Examining consumers attitude and willingness to purchase organic products: Empirical evidence from emerging market

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ABSTRACT
Consumers are increasingly interested in organic products. This study explores the correlation between consumer organic awareness (COA), environmental attitude (EA), health consciousness (HC), perceived expensiveness (PE), willingness to pay (WTP), attitude (ATT), organic purchase intention (OPI), and organic purchase behavior (OPB) towards organic food. The study examines how ATT and OPI mediate the association between the aforementioned factors and OPB. Data was acquired from 505 respondents by convenience sampling. This study employs Structure Equation Modeling (SEM) using SPSS AMOS 26 to investigate the hypotheses of the suggested conceptual model. The study indicated that variables like COA, EA, HC, WTP, ATT, and OPI have a substantial impact on the OPB. EC is the most significant predictor of ATT, OPI, and OPB in organic food buying, while PE had the least influence. The antecedents COA, EA, HC, and WTP have a strong indirect impact on OPB among respondents via ATT and OPI. Finally, theoretical and practical ramifications are explored.

1. Introduction

The concept of sustainable development through effective improvements in production and consumption has emerged as a new worldwide challenge. Sustainable consumption emerges as a new paradigm for addressing this issue. Sustainable consumption is a multidimensional notion that is crucial to achieving environmental and social sustainability. It has multiple dimensions, such as consumer behaviour, business accountability, and policy frameworks. The study defines sustainable consumption as a difficult and ambiguous notion that entails divorcing consumption and economic growth from environmental degradation. It also emphasizes the relationship between consumers and the circular economy, as well as the government's responsibility in supporting sustainable consumption (Jorgeet al., 2024). It describes how sustainable consumption has achieved independence from the larger field and has been the focus of legislative measures targeted at improving product environmental performance and generating demand for sustainable goods.

The term "organic" refers to products produced in compliance with the Organic Food Production Act. Organic food is free of harmful chemicals, pesticides, and hormones. Organic products have arisen as alternatives to conventional ones.Organic products prioritize locally derived components, eliminate synthetic additives, and promote ecological balance and human health (Dhaoui et al., 2020).

Organic food choices frequently demonstrate a dedication to sustainable consumption.Organic food is an important part of sustainable consumption since it coincides with environmental, health, and ethical factors. Organic food is grown without using toxic pesticides or fertilizers, which helps to reduce environmental damage (Harikrishnan et al., 2024).Organic products are frequently viewed by consumers as a way to promote sustainable agriculture techniques that improve biodiversity and soil health (Ismael & Balogh, 2024). Purchasing organic food can represent social status and ethical consumption, reflecting a consumer's values and lifestyle choices (Istiasih, 2023).Food citizenship encourages consumers to practice sustainable activities and advocate for legislation that promote sustainable food systems (Kelada, 2022).While organic food consumption is frequently

portrayed positively in terms of sustainable consumption.Organic food is preferred by customers due toworries about health, safety, and environmental effect, as it is regarded to be devoid of pesticides and chemical residues, according to recent studies(Saifuret al., 2021). Environmental, health, and nutritional concerns are driving changes in food consumption practices. This shift in mentality is expected to fuel future growth in the organic food market. The organic food industry is expected to increase at a CAGR of more than 20% between 2021 and 2026, reaching USD 2,601 million. The Indian organic food market is expected to grow at a CAGR of 25.25 percent from 2022 to 2027, according to the India Organic Food Growth Report 2022-2027. To fulfil the increased demand for organic goods, this program aims to eliminate artificial methods in favour of more sustainable alternatives.

The majority of empirical research on organic food and customers in Asia has been conducted in the United States and Europe (Ahmed et al., 2021).According to Annunziata and Vecchio (2016), Italy has a strong organic market with enthusiastic consumers who value organic and locally sourced goods. Additionally, there is great awareness of organic certification. While the market for organic goods is expanding globally, consumer demand in developing nations, particularly India, remains significantly lower than in industrialized countries (Kushwah et al., 2019; Assocham & Ey, 2018).Although little is known about the current state of organic food in India (Stolz et al., 2011; Oates et al., 2012; Padel and Foster, 2005), the country's retail sector is gradually seeing an increase in demand (Sadiq et al., 2020; Chandra et al., 2020; Boobalan and Nachimuthu, 2020). To meet rising customer demand, leading organic food providers need more data to understand consumer attitudes towards their products (Schleenbecker and Hamm, 2013).

The organic food business in Asia Pacific countries will grow exponentially, accounting for more than 12% of worldwide value by 2025 (Iqbal et al. 2021). Similarly, the organic food market in South Asia has experienced significant growth.According to Husnain et al. (2017), low-income individuals in developing nations are concerned about the quality and safety of their food. Researching customer behavior and organic food in underdeveloped and emerging nations is essential (Iqbal et al., 2021).This study fills a gap in the literature on organic product by identifying factors that influence Indian consumers' propensity to purchase organic product.This work fills a gap in the field of organic product research.This study is organized as follows: first, assumptions are developed based on existing literature, and a conceptual model is constructed.A mechanism is developed to approach respondents and gather data. The acquired data is evaluated and explained using empirical findings from SEM. Next, the debate and implications are offered, followed by a conclusion and future study directions.

2. Literature Review

Despite growing demand for organic food in India, the OPB remains uncertain (Chakrabarti, 2010; Singh & Verma, 2017). Saleki et al. (2012) observed that EC positively influences human intention to purchase organic food, but Le-Anh and Nguyen-To (2020) found it unimportant in ATT and purchase intention for organic product.Studies (Al-Swidi et al., 2014; Saleki et al., 2012; Shin et al., 2019; Singh & Verma, 2017) show that HC, EC, PE and WTP have a considerable impact on ATT and purchasing decisions. Research indicates that COA and its benefits influence ATT and purchasing decisions (Aertsens et al., 2011; Le-Anh & Nguyen-To, 2020; Singh & Verma, 2017).According to Liang and Lim (2021) and Dangi et al. (2020), pricing can increase trust and encourage purchasing behavior.Several studies (Asif et al., 2018; Basha & Lal, 2019; Le-Anh & Nguyen-To, 2020; Pham et al., 2019; Sadiq et al., 2020; Shin et al., 2019) have investigated the impact of EA on organic product purchasing decisions. Scholars (Sadiq et al., 2020; Tandon et al., 2020) have stressed the significance of EA as a prerequisite for ATT development. Singh and Verma's (2017) study did not take into account EA, which is important in the Indian context as the environment is a significant motivator for organic product purchases (Basha & Lal, 2019; Sadiq et al., 2020).Our

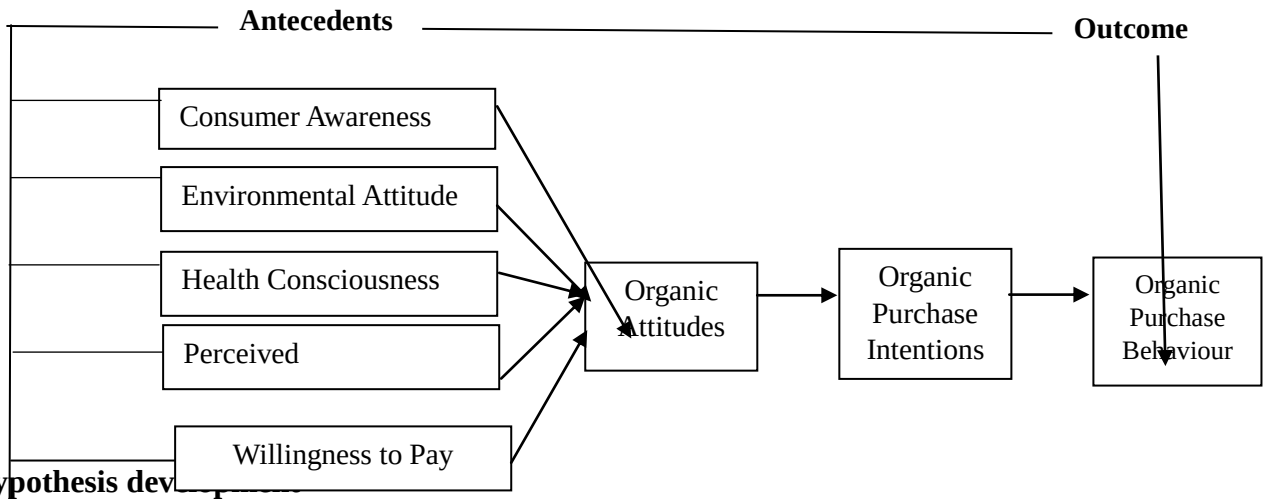
argument is that research on the Indian organic food market should take into account EA as well as other key factors such as COA,HC, EA, PE, and WTP. Marketers and policymakers must understand the factors that influence ATT and its function in OPB to increase the organic food industry's market share. This manuscript utilizes the Extended Theory of Reasoned Action (TRA) to analyze customer behavior towards organic food.

2.1 Theory of Reasoned Action

The Theory of Reasoned Action (TRA) is a frequently utilized theory in consumer behavior research (Zhou et al., 2013). Fishbein proposed the hypothesis in 1967 (Fishbein, 1979), which was later expanded in 1975 (Fishbein & Ajzen, 1975) and 1980 (Ajzen & Fishbein, 1980). It is based on social psychology (Ajzen, 1991). ATT measures the positivity and negativity of an outcome and describes human behavior intentions.TRA is widely employed in various fields, including coupon utilization (Shimp & Kavas, 1984), drug and alcohol use prediction (Laflin et al., 1994), and others. TRA has been applied to model golfers' visit intention (Song et al., 2021), student event intention (Harb et al., 2021), and subject selection (Awadallah &Elgharbawy, 2021).TRA is widely employed in various fields, including coupon utilization (Shimp & Kavas, 1984), drug and alcohol use prediction (Laflin et al., 1994), and others. TRA has been applied to model golfers' visit intention (Song et al., 2021), student event intention (Harb et al., 2021), and subject selection (Awadallah &Elgharbawy, 2021).

A conceptual model is created based on the ideas presented in this section, including significant drivers of consumer purchase intention for organic food in growing countries like India. Key factors include functional value quality, social norms, consumer innovation, green trust, health benefits, convenience, availability, and organic food knowledge (Fig. 1).

Figure 1: Conceptual Model



2.2 Hypothesis dev

TRA states that customer Intention is determined by the dimension ATT (Fishbein, 1979). In addition to ATT, COA,HC, EA PE, and WTP also impact intention towards organic purchase. The OPB for organic food is difficult to predict (Singh & Verma, 2017), but can be computed using OPIas stated by Yuen et al. (2021).

2.2.1 Consumer awareness about Organic product

Consumer awareness has a substantial impact on the desire to purchase organic products, especially through health consciousness and environmental concerns. According to research,

consumers see organic foods as healthier and more ecologically friendly, which influences their purchasing decisions (Kalyan & Metta, 2024; Premadasa & Fernando, 2022).Knowledge is important as it influences customer decisions (Laroche et al., 2001). (Hill and Lynchehaun, 2002) found that knowledge significantly impacts the buying of organic products. (Moorman et al. 2004) found that customers' decisions are influenced by their subjective knowledge, since they are motivated to behave accordingly.Raising consumer awareness of organic foods is the first step towards increasing demand for organic commodities (Briz & Ward, 2009). According to (Hutchins and Greenhalgh, 1997), consumers understand the definition of "organic" and associate it with the absence of chemicals. (Lyons et al., 2001) found that organic produce is preferred over conventional produce due to its natural, raw, and unprocessed qualities.(Hill and Lynchehaun's, 2002) study found that while consumers understand the fundamental attributes of organic products, they are unclear of how organic farming differs from conventional farming.Consumers with more organic knowledge view organic foods to be healthier and more nutritious, resulting in a positive attitude toward these items (Yilmaz, 2023).Knowledge of environmental benefits and food safety boosts customer confidence, cementing positive views (Rianto et al., 2023).A favourable attitude toward organic food is an important predictor of purchasing intentions, since customers are more inclined to buy when they are knowledgeable and confident (Sedera et al., 2023).The relationship between knowledge and purchase intention is mediated by attitudes, implying that boosting consumer understanding might lead to increased readiness to purchase (Nasir, 2023).Previous research has linked consumer awareness of environmental issues to increased interest in and purchase of eco-friendly products with new eco-labels (Kushwah et al., 2019; Aertsens et al., 2011). Research by Testa et al. (2019) and Joshi and Rahman (2017) suggests that consumer awareness directly influences the intention to adopt organic foods (Li et al., 2021). As a result, we propose that:

Hypothesis1: Consumer awareness about Organic products will have a positive impact on consumer purchase attitude of organic products.

2.2.2 Environmental Attitude

Various studies show that environmental attitude have a substantial influence on the inclination to buy organic products. These attitudes influence consumer behavior via a variety of mediating factors, including self-identity, awareness, and marketing methods.

While strong environmental sentiments tend to increase intentions to buy organic products, factors such as pricing and availability can stymie these intentions. Addressing these issues is vital for effectively boosting organic consumption (Mehdi et al., 2024).(Aprilia et al., 2024). Consumer environmental attitude has a big impact on attitudes and desire to purchase environmentally friendly items. According to research, increased environmental awareness correlates with positive sentiments toward green products, which eventually improves purchasing intentions. Consumers with high environmental attitude are more likely to acquire favorable opinions toward eco-friendly items, which directly influences their propensity to buy (Malhotra et al., 2024). A study discovered that environmental concern, mediated by environmental attitude, plays a critical role in developing green purchase intentions, emphasizing the need of awareness and education (Sanny et al., 2023). Digital media interactions can intensify environmental concerns, producing a green mindset that drives purchase intentions among consumers, particularly young people (V & S., 2024).Consumer environmental concern has a positive influence on green attitudes, leading to an increased propensity to purchase green products, particularly among Kerala's youth through digital media contact. (A, V., Bhopal, Raj, S.. 2024). Consumer environmental concern has a considerable influence on green purchasing intention by increasing environmental attitudes, which in turn increases willingness to purchase environmentally friendly items, according to research done in Jakarta. (Lim, Sanny., Lingga, Chairuddin., Melvin, M., Ninal, 2023). Consumer environmental concern influences pro-environmental purchase behavior among

young adults, along with communal orientation and environmental self-efficacy, as per the study on eco-conscious consumer behavior.(Suyesha, Singh., Geeta, Khanwani. 2023). As a result, we recommend that

Hypothesis2: Consumer Environmental attitude will have a positive impact on consumer purchase attitude of organic products.

2.2.3 Health Consciousness

Recent research suggests that consumers prioritize service quality and health consciousness over the marketing mix (Nguyen et al., 2020). As organic foods are thought to be beneficial to one's health, customers' purchasing decisions may be influenced (Nguyen and Truong, 2021).Consumer health consciousness has a significant impact on attitudes and willingness to purchase organic products. According to research, increased health awareness has a substantial influence on consumer behavior toward organic products, creating a desire for sustainable consumption.Health consciousness improves perceived value dimensions (quality, economical, social, and emotional), resulting to a greater inclination to consume healthy products (Albornoz et al., 2024).According to one study, health consciousness enhances the association between self-risk perception and desire to purchase organic food, implying that customers with better health awareness are more inclined to buy organic items (Devi et al., 2023).Positive consumer perceptions toward organic products, motivated by health concern, are associated with brand love and altruism, both of which impact sustainable purchase behavior (Jhamb et al., 2023).The pandemic has raised health awareness, pushing consumers to switch to better, immunity-boosting foods, raising purchase intentions (Kaur et al., 2023). While health consciousness is a major driver of organic product purchases, other research suggest that factors such as marketing strategies and social influences also play important roles in changing consumer attitudes and behaviors toward organic products.As a result, we recommend that

Hypothesis3: Consumer Health Consciousness will have a positive impact on consumer purchase attitude of organic products.

2.2.4 Perceived Expensiveness

Perceived cost has a considerable impact on customers' intentions to purchase organic products, frequently serving as both a motivator and a barrier. While many customers appreciate the health and environmental benefits of organic foods, the higher price point can inhibit purchases, particularly in urban environments where price sensitivity is increased (Kalyan & Metta, 2024).Price awareness strengthens the link between e-deal proneness and purchase intention. When confronted with anticipatory remorse, consumers who are price conscious are more inclined to buy (Isaac et al., 2023). Consumers are prepared to pay more for organic products due to perceived health benefits and environmental concerns (Kalyan & Metta, 2024; Shamsi & Abad, 2024). However, high prices continue to be a substantial obstacle, prompting others to avoid organic options entirely (Kalyan & Metta, 2024).Despite reservations regarding organic labeling, research shows that price value has a direct impact on customers' willingness to spend more for organic items (Shamsi & Abad, 2024). Price sensitivity and a lack of information can be barriers to organic food purchases, reflecting a complicated consumer behavior landscape (Ismael & Balogh, 2024)(Janssen, 2023).Consumer views regarding organic products are heavily influenced by factors such as health value, environmental value, and social effects (Yilmaz, 2023; Nasir, 2023).Emotional and functional values also regulate the relationship between price consciousness and purchase intentions, implying that addressing these values can boost willingness to buy (Nasir, 2023).As a result, we propose that

Hypothesis4: Consumer perceived expensiveness will have a positive impact on consumer purchase attitude of organic products.

2.2.5 Willingness to Pay

Consumers' desire to buy organic products is heavily influenced by their willingness to pay, which is determined by a variety of factors such as health consciousness, environmental concerns, and perceived product quality. Understanding these characteristics can assist marketers in better targeting consumers.

Consumers' willingness to pay (WTP) is influenced by factors such as health and environmental awareness (Kalyan & Metta, 2024) and the perceived benefits of organic products.Financial constraints can dissuade customers from choosing higher-priced organic solutions, even if they are prepared to pay more under specific conditions (Kalyan & Metta, 2024).

Hypothesis5: Willingness to pay towards organic products will have a positive impact on consumer purchase attitude of organic products.

2.2.6 Attitude

Consumer views about organic products have a substantial impact on their purchasing intentions, which are influenced by a variety of factors including health consciousness, environmental awareness, and personal identity.

Understanding these dynamics is critical for marketers hoping to boost organic product sales.Consumers are increasingly prioritizing health and environmental concerns, resulting in favorable opinions toward organic products (Minocha & Singh, 2024).According to studies, health consciousness and environmental views are major predictors of purchase intention, particularly for food products.Consumer involvement and self-direction are important in establishing views toward organic products, which then influence purchasing intentions (Kaur, 2023).Engaging customers in educational initiatives about the benefits of organic products can boost their involvement and favorable sentiments (g, 2023).

Hypothesis6: Consumers' attitude towards organic products will have a positive impact on consumer purchase intention of organic products.

Hypothesis 7: The antecedents (OCA, HC, EA, PE and WTP) positively effect the consumer OPI with mediation effect on ATT.

2.2.7 Organic Purchase Intention and Organic Purchase Behaviour

According to Brown (2003), OPI plays a significant role in purchasing decisions. Consumer intention to purchase (Lu et al., 2014) predicts ABB (Ajzen, 1991). Singh and Verma (2017) found that WTP, health, availability, ATT, and PE affect OPI and OPB. According to the literature, HC has the most significant impact on OPI and OPB. Choo et al. (2004) found a substantial link between ATT, OPI, and purchasing behaviors. Magnusson et al. (2001, 2003) found that ATT has a favorable impact on work performance. We propose the following hypotheses:

Hypothesis 8: OPI positively effects the consumer OPB.

Hypothesis 9: The antecedents (COA, HC, EA, PE and WTP) positively effect the consumer OPB with mediation effect of ATT and OPI.

3. Research Methodology

3.1 Development of Questionnaire

To evaluate organic product purchasing behavior, a questionnaire with 33 statements and 8 categories from previous studies was created using a 5-point Likert scale (Strongly Agree-5 to Strongly Disagree-1). These constructs were chosen to better explain the OPB.

3.2 Data Collection and Sample

Data for this study were collected using a survey method. Prior to finalizing the questionnaire, a pre-test and reviews by senior academician, industry experts, and university students were done. Two senior academicians working in organic farming and food production, three individuals from the organic food sector, and ten university students were pre-tested. They properly checked survey items and provided real feedback. Some questions were modified based on their comments to improve the survey's overall applicability.

The questionnaire was distributed to the qualified respondents.To guarantee respondents' appropriateness for the survey, a screening question was asked at the outset. This screening inquiry aims to provide insight into a person's purchasing patterns, food preferences, and lifestyle. The respondents came from a well-known Indian institution and were either buyers or users of organic food. The respondents in this study were Indian customers who have purchased and consumed organic food multiple times. Stratified sampling was employed to pick the necessary sample respondents. Stratified sampling involves defining the features of a sample based on the study's objective. Stratified sampling is a non-probability way of collecting data.

A total of 548 participants were reached to complete the questionnaire.After making follow-ups and reminder calls, only 521respondents were returned to the researcher. After adjusting for incomplete or missing responses, 505 responses were counted, yielding an 92.5% response rate. The response rate was sufficient when utilizing SEM (Bollen, 1989). Hair et al. (2002) recommended utilizing a sample-to-item ratio of 10:1 or multivariate analysis. Nonresponse bias was assessed by comparing "early" and "late" responses (Armstrong & Overton, 1977) and found suitability.the demographics characteristics of the original sample is presented in

TABLE 1 Demographics characteristics of respondents (N = 505)

Demographic Profile	**Categories**	**Frequency**	**Percentage %**
Gender	Male	259	51.3
	Female	246	48.7
Total		505	
Age	21-30	264	52.3
	31-40	181	35.8
	41-50	60	11.9
Total		505	
Education	Illiterate	186	36.8
	Upto 10th /SSC/HSC	25	5
	Graduate	280	55.4
	Post Graduate	14	2.8
Total		505	
Occupation	Government employee	71	14.1
	IT/ Doctor	132	26.1
	Other employee	81	16
	Self- employed	16	3.2
	Home maker	198	39.2
	Farmer	7	1.4
Total		505	

4. Results

Table 1 shows the respondents' demographic profiles.

The questionnaire was completed by 259 male and 246 female respondents. Among the 505 responders, 264 were between the age of 21-30, 181 were between 31-40, 60 were between 41-50.Out of 505 responders, 280 were graduates, 14were postgraduates,25 were HSC qualified and 186 were illiterates. Occupation wise, the highest number of respondents (198) were home makers.

4.1 MeasurementModel

Initially the information is analysed using the SPSS 21 Trial version. Further, the analysis is done using AMOS 26. Structural equation modelling (SEM) uses statistical data and hypotheses to predict causal correlations (Oliveira et al. 2016).Structure Equation Modelling is useful for both exploratory and confirmatory research (Hair et al., 2017) and is commonly used in marketing research (Hair et al., 2011).The current study's constructs are validated using reliability and validity tests (Table 2).

TABLE 2 Items and Factor Loading

Construct	Indicator	Factor Loading
Consumer Organic Awareness (COA)	My level of awareness about Organic Product is extremely good.	.681
	My level of awareness about Health benefits of Organic product is extremely good.	.755
	My level of awareness about Environmental benefits of Organic product is extremely good	.855
	My level of awareness about point of Purchase/availability of Organic Product is extremely good.	.849
	My level of awareness about various Brands offers Organic product is extremely good.	.833
Environmental Attitude (EA)	Environmental pollution is a serious issue.	.753
	I am greatly concerned about the harm being done to plant and animal life by pollution	.769
	The government should pay more attention to environmental issues.	.775
	I feel I am more environmentally conscious than most people.	.761
	Organic food is more environmentally friendly.	.759
Health Consciousness (HC)	Organic products are more nutritional than conventional food	.687
	Organic products are healthier than conventionally grown food.	.673
	Organic products are more safety to consume and contain less health risk.	.751
	Organic food tastes better.	.702
Perceived Expensiveness (PE)	Only consumers with higher income can afford organic food.	.768
	Organic food is too expensive.	.779
	Organic food is beyond my budget.	.710
Willingness to Pay(WTP)	I will continue to consume organic products without affect by the price changes.	.831
	I am willing to pay a higher price for organic products.	.854
	I don't mind spending more time sourcing for organic food.	.827
	Buying organic food is the right thing to do even if they cost more.	.826
	I'm willing to buy organic food even though choices are limited.	.832
	I would still buy organic food even though conventional alternatives are in sale.	.831
	I'm willing to buy organic food because the benefits outweigh the cost.	.849
Attitude (ATT)	I believe organic food is very useful to meet the nutritional needs	.686
	Organic food products have higher quality than conventional ones	.660
	I am convinced the consumption of organic food is a reasonable action	.669
Organic* Purchase Intention (OPI)	I intend to purchase organic products in the future	.723
	I am always interested in buying more organic food for the family's needs	.738
	I always intend to look for organic foods, although outside the city	.746

Organic Purchase Behaviour (OPB)	I have been a regular buyer of organic foods	.827
	I still buy organic food even though conventional alternatives are on sale	.849
	I never mind paying premium price for organic products	.797

TABLE 3 Descriptive statistics, reliabilities, correlations and validities

	Mean	SD	CA	AVE	CR	COA	EA	HC	PE	WTP	ATT	OPI	OPB
COA	**3.48**	**1.18**	**0.955**	0.635	0.896	**.795**							
EA	**3.63**	**1.13**	**0.970**	0.588	0.877	.648**	**.766**						
HC	**3.50**	**1.35**	**0.936**	0.586	0.809	.688**	.592**	**.765**					
PE	**3.99**	**1.17**	**0.938**	0.567	0.797	.599**	.751**	.496**	**.753**				
WTP	**3.78**	**1.18**	**0.970**	0.699	0.942	.502**	.618**	.568**	.604**	**.836**			
ATT	**3.89**	**1.24**	**0.958**	0.646	0.845	.647**	.717**	.616**	.670**	.656**	**.804**		
OPI	**3.87**	**1.27**	**0.956**	0.688	0.869	.595**	.679**	.591**	.608**	.597**	.725**	**.829**	
OPB	**3.81**	**1.27**	**0.953**	0.688	0.869	.539**	.583**	.483**	.569**	.494**	.658**	.658**	**.830**

Abbreviations: OPB, Organic Purchase Behaviour; CA, Cronbach's alpha; CR, composite reliability OPI,Organic Purchase Intention; ATT, Attitude; WTP, Willingness to Pay; PE, Perceived Expensiveness; HC, Health Consciousness; EA, Environmental Attitude; COA, Consumer Organic Awareness.

Reliability is determined by testing indicators and construct reliability.The indicator's reliability is assessed using factor loading values. Table 2 shows that all factor loading values above 0.6. The factor loading value above 0.6 is consistent with the needed threshold value (Ahmed et al., 2021; Bagozzi & Yi, 1988; Chin, 1998; Dash & Paul, 2021; Henseler et al., 2009).Kumar et al., 2021; Pham et al., 2019) suggest further consideration to improve indicator dependability. The construct reliability was evaluated using Composite Reliability (CR) and Cronbach's Alpha (refer to Table 4). Both CR (Hair, Black, et al., 2018; Molinillo et al., 2020) and Cronbach's alpha (Hair et al., 2006) have values over 0.60. As a result, the data verifies the scale's reliability.

Validity is examined using concept and discriminant validity. Construct validity is determined by the Average Variance Extracted (AVE), which exceeds the 0.50 threshold limit (Dash & Paul, 2021; Fornell & Larcker, 1981).

Structural Equation Model

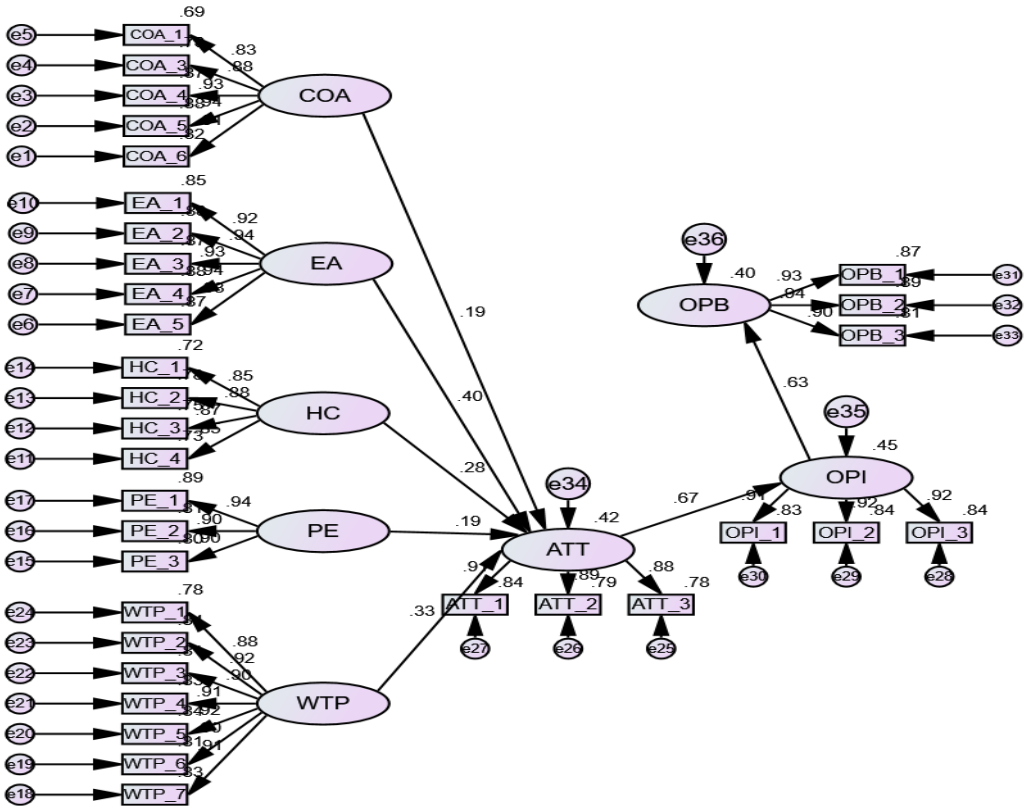


TABLE 4 Results of Structural Equation Model

Relationship		PC	t-value	p-value
Hypothesis 1	COA⇨ ATT	0.15	4.057	***
Hypothesis 2	EA⇨ ATT	0.28	6.034	***
Hypothesis 3*	HC⇨ ATT	0.23	4.621	***
Hypothesis 4	PE⇨ ATT	0.12	2.672	.008
Hypothesis 5	WTP⇨ ATT	0.19	5.320	***
Hypothesis 6	ATT ⇨ OPI	0.96	20.451	***
Hypothesis 7	OPI ⇨ OPB	0.87	16.988	***

Abbreviations: OPB, Organic Purchase Behaviour; OPI, Organic Purchase Intention; ATT, Attitude; WTP, Willingness to Pay; PE, Perceived Expensiveness; HC, Health Consciousness; EA, Environmental Attitude; COA, Consumer Organic Awareness. PC, Path coefficient.
*p-value<.001

4.2 Structural Model

The results indicate a significant and positive relationship was found between COA and ATT (PC=0.15, p<.001), EA and ATT (PC=0.28, p<.001), HC and ATT (PC=0.23, p<.001), thus supporting hypothesis 1,2, and 3 respectively. However no significant effect has been found for the relationship between PE and ATT (PC=0.12, p>.001), thus rejecting hypothesis 4.Furthermore it is observed that WTP positively influences consumer ATT (PC=0.19, p<.001), supporting hypothesis 5. Similarly, the results indicates that ATT significantly influences OPI (PC=0.96, p<.001) and OPI positively influence the consumer OPB (PC=0.87, p<.001), thereby supporting hypothesis 6 and 8, respectively.

4.3 Mediation effect analysis

Mediation effect analysis wasperformed to check the mediation effect of ATT andOPI on OPB. The results are shown in table 5.

TABLE 5 Mediation effect analysis

Effect	Beta	Indirect Effects	Total Effects
COA ⇨ ATT	.174	.000	.158
COA ⇨ OPI	.126	.148	.148
COA ⇨ OPB	.177	.126	.126
EA ⇨ ATT	.258	.000	.280
EA ⇨ OPI	.298	.262	.262
EA ⇨ OPB	.195	.225	.225
HC ⇨ ATT	.127	.000	.218
HC ⇨ OPI	.165	.204	.204
HC ⇨ OPB	.077	.175	.175
PE ⇨ ATT	.167	.000	.110
PE ⇨ OPI	.115	.102	.102
PE ⇨ OPB	.209	.088	088
WTP ⇨ ATT	.236	.000	.190
WTP ⇨ OPI	.187	.178	.178
WTP ⇨ OPB	.114	.152	.152
ATT ⇨ OPI	.725	.000	.935
ATT ⇨ OPB	.382	.000	.801
OPI ⇨ OPB	.381	.801	.857

Abbreviations: OPB, Organic Purchase Behaviour; OPI, Organic Purchase Intention; ATT, Attitude; WTP, Willingness to Pay; PE, Perceived Expensiveness; HC, Health Consciousness; EA, Environmental Attitude; COA, Consumer Organic Awareness. PC, Path coefficient

The results confirm Hypothesis 7, indicating that influencing variables (COA, EA, HC, PE, WTP)positively impact OPI via the mediating effect of ATT. Previous research (Baron & Kenny, 1986) indicates that the indirect effect has a low beta coefficient compared to the direct effect. The findings confirm Hypothesis 9, indicating that ATT serves as a mediator between OPI and OPB. However, the proposed model includes partial mediation.

Table 6 Summary of Results

Hypothesis	Path	Remarks
Hypothesis 1	COA⇨ ATT	Supported
Hypothesis 2	EA⇨ ATT	Supported
Hypothesis 3	HC⇨ ATT	Supported
Hypothesis 4	PE⇨ ATT	Not Supported
Hypothesis 5	WTP⇨ ATT	Supported
Hypothesis 6	ATT ⇨ OPI	Supported
Hypothesis 7	COA, EA, HC, PE, WTP ⇨ATT⇨OPI	Partial Mediation
Hypothesis 8	OPI ⇨ OPB	Supported
Hypothesis 9	COA, EA, HC, PE, WTP ⇨ATT⇨OPI⇨OPB	Partial Mediation

Abbreviations: OPB, Organic Purchase Behaviour; OPI, Organic Purchase Intention; ATT, Attitude; WTP, Willingness to Pay; PE, Perceived Expensiveness; HC, Health Consciousness; EA, Environmental Attitude; COA, Consumer Organic Awareness. PC, Path coefficient

5. Discussion of Findings

This paper investigated consumer perceptions of organic food. The study used extended TRA to assess the impact of variables on organic food purchases. The paper aimed to identify the link between the antecedents (COA, EA, HC, PE, and WTP) and consumer ATT. The mediating effect of ATT and OPI on OPB was investigated.

Table 6 reveals that all antecedents have a progressive influence on consumer attitudes towards organic products, with the exception of one determinant, PE which show no significant association.According to Pham et al. (2019), EA is the strongest predictor of ATT,

this suggests that EA has a greater influence in India than in other developing nations. The study examined the impact of antecedents on OPI through ATT mediation and proposed partial mediation of antecedents on OPB using ATT and OPI.

The study discovered association between COA and ATT, was found to be significant, indicating that customers who are aware of organic food have a good attitude toward it. Previous research supports these findings (Demirtas, 2019; GraciaRoyo& de-Magistris, 2007; Magnusson et al., 2001; Nguyen & Tran, 2019; Paul & Rana, 2012). Marketers should focus on increasing customer knowledge of organic foods. They can create segmentation strategies and position organic food goods based on their benefits over traditional food.Organic food with a higher COA creates a positive attitude among customers, leading to increased OPI and OPB levels. To expand the organic food market in India and beyond, both online and offline promotional strategies could be used. This will elevate the organic food business from a niche to a mainstream industry. Second the association between EA and ATT, was found significant.Previous research has shown that a consumer's EA is a strong predictor of ATT (Basha & Lal, 2019; GraciaRoyo& de-Magistris, 2007; Magnusson et al., 2003; Makatouni, 2002; Mkhize & Ellis, 2020; Paul & Rana, 2012; Wandel & Bugge, 1997; Yadav & Pathak, 2016). Including EA in the TRA construct considerably enhanced consumer attitudes towards purchasing organic food. EA has the largest influence among all constructs (path co-efficient value =.285), supporting its inclusion. As a result, the study demonstrates that EA has relevance in the TRA model for evaluating consumer awareness of organic product. Third, the study found the significant association between HC and ATT which is in line with the previous studies (Kaur et al., 2023; Jonathan &Tjokrosaputro, 2022; Willis & Stafford, 2016; Hong & Chung, 2020; Yun et al., 2020).Fourth, the association between PE and ATT was found to be insignificant, thus the relationship to be least influencing in this theoretical model(Fornell et al., 2020; Kwon & Ji, 2011; Hamid, 2014). Fifth, the association between WTP and ATT was found to be significant which is in line with the previous studies (Rony et al., 2023; Kantor & Kantor, 2021;Mohiddin, 2023; Perdanawati et al., 2020).The study found that consumer ATT mediates the association between antecedents and OPI, consistent with previous research on organic food (Çabuk et al., 2014; Pham et al., 2019; Singh & Verma, 2017). This undermines the significance of a positive ATT in framing OPI. The study examines the impact of organic food antecedents on OPB through mediation by ATT and OPI. The findings align with prior research (Singh & Verma, 2017; Smith & Paladino, 2010).This study's findings highlight the significance of the factors influencing customers' ATT, OPI, and OPB. According to Zander and Hamm (2010), the young generation is willing to pay higher rates for organic food, regardless of its cost.

5.1 Implications of the Research

This study expands on the previous model by extending the concept of EA to explain customer behavior towards organic food. The findings support the link between EA, ATT, OPI and OPB, which was not considered by earlier studies. The study found a stronger correlation between EC and the dependent components (ATT, OPI and OPB) than with other influencing factors (COA, HC, and WTP). The suggested model, including EA, adds to the existing literature (Singh & Verma, 2017).Third, ATT and OPB created a partial mediation with OPI. The proposed model is relevant to actual organic purchasers before organic stores (Le-Anh & Nguyen-To, 2020; Singh & Verma, 2017; Tandon et al., 2020b). This study enhances our understanding of sustainable food products and purchasing habits.This study has important implications for marketers of organic products. The study found that COA and EA have a crucial role in purchasing organic food. Marketers should prioritize the aspects listed above in their promotions. Consumers do not prioritize pricing when purchasing organic items, thus marketers should arrange their marketing campaigns accordingly. Addressing environmental issues in promotional strategies can also benefit organic food manufacturers.

To improve transparency in organic product information transmission, the government should establish a monitoring board with specialists to recommend appropriate steps. To meet rising demand for healthful products, the government should provide economic, social, and environmental support to the organic food industry. This will assist policymakers in reaching the United Nations' sustainability goals.Urbanization and the rise of fast food outlets in India have led to changes in people's eating patterns, resulting in health difficulties, particularly in cities. Providing healthful foods to people is crucial, and the availability of organic food may present new opportunities for businesses and governments.The government should promote organic food production and marketing. Providing subsidies for organic farming inputs could benefit farmers.

5.2 Contribution of Study

Recent studies (Ditlevsen et al., 2020; Paul & Rana, 2012; Rana & Paul, 2017, 2020) highlight the significance of EA in understanding consumer behavior when purchasing organic products. Previous studies (Le-Anh & Nguyen-To, 2020; Yadav & Pathak, 2016) found no significant correlation between EA and consumer ATT or OPI. These results are surprising given that consumers prioritize eco-friendly products and services (Han ,2020; Han et al. 2020). Further research is needed to better understand the behavior of young customers in developing nations such as India. This study used TRA to analyze EA, as well as other significant parameters such as COA,HC,PE, and WTP.

5.3 Limitations and future scope

Although the study's findings are substantial, they do have limits. The study was done in four Indian metropolitan centers, hence its findings may not be applicable to semi-urban or rural populations.As a result, additional research may be performed in this area.The study's sample was primarily made up of young, educated individuals. Future research might include a diverse sample, not just young and educated people.The manuscript focuses on a few variables that impact the ATT, OPI, and OPB. Future studies can examine gender, age, sociodemographics, and income level as moderators to better understand consumer behavior. Trust and product quality can considerably impact consumer desire to buy organic food (Krystallis&Chryssohoidis, 2005), which merits more investigation. The current study faces the challenge of understanding customer behavior for all organic product categories. Academics can conduct further product-specific study in the future. Understanding merchants and their shop management practices is crucial for inquiry.Retail formats vary in terms of goods, price, and knowledge sharing with customers. Further research might be conducted on the impact of store formats on consumer purchasing behavior. Previous studies have focused on consumers, but researchers may examine hurdles and challenges faced by producers and merchants to better understand the organic market's growth. As marketers adopt omni-channel distribution strategies, it's important to research consumer behavior across online and offline channels.In the post-pandemic age, organic foods are now more easily accessible through mobile apps and e-commerce websites, among other grocery products. Examining customer adoption intentions for organic food on various channels might yield significant insights.Future study should target specific product traits, such as "sustainable food," "healthy food," or "functional food," to better understand consumer behavior. Building a successful organic food brand requires considering brand equity, which influences perceived quality and purchase behavior (Rana & Paul, 2017).

6. Conclusion

The increased global interest in organic products has prompted academics to examine customer purchasing habits for organic foods. This comprehensive study examines all significant parameters (COA, HC, PE, EA, and WTP) influencing customer attitudes toward organic products (ATT, OPI, and OPB). Consumers prioritize COA and EA, with EA having

the greatest impact in explaining the ATT.ATT and OPI's mediation role only partially explains the OPB. Consumers are willing to pay higher prices for eco-friendly and sustainable items, indicating that price is not a barrier to purchasing these products.
This research offers insights for policymakers, marketers, and future researchers based on their specific goal.

Reference

1. A, V., Bhopal, Raj, S.. (2024) Green Purchase Intention in the Digital Era: The Interplay of Environmental Concern and Green Attitude. International journal of research and review, http://doi:10.52403/ijrr.20240675
2. Ali, Raza, Hamid. (2014). 3. A Study on the Relationship between Consumer Attitude, Perceived Value and Green Products. Iranian Journal of Management Studies, http://doi:10.22059/IJMS.2014.50024
3. Bella, Nichole, Kantor., Jonathan, Kantor. (2021). 2. Public Attitudes and Willingness to Pay for Cultured Meat: A Cross-Sectional Experimental Study. http://doi:10.3389/FSUFS.2021.594650
4. Claes, Fornell., Forrest, V., MorgesonIII., G., Tomas, M., Hult., David, VanAmburg. (2020). 2. Perceived Value: Is It Really All About Price?.http://doi:10.1007/978-3-030-13562-1_4
5. Claes, Fornell., Forrest, V., MorgesonIII., G., Tomas, M., Hult., David, VanAmburg. (2020). 2. Perceived Value: Is It Really All About Price?.http://doi:10.1007/978-3-030-13562-1_4
6. Crystal, Smith-Spangler., Margaret, L., Brandeau., Grace, E., Hunter., J., Clay, Bavinger., Maren, Pearson., Paul, J., Eschbach., Vandana, Sundaram., Hau, Liu., Patricia, Schirmer., Christopher, D, Stave., Ingram, Olkin., Dena, M., Bravata. (2012). Are Organic Foods Safer or Healthier Than Conventional Alternatives?: A Systematic Review. Annals of Internal Medicine, http://doi:10.7326/0003-4819-157-5-201209040-00007
7. Daniel, Welch. (2015). 4. Sustainable Production and Consumption. http://doi:10.1016/B978-0-08-097086-8.91054-7
8. Erin, Willis., Marla, Royne, Stafford. (2016). 5. Health consciousness or familiarity with supplement advertising: What drives attitudes toward dietary supplements?. International Journal of Pharmaceutical and Healthcare Marketing, http://doi:10.1108/IJPHM-06-2015-0026
9. Hyehyun, Hong., Wooyoung, Chung. (2020). 2. Integrating health consciousness, self-efficacy, and habituation into the attitude-intention-behavior relationship for physical activity in college students.. Psychology Health & Medicine, http://doi:10.1080/13548506.2020.1822533
10. Isaac, Cheah., Anwar, Sadat, Shimul., Brian, 't, Hart. (2023). Exploring e-deal proneness: the interplay of price consciousness and anticipatory regret. Asia Pacific Journal of Marketing and Logistics, http://doi:10.1108/apjml-05-2023-0459
11. Jorge, Alberto, Vargas-Merino., Cristian, Armando, Rios-Lama., Miguel, Humberto, Panez-Bendezú. (2023). Sustainable Consumption: Conceptualization and Characterization of the Complexity of “Being” a Sustainable Consumer—A Systematic Review of the Scientific Literature. Sustainability, http://doi:10.3390/su15108401
12. Khaled, A., Al, Falah., Abdulrahman, Al, Sughayir., Abbas, N., Albarq. (2024). 3. The importance of environmental concern, trust and convenience in consumers’ purchase intentions of organic foods in a developing country. Cogent Business & Management, http://doi:10.1080/23311975.2024.2361319

13. Krishna, Kalyan., Dr.Sukanya, Metta. (2024) Factors Influencing the Purchase Intention of Buyer towards Organic Foods. Indian Scientific Journal Of Research In Engineering And Management, http://doi:10.55041/ijsrem28663
14. Lim, Sanny., Lingga, Chairuddin., Melvin, M., Ninal. (2023) Environmental Attitude towards Green Purchasing Behavior in Jakarta. http://doi:10.1109/aiiot58121.2023.10174387
15. Luh, Putu, Virra, Indah, Perdanawati., A.M., Adiandri., Ni, Nyoman, Sudiyani. (2020). 4. Influence of Value, Knowledge, and Consumer Attitude of Consumer Willingness to Pay More. http://doi:10.2991/AEBMR.K.200131.014
16. Manpreet, Kaur., Rajdeep, Singh., Manjit, Singh., Kanwaljeet, Singh. (2023). 1. Can health consciousness drive purchase intention toward packaged immunity boosting food products?. Journal of Foodservice Business Research, http://doi:10.1080/15378020.2023.2298614
17. Min, Kwon., Jae-Hoon, Ji. (2011). 1. Influence of Cost Management Perception and Attitude on Cost Management Behavior among Hospital Employees. http://doi:10.12811/KSHSM.2011.5.1.087
18. Price perception and willingness to pay (2023) http://doi:10.4337/9781803923192.00027
19. Saifur, Rahman., Mahmuda, Akter, Mele., Young-Tack, Lee., Mohammad, Zahirul, Islam. (2021). 4. Consumer Preference, Quality, and Safety of Organic and Conventional Fresh Fruits, Vegetables, and Cereals.. Foods, http://doi:10.3390/FOODS10010105
20. Shampy, Kamboj., Manita, Matharu., Megha, Gupta. (2023). 6. Examining consumer purchase intention towards organic food: An empirical study. Cleaner and responsible consumption, http://doi:10.1016/j.clrc.2023.100121
21. (2023) Sustainable Consumption. SpringerBriefs in business, http://doi:10.1007/978-3-031-25397-3_7
22. Steffen, Jonathan., Miharni, Tjokrosaputro. (2022). 4. The Effect of Attitude, Health Consciousness, and Environmental Concern on the Purchase Intention of Organic Food in Jakarta. Advances in economics, business and management research, http://doi:10.2991/aebmr.k.220501.086
23. Suyesha, Singh., Geeta, Khanwani. (2023). Environmental Concerns, Communal Orientation, and Environmental Self-Efficacy as Predictors of Ecologically Conscious Consumer Behaviour Among Young Adults. http://doi:10.1088/1755-1315/1279/1/012030
24. Ulf, Hjelmar. (2011) Consumers' purchase of organic food products. A matter of convenience and reflexive practices. Appetite http://doi10.1016/J.APPET.2010.12.019
25. Zahara, Tussoleha, Rony., Faroman, Syarief., Ahmad, Fauzi. (2023). 1. Study of Managerial Knowledge, Attitude, and Intention Toward Willingness To Pay On Consumers Cosmetic Products. http://doi:10.58818/ijems.v2i1.21