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## STRATEGIC APPROACH TO INCREASE PURCHASE INTEREST IN ALTERNATIVE ENERGY VEHICLES IN BOGOR

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### Abstract

This research investigates the influence of product quality, social media marketing, and price perception on consumers' intention to purchase electric vehicles, with brand awareness serving as a mediating factor. Conducted in Bogor City, the study employed a quantitative method involving 385 respondents selected through purposive sampling. Data analysis was performed using SEM-LISREL 8.80. The findings reveal that product quality has a significant impact on both brand awareness ( $t = 3.48$ ) and purchase intention ( $t = 3.61$ ). Social media marketing also significantly influences brand awareness ( $t = 2.02$ ) and purchase intention ( $t = 4.24$ ), while price perception affects brand awareness ( $t = 2.36$ ) and purchase intention ( $t = 3.44$ ). Furthermore, brand awareness mediates the relationship between these variables and purchase intention ( $t = 4.20$ ). The findings indicate that social media marketing is the most dominant factor affecting purchase intention, highlighting the importance of developing intensive and interactive digital marketing strategies. Practically, companies should focus on enhancing brand awareness and building positive consumer perceptions through social media, supported by high-quality products and competitive pricing, to accelerate electric vehicle adoption in Bogor.

**Keywords:** Product Quality; Social Media; Price Perception; Brand Awareness; Purchase Intention

## INTRODUCTION

Global climate change has prompted many countries, including Indonesia, to shift toward cleaner and more sustainable energy sources. Electric vehicles (EVs) have emerged as a strategic solution to reduce carbon emissions, particularly in the transportation sector, which contributes 23% of Indonesia's total greenhouse gas emissions (IESR, 2023). However, EV adoption remains low, especially in suburban cities like Bogor. According to data from the Ministry of Transportation, electric vehicles account for less than 0.1% of the total motor vehicles in Bogor (Kemenhub, 2023). One of the main challenges in EV adoption is the low consumer purchase intention. This is influenced by several factors, including product quality, the effectiveness of social media promotion, and the perception that EVs are still expensive (Triyono, 2022; Louangrath, 2021). Additionally, brand awareness of electric vehicle brands is still underdeveloped, resulting in limited consumer preference or trust when choosing an EV (Ramadayanti, 2019).

Previous studies have examined various factors influencing purchase intention, but few have positioned brand awareness as a mediating variable between product quality, social media marketing, and price perception in the context of electric vehicles particularly in Bogor City. Therefore, this study offers a novel contribution by simultaneously and contextually analyzing the relationships among these variables. The objective of this study is to analyze the effects of product quality, social media marketing, and price perception on the intention to purchase electric vehicles, with brand awareness as an intervening variable. The goal is to provide strategic recommendations for industry stakeholders and policymakers to accelerate EV adoption in Bogor City.

## REVIEW OF LITERATURE

### Literature Review and Hypothesis Development

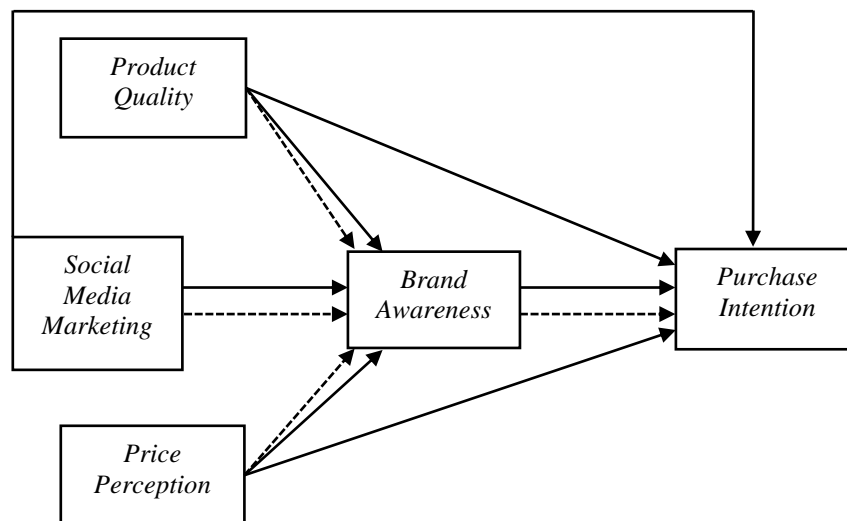
Based on key findings from previous research and relevant theories, product quality is recognized as a crucial factor influencing consumer purchasing decisions. Tjiptono (2016) emphasizes that high product quality builds trust and increases purchase intention. Similarly, the study by Yudha et al. (2022) supports this, showing that product quality significantly affects both brand awareness and the intention to purchase electric vehicles. In terms of promotion, social media marketing now plays a major role in shaping consumer attitudes. Fangfang et al. (2020) explain that interactive engagement on social media fosters emotional connections with brands. Fitriani (2021) also demonstrated that promotional activities on platforms such as Instagram and TikTok are effective in increasing purchase desire.

Price perception is a key factor for consumers when evaluating a product's value. Louangrath (2021) argues that a fair price perception positively influences purchase intention. This is especially relevant in the context of electric vehicles, where the initial cost is relatively high.

Brand awareness acts as a vital link that determines how product quality, promotion, and price are translated into purchase intention. According to Keller (2003), the more familiar consumers are with a brand, the more likely they are to choose it. Therefore, it can be concluded that product quality has a positive influence on brand awareness. High product quality makes it easier for consumers to recognize a brand, thereby enhancing brand

awareness (Tjiptono, 2016; Yudha et al., 2022). From this, it can be inferred that product quality positively affects purchase intention.

Consumer engagement with brands through social media has been proven to increase brand awareness (Fangfang et al., 2020). Consequently, it is proposed that social media marketing has a positive effect on brand awareness. Digital promotion not only builds brand awareness but also directly impacts purchase decisions (Fitriani, 2021), suggesting that social media marketing positively influences purchase intention. A price perceived as fair creates a positive brand image that strengthens brand awareness (Louangrath, 2021). Thus, price perception is believed to positively affect both brand awareness and purchase intention. A high level of brand awareness enhances the likelihood of influencing consumer purchase intentions (Keller, 2003), indicating that brand awareness positively impacts purchase intention. Furthermore, brand awareness is expected to mediate the effect of independent variables on purchase intention. Specifically, brand awareness mediates the relationship between product quality and purchase intention, between social media marketing and purchase intention, and between price perception and purchase intention.



**Figure 1. Conceptual Framework**

## RESEARCH METHOD

This study employed a quantitative approach with a causal design to test the conceptual model. The research was conducted in Bogor City, selected for its potential in implementing low-emission vehicle adoption. The population consisted of Bogor City residents who had the potential to become electric vehicle consumers. The sample was selected using purposive sampling, specifically targeting respondents who are at least familiar with electric vehicles. A total of 385 respondents were surveyed, in accordance with Hair et al. (2014).

Primary data were collected using a five-point Likert scale questionnaire covering indicators of product quality, social media marketing, price perception, brand awareness, and purchase intention.

**Table 1. Questionnaire Return Rate**

Description	Total
Questionnaires distributed	385
Questionnaires returned	385
Incomplete questionnaires	0
Questionnaires eligible for analysis	385

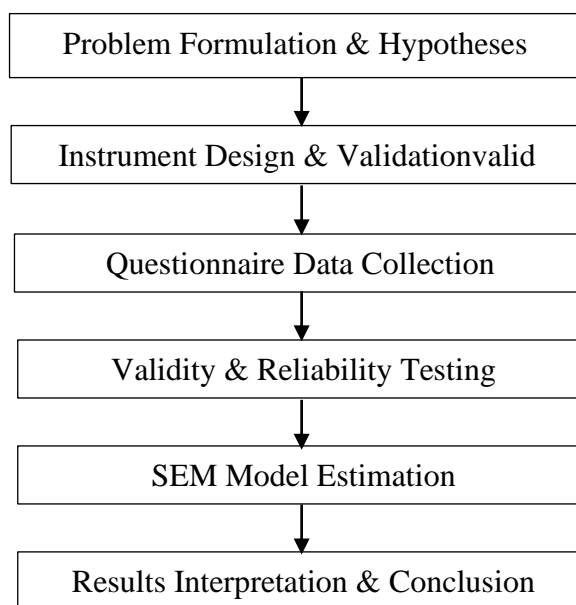
Data were collected using a five-point Likert scale questionnaire covering product quality, social media marketing, price perception, brand awareness, and purchase intention. Data analysis was conducted using Structural Equation Modeling (SEM) with LISREL 8.80, chosen for its ability to simultaneously test both direct and indirect relationships between variables.

Below is the table of variable operationalization and the flowchart diagram used in this study.

**Table 2.  
 Operationalization of Research Variables**

No	Variable	Indicator	Likert Scale
1	<b>Product Quality</b>	Performance	1 – 5
		Features	
		Reliability	
		Conformance	
		Durability	
		Serviceability	
		Aesthetics	
		Perceived Quality	
2	<b>Social Media Marketing</b>	Customer Interaction	1 – 5
		Customer Engagement	
		Information Availability	
		Content Quality	
		Promotion	
3	<b>Price Perception</b>	Price Fairness	1 – 5
		Price Competitiveness	
		Price Affordability	
		Promotional Offers	
		Price Sensitivity	

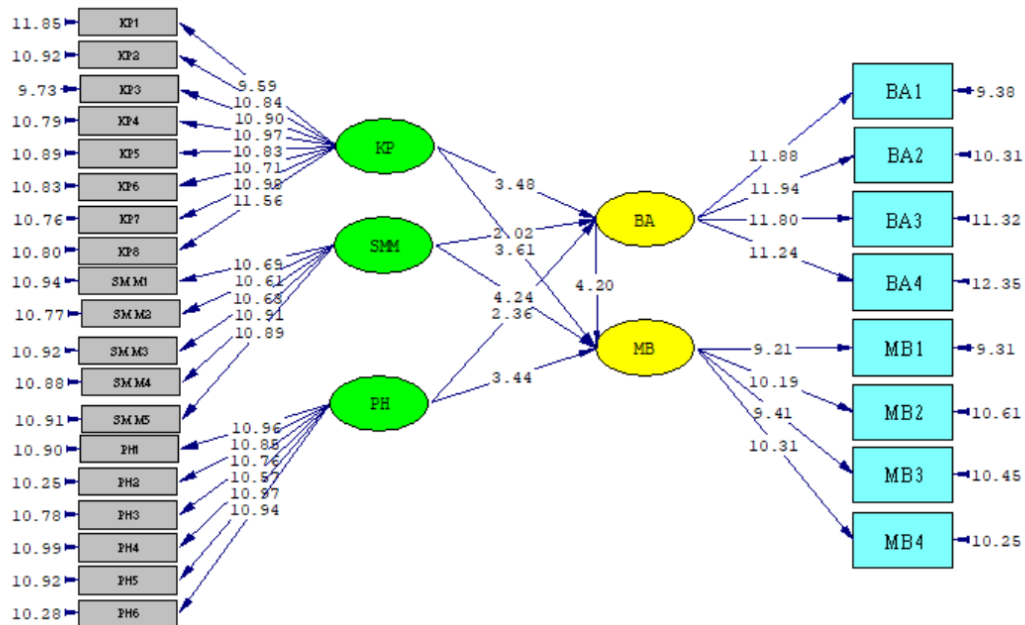
No	Variable	Indicator	Likert Scale
		Perceived Value	
4	<b>Brand Awareness</b>	Brand Recognition	1 – 5
		Brand Recall	
		Top of Mind	
		Brand Familiarity	
5	<b>Purchase Intention</b>	Transactional Intention	1 – 5
		Referral Intention	
		Preferential Intention	
		Exploratory Intention	



**Figure 1. Research Flowchart Diagram**

## RESULTS AND DISCUSSION

The analysis results using SEM-LISREL indicate that all path relationships between variables in the model are significant at the 5% level. The t-statistic value for the effect of product quality on brand awareness is 3.48, the social media marketing on brand awareness is 2.02, and the price perception on brand awareness is 2.36. Meanwhile, the effect of product quality on purchase intention is 3.61, social media marketing on purchase intention is 4.24, and price perception on purchase intention is 3.44. Brand awareness itself influences purchase intention with a t-value of 4.20.



*Square=467.27, df=340, P-value=0.000, RMSEA=0.131*

**Figure 2.**

**Structural T-Value Model**

These results indicate that product quality, social media marketing strategies, and consumers' price perceptions can enhance brand awareness and ultimately influence the decision to purchase electric vehicles. This aligns with the findings of Tjiptono (2016) and Yudha et al. (2022), who emphasized the importance of product quality in shaping consumer preferences. The results also confirm the studies by Fangfang et al. (2020) and Fitriani (2021), which demonstrated the effectiveness of social media in building emotional attachment to brands and influencing purchasing decisions. On the other hand, a positive price perception proves to be significant, as explained by Louangrath (2021), showing that consumers are more likely to accept the price of electric vehicles if they believe the benefits are worth the cost. The author argues that in the context of electric vehicles in Bogor City, marketing strategies should not solely focus on price or technological features. Instead, they should also emphasize intensive communication through social media to make consumers more familiar with and trusting of the brand. In doing so, brand awareness can be optimally developed, increasing the likelihood of boosting purchase intention.

**CONCLUSION**

Based on the results of the study using the SEM-LISREL approach, it can be concluded that product quality, social media marketing, and price perception have a significant influence on both brand awareness and the intention to purchase electric vehicles. Brand awareness is also proven to mediate the effect of these three variables on purchase intention, highlighting the importance of building brand awareness in increasing consumers' buying intentions. The implications of these findings suggest that automotive companies and electric vehicle marketers in Bogor City should focus not only on improving product quality

and setting reasonable prices but also on strengthening campaigns through social media to enhance brand awareness. This strategy is believed to increase the likelihood of consumer purchase decisions and accelerate the adoption of environmentally friendly vehicles in the future.

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