<td>0.066</td>
</tr>
</tbody>
</table>

Notes: FV: Functional value; EV: Emotional value; SV: Social value; GV: Green value; PS: Price sensitivity; PI: Purchase intention; *: p < 0.05.

Table 4. Moderating effects of price sensitivity.

<table>
<thead>
<tr>
<th>Path</th>
<th>β</th>
<th>t</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td>FV → PS</td>
<td>0.218</td>
<td>9.941</td>
<td>0.000*</td>
</tr>
<tr>
<td>EV → PS</td>
<td>0.265</td>
<td>9.182</td>
<td>0.000*</td>
</tr>
<tr>
<td>SV → PS</td>
<td>0.597</td>
<td>23.339</td>
<td>0.000*</td>
</tr>
<tr>
<td>GV → PS</td>
<td>0.145</td>
<td>5.252</td>
<td>0.000*</td>
</tr>
</tbody>
</table>

Notes: FV: Functional value; EV: Emotional value; SV: Social value; GV: Green value; PS: Price sensitivity; *: p < 0.05.

Table 3 shows the significance value of each product value functional value = 0.000; emotional value = 0.000, social value = 0.000; and green value = 0.000 were less than 0.05. Indicating that functional value = 0.000; emotional value = 0.000, social value = 0.000; and green value = 0.000 had a positive and significant effect on customer’s price sensitivity.
However, since the result shown (Table 3) that only emotional value which had a positive and significant effect on the consumer’s organic food purchase intention. In this study, we could only measure the moderation effect of price sensitivity on the relationship between emotional value and customer's purchase intention. As we know, the direct effect of emotional value on consumer’s organic food purchase intention was 0.422. Whereas, the effect of emotional value on consumer’s organic food purchase intention after being moderated by price sensitivity was 0.265 x 0.334 = 0.089. Based on these calculation, we could see that the value of the direct effect of emotional value on consumer’s organic food product purchase intention (0.422) was greater than when moderated by price sensitivity (0.089). Hence, it could be concluded that price sensitivity had a negative moderating effect on the relationship of emotional value and consumer’s organic food product purchase intention. This means, the higher the price sensitivity level of consumers, the weaker the influence of emotional product value on consumer's intention to buy organic food products. Thus, H5 was partially supported.

Discussion

The aim of our study was to investigate consumer’s purchase intention for organic foods, focusing on the influence of product values. We also examined whether the price sensitivity could moderate the relationship between each product value and organic food purchase intention. The results of the study point to several key findings.

First, the results revealed that emotional value was the only value that had a significant positive effect on organic food purchase intention among the four product values (functional, emotional, social, and green). Interestingly, this finding indicates that the additional values provided by organic food products may stimulate consumer interest and evoke positive emotions. This phenomenon can be seen underneath the umbrella of “ethical consumerism”. Ethical consumerism describes a more conscious way of consumption embracing products which are produced in a fair and/or environmentally positive manner (Hain, 2017). From her previous research, Hain (2017) found that there are three positive emotions are evoked by ethical products. First, “feeling good” embraces positive emotions and effects on one’s own health and well-being. Secondly, “feeling moral” describes evoked feelings of morality and altruistic concerns about human, animal, and environmental welfare. Thirdly, “feeling powerful” focus on ethical consumerism as means to increase one’s own power and social status. Based on the these findings, positive emotions can serve as an excellent marketing strategy for ethical consumerism. As emotional value provide a significant positive effect in this study, it is important for the future research to investigate the underlying emotions of organic food purchase intention to foster its effective marketing. Thus, it can help marketers in the organic food industry to comprehend consumer’s motivation to purchase organic food products. Thus, they can an appropriate determine market segmentation and marketing strategies for selling organic food products in Indonesia. Moreover, the effect of functional value on organic food purchase intention were not supported. This may have been because some consumer’s still do not fully trust the product performance of organic food products, although they are produced with better quality. Furthermore, our result showed that organic food products are not associated with symbolic benefits such as social and green values, and this findings is consistent with Park and Lin’s study (2018). They found that only the actual purchasing experience increased social and green values of environmentally friendly products. These findings suggest for the future research that a consumer’s purchase experience should be considered in examining product value, especial for ethical products such as organic food products.

Second, this study found that price sensitivity had a negative moderating effect on the relationship of emotional value and consumer’s organic food product purchase intention. The price of organic food and its price premiums over conventional food have been of great interest to researchers in this past years. The often reported result that organic food prices are a major
barrier to purchase is only conditionally useful for practitioners since the market volume is in fact growing and results for the price–quality relationship indicate reasonable opportunities for future organic markets in the light of trends in consumer attitudes (e.g., increasing awareness for environmental and social topics). Furthermore, there is not much sense in drawing conclusions from the price sensitivity of all consumers in a country if some consumers are not interested in buying organic food at all, and if only a very small proportion of all consumers is responsible for a high percentage of all organic food purchases. Moreover, price-sensitive behaviour requires a certain degree of price knowledge and existing findings indicate that general consumer price knowledge is rather low (Rodiger & Hamm, 2015). In order to increase the explanatory power of research, a stronger focus on suitable sampling techniques is needed. Since there is now a body of research on the topic, it is recommended to increase the depth of analyses of future research. To increase the quality of conclusions that can be drawn from the existing state of this present study, the comparability of studies should be improved.

CONCLUSIONS

Our study contributes to the literature stream on organic food products purchase intention by enhancing our understanding of the consumer perceived values on such products. In this study, we identified that only emotional values that had a significant positive effect on organic food purchase intention among the four product values (functional, emotional, social, and green). These results may be interpreted that organic food products can attract consumers to better meet emotional value by emphasizing their special benefits and environmentally positive manner which is not owned by non-organic products.

In this study, we also examined the moderating effect of price sensitivity in the relationship between each product value and organic food purchase intention. We proved that price sensitivity had a negative moderating effect on the relationship of emotional value and consumer’s organic food product purchase intention. Nevertheless, it is advisable for further studies to pay special attention to the consumer price behaviour of heavy and medium buyers of organic food products to increase the quality of conclusions that can be drawn from the existing study.

REFERENCES


