Behavioral model modification theory of planned behavior considering factors of religiosity and awareness of purchasing halal cosmetics in Yogyakarta: a case study

Utaminingsih Linarti*, Mulia Ulfa

*1,2Program Studi Teknik Industri, Fakultas Teknologi Industri, Universitas Ahmad Dahlan, Yogyakarta, Indonesia

Submitted: 20-04-2021 Reviewed: 20-08-2021 Accepted: 28-09-2021

ABSTRACT

The assurance of the certainty of halal products needs to be considered, given the large Muslim population. Currently, the use of cosmetics is part of the primary need, which is indicated by the increasing growth rate of cosmetic sales in Indonesia. The behavior of purchasing cosmetic products with guaranteed halal product certainty is interesting to note. We can discuss the magnitude of the influence between product needs, religious principles, concerns, intentions, and behavior of Muslim consumers. This study aimed to determine the factors influencing consumer intentions and behavior in buying halal cosmetic products using a modification of the Theory of Planned Behavior (TPB) model by considering the aspects of religiosity and awareness. The results showed that attitudes, subjective norms, perception control, and religiosity positively and significantly influenced. At the same time, the awareness factor was not significant in consumer intentions to buy halal cosmetic products. At the same time, the intention has a positive and significant effect on the behavior of buying halal cosmetics.

Keywords: halal products; cosmetics; theory of planned behavior; religiosity; awareness

INTRODUCTION

The Pew Forum on Religion and Public Life released data that Muslims in Indonesia in 2016 amounted to 209.1 million people or 87.2% of the total population. This number is 13.1% of all Muslims worldwide (Kadengkang & Linarti, 2020). Therefore, certainty about the halalness of the product is very important to note because Muslims are prohibited from using products that are not halal. Along with increasing public awareness, especially in the Muslim community, halal products are in great demand today. The linkage to halal products is not only for food products but also for the categories of pharmaceuticals, services, finance, tourism, and beauty products such as cosmetics (Endah, 2014). In addition, for toiletries, medical devices, and service sectors such as logistics, marketing, print, and electronic media, packaging, labeling, and finance.

Cosmetics is one element of need that is quite important in the beauty field for the human body. Cosmetics are used on facial skin as a self-care effort to cover up flaws in facial skin to make it look more attractive. In addition, for some women, using these cosmetics can increase their confidence (Intansari, 2018). Beauty products are currently growing from time to time. Indonesia's cosmetics sector is growing rapidly, seen from the fairly high sales growth of 11.99% in 2017, and contributed IDR 19 trillion (USD 1.4 billion). According to the Indonesian Ministry of Industry, the national cosmetic industry recorded an increase of 20%, or four times the national economic growth in 2017. The Ministry of Industry noted that the national cosmetic industry grew by 7.36% in the first quarter of 2018 and increased compared to 2017, which grew by 6.35% (Investor, 2018).

In addition to choosing cosmetic products registered with BPOM, it is important to choose or use them by paying attention to their halalness, where halal and haram are part of Islamic beliefs that cannot be negotiated. Data obtained by LPPOM MUI noted that in March 2018, there were 41 companies with a total
of 2,115 halal-certified products. Halal certification labels are an important requirement in ensuring the halalness of cosmetic products (Aisyah, 2016). (Elasrag, 2016) explains that the scope of the halal concept of cosmetics and care products includes critical aspects of production, such as halal ingredients and the use of permitted substances to be made, stored, packaged, and shipped by sharia requirements. The requirements of sharia are by the Qur'an and hadith, including the Qur'anul Karim, Al-Baqarah (2:168) Allah SWT says, "O mankind, eat lawful and good from what is on earth, and do not follow the steps of the devil, for verily the devil is a real enemy to you.” In addition, described in QS. Al Baqarah: 173 "Verily Allah only forbids you carrion, blood, pigs, and animals that (when slaughtered) are called (names) other than Allah. On QS. Al Maidah: 88 Allah says, "Eat of the good, lawful things provided to you by Allah. And be mindful of Allah in Whom you believe."

Based on several studies related to the purchase intention of a halal product, it was found that the use of the Theory of Planned Behavior is still an option as a basis for measuring how much intention appears and also for determining the influence of several factors that are antecedents of the theory, namely attitudes, norms, Subjective, and behavioral control (Suparno, 2017). One of the studies related to the intention to use halal cosmetics by considering the awareness factor (Ansari & Mohammed, 2015; Majid et al., 2015).

Attitude is the level of a person's positive or negative feelings towards certain objects or intentions to do something (Ajzen, 1991). If an activity is something a person enjoys, he or she is more likely to "intend" to perform it. When customers are satisfied or want to purchase halal cosmetics, they are more likely to do so in the future. (Endah, 2014).

Perceptual control is how far a person believes or feels capable of doing something, where the more a person perceives himself, the greater a person's intention to do an action. The more control someone has over behavior, the more circumstances they feel are working in their favor to be able to accomplish that activity, and vice versa. (Ajzen, 1991).

Subjective norms are people's impressions of what significant folks in their life expectancy of them in terms of whether or not to engage in particular activities. This dimension is known as the subjective norm, while this perception is subjective (Mas’ud, 2012; Ramdhani, 2011).

Based on the (Ajzen, 1991) theory, attitude is one factor that drives a person's intentions and is assumed to be a motivational factor that influences behavior. Purchase intent quantifies how likely consumers are to purchase a product. The greater the purchase intention, the greater the consumer's intention to purchase the product, allowing individuals to choose whether or not to engage in certain behaviors. (Maghfiroh, 2015). Behavior is a response or reaction of an individual that comes from outside or from within himself. This response can be passive (without action: think, think, behave) or active (act) (Sarwono, 2017). Consumer behavior is generally described as a process of searching, selecting, and making a decision to buy an item or service to meet physical and psychological needs which includes several things such as what consumers buy, why consumers buy them when consumers buy, where they buy and so on (Sarwono, 2017).

Religiosity is the extent to which a person is committed to his religion, this can be reflected in his attitudes and behavior (Ahmad et al., 2015). Religiosity can also be interpreted as how far a person's level of religious knowledge, belief, and faith in the religion he adheres to Dibb (2004) in (Vristiyana, 2019), or can be interpreted as a person's sense of trust in believing in his religious teachings which can be implemented in his faith both in the form of attitudes and behavior. (Johnson, 2001 in (Ahmad et al., 2015)). Awareness is knowledge and understanding of a particular subject or situation. Consciousness is a basic part of human existence, which is self-awareness as an individual with personal thoughts about the state of things (Ambali & Bakar, 2013).

This study aimed to measure the magnitude of factors influencing a person's behavior in buying halal cosmetics using the theory of TPB (Theory of Planned Behavior). The TPB model contained in this study has modifications by considering religiosity and awareness factors as intention-forming factors. The
solution obtained is not a simultaneous solution of the relationship model, but is partial to the influence of intentions and behavior.

MATERIALS AND METHOD

Conceptual Framework

The research framework in this study was adapted from research conducted by (Aisyah, 2016; Ansari & Mohammed, 2015; Damit et al., 2018; Endah, 2014; Majid et al., 2015). Figure 1 is a conceptual framework for modifying the Theory of Planned Behavior model based on the adaptation of the previous research framework.

![Figure 1. Conceptual Framework](image)

Method

The sample of this study is active Muslim female students who use cosmetics aged 17-23 years. The sample in this study amounted to 275. Sampling in this study was carried out by purposive sampling technique. The conceptual model will be completed with a partial approach using multiple regression analysis. Divided into 2 models, namely model (1): factors of religiosity, awareness, attitudes, subjective norms, and control of perceptions of intentions; and model (2): the intention of the model (1) results towards behavior.

RESULT AND DISCUSSION

Model (1)

Model (1) is a measurement of the relationship between attitude factors, subjective norms, and perception control on willingness to buy halal cosmetics. Based on Table 1, the form of the regression equation can be written as follows:

\[
Y_{\text{Intention}} = 0.098 + 0.192 \text{Religiosity} + 0.091 \text{Awareness} + 0.382 \text{Attitude} + 0.109 \text{Subjective Norm} + 0.188 \text{Perception Control}
\]

The results of the equation in Table 1. obtained a constant value of 0.098 (the value of the dependent variable if the value of the independent variable is zero). This means that the value of one's intentions without taking into account the variables of religiosity, awareness, attitude, subjective norms, and perception control is only 0.098.
Individual Parameter Significance Test (T Statistical Test)

Based on Table I. Analysis of the influence of each independent variable on the dependent variable, which shows the results of the t-statistic test, it was found that the religiosity variable partially had a positive and significant effect on the Y-Intention of consumers to buy halal cosmetic products as seen from the value of \( t_{\text{count}} > t_{\text{table}} \) (2.24 > 1.96) and the value of \( \text{Sig} < (0.025 < 0.05) \). Based on the t-statistical test, the attitude variable has a positive and significant effect on the variable Y-Intention of consumers in buying halal cosmetic products as seen from the \( t_{\text{count}} > t_{\text{table}} \) (5.31 > 1.96) and the value of \( \text{Sig} < (0.00 < 0.05) \). Furthermore, the t-statistical test of the subjective norm variable has a positive and significant effect on the Y-Intention of consumers in buying halal cosmetic products as seen from the \( t_{\text{count}} > t_{\text{table}} \) (2.20 > 1.96) and the value of \( \text{Sig} < (0.028 < 0.05) \), and t statistical test of the control variable perception has a positive and significant effect on the variable Y-Intention of consumers in buying halal cosmetic products can be seen from the value of \( t_{\text{count}} > t_{\text{table}} \) (2.89 > 1.96) and the value of \( \text{Sig} < (0.00 < 0.05) \). However, for the t-statistical test of the awareness variable, it was found that the awareness variable was not significant to the Y-Intention of consumers in buying cosmetic products as seen from the value of \( t_{\text{count}} < t_{\text{table}} \) (1.64 < 1.96) the value of \( \text{Sig} > (0.025 > 0.05) \).

The variable with the largest coefficient comes from a variable that comes from within the respondent (internal), namely the attitude variable of 0.382 meaning 38.2% of the model strength comes from the attitude variable. The attitude factor supports this research because it has a positive and significant effect on consumer intentions in buying halal cosmetic products.

Simultaneous Significance Test of Multiple Regression Model (Statistical Test F)

The results of the F statistical test are in Table II. show that the value of \( \text{Sig} < (0.000 < 0.05) \). In addition to the significance value, the F value also shows that the \( F_{\text{count}} > F_{\text{table}} \) (43.95 > 4.38), so it can be concluded that the variables of religiosity, awareness, attitude, subjective norms, and perception control, which together have a significant effect on consumer intentions in buying halal cosmetic products.

### Table I. Model Regression Equation (1)

<table>
<thead>
<tr>
<th>Models</th>
<th>Unstandardized coefficients</th>
<th>Standardized coefficients</th>
<th>T</th>
<th>Sig</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B</td>
<td>Std. Error</td>
<td>Beta</td>
<td></td>
</tr>
<tr>
<td>(Constant)</td>
<td>0.098</td>
<td>0.277</td>
<td>0.354</td>
<td>0.723</td>
</tr>
<tr>
<td>Religiosity</td>
<td>0.192</td>
<td>0.085</td>
<td>0.121</td>
<td>2.249</td>
</tr>
<tr>
<td>Awareness</td>
<td>0.091</td>
<td>0.055</td>
<td>0.102</td>
<td>1.646</td>
</tr>
<tr>
<td>Attitude</td>
<td>0.382</td>
<td>0.072</td>
<td>0.346</td>
<td>5.316</td>
</tr>
<tr>
<td>Subjective Norm</td>
<td>0.109</td>
<td>0.049</td>
<td>0.121</td>
<td>2.204</td>
</tr>
<tr>
<td>Perception Control</td>
<td>0.188</td>
<td>0.065</td>
<td>0.160</td>
<td>2.894</td>
</tr>
</tbody>
</table>

### Table II. F Model (1) Statistical Test Results.

<table>
<thead>
<tr>
<th>Models</th>
<th>Sum of Squares</th>
<th>df</th>
<th>Mean Square</th>
<th>F</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Regression</td>
<td>23.027</td>
<td>5</td>
<td>4.605</td>
<td>43.953</td>
<td>0.000(a)</td>
</tr>
<tr>
<td>Residual</td>
<td>28.186</td>
<td>269</td>
<td>0.105</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>51.213</td>
<td>274</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

(a) Significant at 0.05 level.
Model (1) has an $R$-square ($R^2$) value of 0.450, which means that 45.0% of Religiosity, Awareness, Attitude, Subjective Norms, and Perception Control can explain consumer intentions in buying halal cosmetic products. While the remaining 55% comes from variables outside the study.

The results of data processing in this study carried out on model (1), which has an $R$-square ($R^2$) value of 0.450, means that 45.0% of religiosity, awareness, attitudes, subjective norms, and perception control can explain consumer intentions in buying halal cosmetic products, while the remaining 55% is explained by other variables outside the study. In the research by (Kadengkang & Linarti, 2020) which used the Theory of Planned Behavior factor plus the factor of religiosity and knowledge of intentions and behavior, it resulted in an $R$-square value of 55%. So it can be concluded that the remaining 55% value could be explained by the research of (Kadengkang & Linarti, 2020) which used one of the different factors in this study, namely the knowledge factor.

Model (2)

Based on Table IV, it can be written the form of the regression equation model (2) is

$$Y - \text{Consumer behavior} = -0.819 + 1.235 Y - \text{Intention of the model (1)}$$

The results of the equation are in Table IV. obtained a constant value of -0.819, where this number is constant. This means that the Y-Consumer behavior without taking into account the Y-Intention of the model (1) is only -0.819.

**Individual Parameter Significance Test (T Statistical Test)**

In Table 4. The results of the t-statistical test show that the value of Sig < (0.00 < 0.05). The t value also shows that the value of $t_{\text{count}} > t_{\text{table}}$ (16.22 > 1.96) means that the Y-Intention variable model (1) has a positive and significant effect on the Y-Consumer behavior in buying halal cosmetic products.

**Simultaneous Significance Test of Multiple Regression Model (Statistical Test F)**

The results of the F statistical test are in Table V. show that the value of Sig < (0.00 < 0.05). In addition to the significance value, the F value also shows that the $F_{\text{count}} > F_{\text{table}}$ (263.143 > 6.61), so it can be concluded that the Y-Intention of the model (1) has a significant simultaneous effect on Y-Consumer behavior consumers in buying halal cosmetic products.
Table V. F Model Statistical Test Results (2).

<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 Regression</td>
<td>35.098</td>
<td>1</td>
<td>35.098</td>
<td>263.143</td>
<td>0.000*</td>
</tr>
<tr>
<td>Residual</td>
<td>36.413</td>
<td>273</td>
<td>0.133</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>71.511</td>
<td>274</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Coefficient of Determination

Table VI. Coefficient of Determination.

<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>0.701*</td>
<td>0.491</td>
<td>0.489</td>
<td>0.36521</td>
</tr>
</tbody>
</table>

Based on Table 6. has an R-square (R2) value of 0.491, which means 49.1% Y-Intention of the model (1) explains Y-Consumer behavior in buying halal cosmetic products. While the remaining 50.9% came from variables outside the study.

In model (2) where the independent variable uses the intention of the model (1) which has been regressed by involving the variables of religiosity, awareness, attitude, subjective norms, and perception control which are used as predictors. The test was conducted to determine how much the intention of the accent affects the dependent variable, namely behavior. After processing the regression data in the model (2), the R-Square result is 49.1%, and the remaining 50.9% comes from variables outside the study.

Based on the results of data processing shows that the independent variables that have a positive and significant influence on intentions are religiosity, attitude, subjective norm, and perception control. This supports the initial hypothesis of the study (H1, H3, H4, H5) and the theory which states that religiosity, attitudes, subjective norms, and perception control have a positive and significant influence on Y-Intention. The results of this study also show that the Y-Intention of the model (1) has a positive and significant effect on Y-Consumer behavior. This supports the initial hypothesis of the study (H6). In addition, the results of this study indicate that awareness has a positive but not significant effect on consumer intentions in buying halal cosmetic products, so this does not support the initial hypothesis of the study (H2). Awareness in this study is defined as awareness in the context of halal where a person can understand, understand and be aware of knowledge related to the concept of halal about what is good and may be used or consumed according to Islamic religious rules contained in the newspaper, and assumes that using or consuming something Halal is an important thing for him. Respondents' assessment of the awareness variable on average is that they still use cosmetic products whose halal status is not yet clear, besides that there is still a lack of awareness in paying attention to the official halal label on cosmetic products before using or purchasing cosmetic products. This could affect the level of consumer awareness in buying halal cosmetic products. These results are also in line with research (Ansari & Mohammed, 2015) which explains that halal awareness has no relationship to the intention variable. However, the variables of attitude, subjective norm, and religiosity have a significant effect in predicting the intention of Pakistani people to buy halal personal care products. This is because the halal awareness factor already exists in each variable so people have entrusted the halalness of a product to the government or the parties concerned in the sales process (Ansari & Mohammed, 2015).

CONCLUSION

Religiosity, attitude, subjective norms, and perception control have a positive and significant influence on consumer intentions in buying halal cosmetic products. However, awareness has a positive but not significant effect on consumer intentions in buying halal cosmetic products. Religiosity, awareness,
attitudes, subjective norms, and perception control factors can simultaneously explain consumer intentions in buying halal cosmetic products. Intentions that have been influenced by factors of religiosity, awareness, attitude, subjective norms, and perception control factors have a significant effect on consumer behavior in buying halal cosmetic products. Intentions that have been influenced by factors of religiosity, awareness, attitude, subjective norms, and perception control factors (can explain consumer behavior in buying halal cosmetic products.

Further research can develop a conceptual framework for behavioral models by involving other factors that influence consumers in purchasing halal cosmetic products. It is necessary to carry out a comprehensive analysis with simultaneous completion for the modification of the behavior model in this study.

REFERENCES


