

# The Impacts of Consumers' s Trust, E-WOM, and Attitude Toward Online Personalized Cosmetics Purchasing Intention among Facebook Members in Thailand

ผลของความเชื่อมั่นของผู้บริโภค การสื่อสารแบบปากต่อปากอิเล็กทรอนิกส์ ทักษะคิดที่ส่งผลต่อความตั้งใจซื้อเครื่องสำอางส่วนบุคคลผ่านทางออนไลน์ของสมาชิกเครือข่ายสังคมออนไลน์เฟซบุ๊กในประเทศไทย

**Janisa Wongsiriwacharakul\***

Student, Doctor of philosophy in Technology Education and Management (International Program), Assumption University

\*Corresponding author

**เจย์นิสา วงศ์ศิริวชรกุล**

นักศึกษาหลักสูตรดุษฎีบัณฑิต สาขาวิชาเทคโนโลยีการศึกษาและการจัดการ (หลักสูตรนานาชาติ)

มหาวิทยาลัยอัสสัมชัญ

E-mail: janisa.phd@gmail.com; Ph: 090-961-6689

วันที่ได้รับบทความ : 24 กันยายน 2566

วันที่แก้ไขปรับปรุงบทความ

ครั้งที่ 1 : 7 มกราคม 2567

ครั้งที่ 2 : 20 มกราคม 2567

วันที่ตอบรับตีพิมพ์บทความ : 5 มีนาคม 2567

**Dr. Somsit Duangekanong**

Lecturer, Doctor of philosophy in Technology Education and Management, (International Program), Assumption University

**ดร. สมสิทธิ์ ดวงเอกอนงค์**

อาจารย์ประจำหลักสูตรดุษฎีบัณฑิต สาขาวิชาเทคโนโลยีการศึกษาและการจัดการ (หลักสูตรนานาชาติ)

มหาวิทยาลัยอัสสัมชัญ

E-mail: somsitdng@au.edu; Ph: 081-340-0042

## Abstract

The objective of this article was to analyze the factors affecting consumer behavior in purchasing personalized cosmetic products online as well as study factors that affect consumer trust, electronic word-of-mouth communication and attitude towards intention to purchase personalized cosmetic products online. This study is quantitative research using a questionnaire set. The sample group used in this research was members of the online social network group (Facebook) in Thailand, which composed of 500 women. The non-probability sampling method was used to select samples of the study and the structural equation model was used for analysis as well. The results of the research found that the confidence aspect, the electronic word-of-mouth communication aspect, the attitude towards the product aspect, and the attitude towards brands aspect affected the intention to purchase personalized cosmetic products online. Moreover, the results of the study found that the confidence aspect affected the intention to purchase personalized cosmetic products online with the value of 0.888. The attitude towards the brand aspect affected the intention to purchase personalized cosmetic products online with the value of 0.385. The attitude towards the product aspect affected the intention to purchase personalized cosmetic products online with the value of 0.373, and electronic word-of-mouth communication aspect affected the intention to purchase personalized cosmetic products online with a value of 0.193, respectively at the statistical significance level .05.

The benefits of this research can support businesses or companies dealing with cosmetics and beauty products, marketing planning department Including electronic retailers in the beauty industry to develop and improve products to respond the needs of online consumers. Moreover, expanding the business including developing digital marketing strategies as well as increasing sales and opportunities for the business in the future.

**Keyword:** Personalized Cosmetic Products Online, Consumer Trust, Electronic Word-of-mouth Communication, Intention to Purchase

## บทคัดย่อ

วัตถุประสงค์ของบทความนี้เพื่อวิเคราะห์ปัจจัยที่ส่งผลต่อพฤติกรรมของผู้บริโภคในการซื้อผลิตภัณฑ์เครื่องสำอางเฉพาะบุคคลออนไลน์ รวมถึงศึกษาปัจจัยที่ส่งผลต่อความไว้วางใจของผู้บริโภค การสื่อสารแบบปากต่อปากทางอิเล็กทรอนิกส์ และทัศนคติต่อความตั้งใจซื้อผลิตภัณฑ์เครื่องสำอางเฉพาะบุคคลออนไลน์ การศึกษาในครั้งนี้ เป็นการวิจัยเชิงปริมาณ โดยใช้แบบสอบถาม กลุ่มตัวอย่างที่ใช้ในการวิจัยในครั้งนี้ เป็นสมาชิกกลุ่มเครือข่ายสังคมออนไลน์เฟซบุ๊ก ในประเทศไทย เพศผู้หญิง จำนวน 500 คน และคัดเลือกตัวอย่างโดยใช้วิธีการสุ่มตัวอย่างโดยไม่ใช้หลักความน่าจะเป็น และใช้โมเดลสมการโครงสร้างในการวิเคราะห์ ผลการวิจัยพบว่า ตัวแปร ด้านความเชื่อมั่น ด้านการสื่อสารแบบปากต่อปากทางอิเล็กทรอนิกส์ ด้านทัศนคติต่อผลิตภัณฑ์ ด้านทัศนคติต่อแบรนด์ส่งผลต่อความตั้งใจซื้อผลิตภัณฑ์เครื่องสำอางเฉพาะบุคคลออนไลน์ ผลการศึกษายังพบว่า ด้านความเชื่อมั่นส่งผลต่อความตั้งใจซื้อผลิตภัณฑ์เครื่องสำอางเฉพาะบุคคลออนไลน์มีค่าเท่ากับ 0.888 ด้านทัศนคติต่อแบรนด์ส่งผลต่อความตั้งใจซื้อผลิตภัณฑ์เครื่องสำอางเฉพาะบุคคลออนไลน์มีค่าเท่ากับ 0.385 ด้านทัศนคติต่อผลิตภัณฑ์ส่งผลต่อความตั้งใจซื้อผลิตภัณฑ์เครื่องสำอางเฉพาะบุคคลออนไลน์มีค่าเท่ากับ 0.373 และด้านการสื่อสารแบบปากต่อปากทางอิเล็กทรอนิกส์ส่งผลต่อความตั้งใจในการซื้อผลิตภัณฑ์เครื่องสำอางเฉพาะบุคคลออนไลน์มีค่าเท่ากับ 0.193 เรียงตามลำดับ ที่ระดับนัยสำคัญทางสถิติ .05 ประโยชน์จากผลการวิจัยนี้ สามารถช่วยธุรกิจหรือบริษัทที่เกี่ยวข้องกับผลิตภัณฑ์เครื่องสำอางและผลิตภัณฑ์ด้านความงาม ฝ่ายวางแผนการตลาด รวมถึงผู้ค้าปลีกอิเล็กทรอนิกส์ในอุตสาหกรรมความงาม

พัฒนาปรับปรุงผลิตภัณฑ์ให้ตอบสนองต่อความต้องการของผู้บริโภคออนไลน์ และต่อยอดธุรกิจ รวมถึงพัฒนากลยุทธ์การตลาดดิจิทัล เพื่อเพิ่มยอดขายและโอกาสให้กับธุรกิจได้ในอนาคต

**คำสำคัญ:** เครื่องสำอางเฉพาะบุคคลทางออนไลน์ ความตั้งใจในการซื้อ การสื่อสารแบบปากต่อปากทางอิเล็กทรอนิกส์ ความตั้งใจซื้อ

## Introduction

“Personalized Cosmetics” is cosmetic products that are personalised on the basis of personal characteristics or skin type. By using “customized formulation” in order to provide each customer's individual skin with the special needs' customer have, this is a uniquely formulated formulation. The formulations are designed with special focus on the consumers' most important needs.

However, about personalization strategy drives more revenue for a business. New factors may become relevant to the many cosmetic brands' success and growth, since consumers could do more to find out about selective or specific products and different quality products on the Internet market (Han et al., 2018). Companies can produce products that are uniquely designed to the needs and preferences of each person by using advanced technology for analysing customer data. This trend, in addition to improving the image and reputation of the brand, results in increased satisfaction for customers, loyalty as well as sales.

The online personalised cosmetics solutions are developed by Internet. Though customer can receive an in-person analysis by submit a very high-quality selfie after have visited the brand website and carried out an online quiz. The data collected are then analyzed via machine learning algorithms in order to create a customized regimen tailored for the condition and objectives of consumer skin. The standard consumers expect from brands and retailers now is personalization in all forms. Consumers expect brand to respond to their needs and predict what they're going to need in the future. They're speaking out about their values as well.

## Research Objective

The research aims to investigated online consumer behaviour. Additionally, this research emphasis how online purchase intentions impact the behavior of consumers in the context of online personalized cosmetics. Therefore by this study businesses can discover emerging trends, progressing preferences, and untapped consumer needs. Thus allowing brand to spot new opportunities for products, enhance existing offerings, and maintain a competitive edge in the market. To comprehensive this, a essential model examines the direct and indirect impacts on purchase intent of online personalized cosmetic, perceived value, brand image, trust, between attitude toward product, attitude toward brand ,E-WOM, need for uniqueness, attitude toward online shopping, respectively.

## Scope of the Research

The study emphasizes the importance of understanding purchase intentions for online retailers, particularly in the context of personalized cosmetics among Thai Female online shoppers. The research focuses on various variables, including perceived value and brand image, and uses self-administered questionnaires distributed online to gather data from Thai Facebook users. The goal is to examine how these factors influence online purchase intentions in a population that is active on social media and has experience with top cosmetic brands.

## Conceptual Framework

The conceptual framework used in this research (Figure 1) was based on 2 core theories and 4 major research studies. The relationships between 9 variables were investigated. there were 8 independent variables (perceived value, brand image, trust, attitude toward product, attitude toward brand, E-WOM, need for uniqueness, and attitude toward online shopping.) and 1 dependent variable (purchase intention). The following hypotheses are proposed:

- H1: Perceived value has significant impact on trust.
- H2: Brand image has significant impact on trust.
- H3: Attitude toward product has significant impact on E-WOM.
- H4: Attitude toward brand has significant impact on E-WOM.
- H5: Need for uniqueness has significant impact on attitude toward online shopping.
- H6: Trust has significant impact on online purchase intention.
- H7: E-WOM has significant impact on online purchase intention.
- H8: Attitude toward product has significant impact on online purchase intention.
- H9: Attitude toward brand has significant impact on online purchase intention.
- H10: Attitude toward online shopping has significant impact on online purchase intention.

## Literature Review

### Perceived value and Trust

Consumers who seek personalized cosmetic products have high expectations for quality and quantity, aiming for ultimate satisfaction in their purchases. Moreover, trust was a consumer's trust in product trustworthiness. Previous educations have publicized that perceived value impacted trust (Nel & Marawule, 2018). However, numerous papers confirmed that perceived value was the main determining factor for general measurement that determines how happy customers were with a firm's products, services, and accessibilities (Evanschitzky et al., 2012). The direct influences of outcome value on general contentment and on trust. Thus, this researcher predicted that perceived value has significant impact on trust.

### Brand image and Trust

Creating a reputable brand image was the goal of every business, whether private, corporation or firm. Worthy brand image drive offered countless advantages for the brand holder. Making a brand image entails time. The positive perception of a brand image from the consumer's standpoint plays a crucial role in establishing trust among clients towards personalized cosmetic products. Trust was an expressive state when the participant has sureness in the reliability and truthfulness of the trade associate (Erkmen & Hancer, 2019). Research conducted by , Zhang (2010), and Erkmen and Hancer (2019) revealed that brand image has an impact on consumer trust. Furthermore, the academics perceived that brand image was impacted to trademark trust also customer needs and expectations (Erkmen & Hancer, 2019).

### **Attitude toward product and E-WOM**

Peter & Olson (1999) described attitude toward product as an individual's assessment of the comprehensive idea of the product; this inclusive valuation be able to reflected, to a clear degree. On the other hand, clients created their general judgement of a product afterward merging or mixing appropriate product indication. Attitude toward product appeared as a person's process of judging and great consequence standpoint of an intangible item or a tangible item; this all-inclusive judgment possibly counted, limited degree, intended result that directs mental processes stated product. Various specialists concentrated theory examination regarding shopper attitude toward online reviews and the outcomes revealed that attitude toward a product significant positive influenced on E-WOM and correspondingly positive impacted on the purchase purposefulness (Hsu, 2022).

### **Attitude toward brand and E-WOM**

Purchaser's attitude toward brand explained customer's consideration and feelings all through recognize or state the difference between brands (Park et al., 2010). However, E-WOM has become an essential construct in marketing. E-WOM presented as benefitted indication information by carrying consumer concentrated contexts with regard to substances encouragement and in the same way also performed as intercessor by presenting recommendation or supportation from clients who had steadily acquired intangible belongings also tangible belongings (Park & Kim, 2008). WOM refers to informal communication among consumers regarding their opinions and evaluations of products or services (Anderson, 1998). Consumers' valuable WOM intentions were described as a particularized view point about providing beneficial WOM recommendations to others (Anderson, 1998).

### **Need for uniqueness and Attitude toward Online Shopping**

Despite the high demand for unique products, certain buyers may have limited access to rare items. For these clients, cosmetic online shopping can be enchanting opportunity to discovery unique elements that cannot be acquired from shopping mall. Usually, it was presumed that greatly unique shoppers were magnetized more to uncommon products than non-unique shoppers although the endeavor necessitated to get unique products. The need for uniqueness was an individual made themselves expressive of the others by inquired about uniqueness creations over recognizable brand or specialized products. Exceedingly unique customer was involved rising to unique products than normal products also clients even supposing attempt to chosen limited products. In particularly, the scholars investigated about online purchasing behavior for customer lives in one country and purchases from another, spenders who had an exclusive superior request for rareness was very high probabilities to shop products via online shopping. For this could connected to the possibly of consumer well-to-do more searched the selectiveness or special products and different quality products in online market place (Han et al., 2018).

### **Trust and Online Purchase Intention**

Trust had discovered the ability on evidence which backing of coming activity of purchase intention (See-To & Ho, 2014). According to Kotler and Keller (2016), intention to purchase was a buyer attention in a product and it be able to produce a strong feeling and process of buying a product that has involved consideration. The well the seller discovering the conditions that activate purchase intention, the higher the acquisitions generated by purchasers. Furthermore, buyer's purchase intentions for personalized cosmetics were supposed of being impacted by their trust in products. The conclusions presented by Lhawonk (2014) inspected the impact of trust on purchase intention. Several researches recognized that trust had primary touched in dimensions of producing an influence indirectly buying intentions in the accessibility and utilization of advanced devices to convey on the Internet (Kim et al., 2008). In the state of buying items on commercial electronic information service/the internet, purchase intention was belief and trustful related with a great level of high communication impressive. Thus, this research predicted that trust had significant impact on online purchase intention.

### **Electronic Word of Mouth (E-WOM) and Online Purchase Intention**

E-retailers were mostly concerned about the better perception of E-WOM, for the reason that old-style manners of communication advertising seem to be failing its efficiency. To keep away from the chance of purchasing unwanted or unusable products, buyer continuously search for product facts provided on the online. E-WOM performed as advantaged information by delivering consumer specified circumstances towards item evidence and similarly acted as mediator by giving suggestion or piece of advice from individual who had purchased material things or non-material things consistently (Park & Kim, 2008). An investigation of purchase tangible items or intangible items through the electronic commerce perceived that be in conformity with E-WOM formed the linking between consumers' emotional belief and intention to buy higher and also enlarged in psychological power by educated or experienced buy s' experiential totality and attitude.

### **Attitude toward product and Online Purchase Intention**

Various appropriate examinations correspondingly signified that consumer attitude had a positive impact on behavioral intention. Once clients gained product knowledge, this knowledge touched consumers' attachment in the products, that might eventually impact shoppers' purchase intention also decision-making. Since consumers acquire further facts provided connected to a product from a knowledge platform, their attitude toward product was confidently impacted, and they have a stronger feeling of wanting to realize the product. Attitude toward product indicated as a behavior's development of thinking and remarkable outcome product point of view; perceptiveness, imperfect, conceptual sensibleness definite approaching the item (Peter et al., 1999).

### **Attitude toward brand and Online Purchase Intention**

Attitude toward brand disclosed buyers' deliberation and selection of brands (Park et al., 2010). Attitude toward brand mentioned to carefully selected or disapproving feeling of the purchaser involving an item. Attitude mentioned academic on the starting point of sensation or influence about a product (Ajzen, 1980). However, the scholars specified an important and consistent connection between attitude toward brand and purchase intention also in conclusion real purchasing behavior of brand (Lee et al., 2017; Ozcelik & Varnali, 2019). They had indicated an important and reliable linkage over attitude toward brand and purchase intention and conclusively real purchasing behavior of brand (Lee et al., 2017; Ozcelik & Varnali, 2019). Thus, this research predicts that attitude toward brand has significant impact on online purchase intention.

## Attitude toward Online Shopping and Online Purchase Intention

Attitude was an access to particular direction to behavioral intention and that inward turn to particular direction towards actual behavior (Ajzen, 1980). Purchasers gained advantage from enhance accessibility thru online spending. Since, studies found clearly showed the existence of buyers' attitudes toward online world wide web impacted the intention to the action of buying items or intangible items via the internet (Van Noort et al., 2008). Online purchase intention was described as the concept that provides the power of a customer's intention to acquisitions online (Salisbury et al., 2001). To initiation purchase intention amongst clients and convincing it to real purchase activities was an imperative purpose for the e-retailers to analyze and they had better put an effort to heighten those factors that subsidized meaningfully to making of expectant purchase intention.

## Research Design

### Research Framework Model

The researcher has proposed the research model based on the Theory of Reasoned Action (TRA) (Ajzen, 1980) and the Theory of Planned Behaviour (TPB) (Ajzen, 1991) to explain organic product consumption behaviour (Chen, 2007; Dean et al., 2008). The TRA suggests that a person's behavioural intention depends on the person's attitude towards the behaviour and subjective norm. Similarly, the TPB incorporates all the above components but includes another factor (i.e. perceived behavioural control) to explain the combined effect on an individual's behavioural intention. Both the TRA and the TPB identify behavioural intention as a critical antecedent of actual individual behaviour. The relationship between behavioural intentions and actual behaviour is based on the assumption that human beings attempt to make rational decisions based on the information available to them. Therefore, a person's behavioural intention to perform (or not to perform) a behaviour is the immediate determinant of that person's actual behaviour (Ajzen, 1980). Still, the TPB has been considered a more comprehensive behaviour theory compared to the TRA because the TPB incorporates more influential variables in the model and provides more explanatory power in terms of predicting the adoption of information technology (Mathieson, 1991).

The research model was also adopted from the theoretical frameworks of previous studies. The first theoretical framework was conducted by The first research framework model was "Purchase behavior of millennial female generation on Halal cosmetic products" by Handriana et al. (2021) , which provide the study of perceived value, brand image, trust and intention to purchase.

The second theoretical framework was determined by Hsu (2022), which revealed consumer's intention of buying online was primarily judged by need for uniqueness and attitude toward online shopping. The third theoretical framework elucidated by Han et al. (2018) which provide study of attitude toward product, E-WOM, attitude toward of brand and purchase intention.

The fourth theoretical framework was analyzed by (Arora & Aggarwal, 2018) which provide study of attitude toward online shopping and online purchase intention. The research conceptual framework is proposed as following Figure 1.



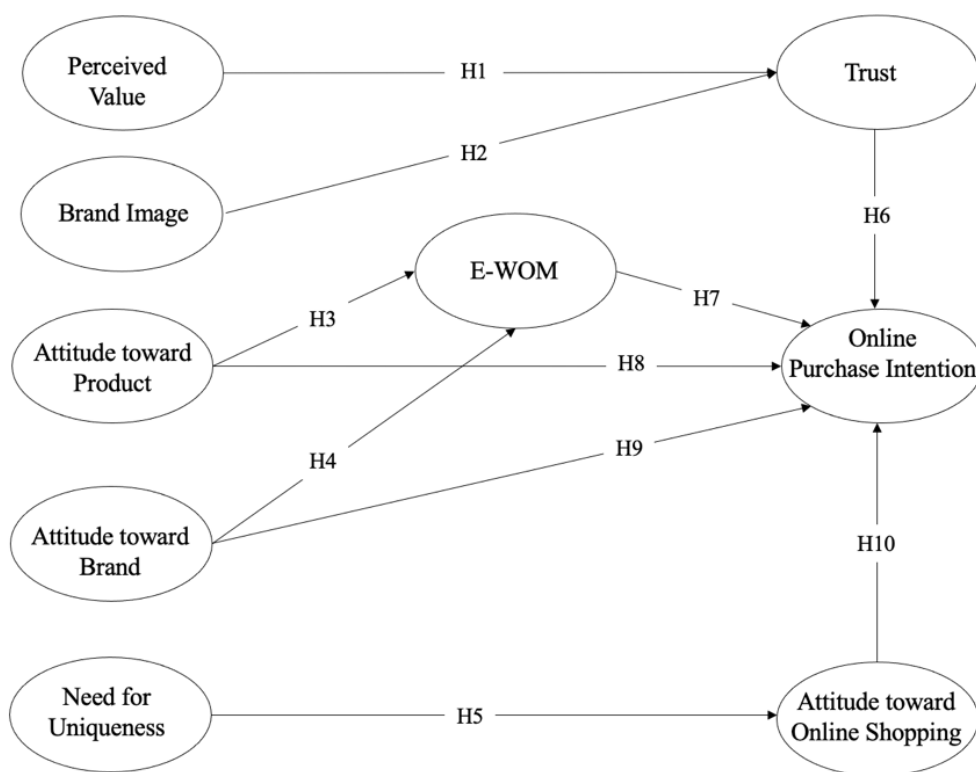


Figure 1 Conceptual framework.

### Research Methodology

In this study, empirical analysis and quantitative method were implemented. Sample data were accumulated from target population by using questionnaire as implement. In advance large-scale of data collection, content validity and reliability of the questionnaire were verified through Item-Objective Congruence (IOC) test and pilot test of Cronbach's Alpha. Afterward reliability test, the questionnaires were delivered online to female Facebook member in Thailand. The respondents were required that must be a Facebook member more that one year and also must be a member of any cosmetic fan pages. Anderson (1998) proposed two-steps of Structural Equation Model (SEM) method, which were adopted in this research to analyze the sample data. Firstly, using SPSS and AMOS for Confirmatory Factor Analysis (CFA) to examine convergent validity and the secondly, conduct SEM to explore causal relationship between all constructs in the conceptual model to test the significance of impact and proposed hypotheses. SEM has the improvement of ability to explore a range of dependencies synchronously, especially when the model consisted both direct and indirect impact between structures (Hair et al., 2010).

### Population and Sample Size

In the research, the target population were female Facebook member in Thailand with more than one year being a Facebook member and being a member of any cosmetic fan pages. The purpose of these recruitment criteria was to ensure that all participants were connected to Facebook fan pages for beauty product and were familiar with online activities. Facebook was the most popular social media worldwide. Social media, particularly Facebook, were used to disseminate the survey in this study. Based on the A-priori Sample Size Calculator for SEM by Soper (2024), the recommended minimum sample size was 460 from the parameters of 9 latent variables and 37 observed variables at the probability level of 0.05. Therefore, the questionnaires were distributed and screen for valid responses at 500.



### Sampling Technique

The research used probability sampling and non-probability sampling. Moreover, the sample was scoped and selected by using the multistage sampling technique of judgmental sampling, stratified sampling, then once again with judgmental sampling follow by convenient sampling and snowball sampling. Firstly, judgmental sampling was adopted to select participants who have been a Facebook member more than 1 year as well as the participants must be a member of any Facebook cosmetics fan pages. Secondly, a stratified sampling of the researcher used the list of top 10 most popular cosmetic brands for Thai people in 2021 in Thailand (published by [www.top10bangkok.net](http://www.top10bangkok.net)). However, the researcher selected the top three with; 1. (LOR) 2. (LAN) 3. (MBL) for this stage. Thirdly, applied once more judgmental sampling on condition that all participants must have experience of using products from the top 3 brands 1. (LOR) 2. (LAN) 3. (MBL) in the past 1 year. The main reason was to ensure that the participants have an understanding of beauty products and also have experience of using cosmetics. Therefore, convenience sampling was employed for any respondents who were willing to answer the questionnaires. Lastly, snowball sampling which asked friends to circulate the online questionnaire link for the questionnaire. Respondents were filtered from screening question to ensure they were meeting the target respondents that have some understanding of personalised cosmetic.

### Measures

The questionnaire contained 37 items exploring the 9 variables impacting online personalised cosmetics purchase intention (Appendix 1.) The items were grouped into 3 main sections. The first was a set of screening questions, while the second section was demographic. Then third section measured the 8 independent variables (perceived value, brand image, trust, attitude toward product, attitude toward brand, E-WOM, need for uniqueness, and attitude toward online shopping.) and also measured the dependent variable (purchase intention). The questionnaire contained a 5-point Likert scale, starting with "strongly disagreed" (1) to "strongly agree" (5). However, 3 experts tested the questionnaire scores prior to the collection of the data in order to ensure that the objective of item congruence was greater than 0.6. Respectively a pilot study was conducted of 30 respondents to assess the reliability of this research and demonstrated alpha coefficients exceeding 0.7, signifying their reliability and suitability as research instruments for this investigation. The internal consistency of the questionnaire has been evaluated by Cronbach's alpha reliability coefficient. They were reliable and appropriate to be used as research tools since all of the constructs included in this study had an alpha coefficient above 0.7.

### Results

#### Demographics, descriptive analysis of observed variables, and assessment of normality

In this study, a total of 500 female consumers responded to the questionnaire. A total of 500 female sample; 38.08 percent of between 30-39, 30.06 percent aged between 40-49, 15.83 percent aged between 20-29, 16.03 percent aged over 50 and 11.22 percent less than 19 years old. In addition; average spent online of dairy time; 45.80 percent 5-7 hours, 25.40 percent more than 8 hours, 23.00 percent of the sample spending 2-4 hours diary, and 5.80 percent less than 1 hour (Table 1).

The 5-point Likert scale measured respondents' perceptions of the 9 observed variables (perceived value, brand image, trust, attitude toward product, attitude toward brand, E-WOM, need for uniqueness, and attitude toward online shopping and purchase intention) Descriptive statistics (mean and standard deviation) were calculated and used to interpret the levels of agreement of the respondents on the observed variables impacting their online purchase intention. The mean values of the observed variables ranged from 3.45 to 4.14, and the standard deviations ranged from 0.55 to 0.68. The descriptive statistics and assessments of normality are detailed in **Appendix .2** The overall values of skewness and kurtosis of this paper were acceptable.

**Table 1 Analysis of demographic characteristic (n=500)**

Demographic and Behavior Data (n=500)	Frequency	Percentage
Age (years)		
< 19	56	11.22%
20-29	79	15.83%
30-39	190	38.08%
40-49	150	30.06%
>50	80	16.03%
Average spent online of daily time		
< 1 h	29	5.80%
2-4 h	115	23.00%
5-7 h	229	45.80%
>8 h	127	25.40%

### Confirmation factor analysis

CFA was used prior for analyzing the measurement model with structural equation model (SEM). The result of CFA indicated that all items in each variable are significant and have factor loading to prove discriminant validity. Guidelines recommended by Hair et. al. (2006) is also employed in defining the significance of factor loading of each item and acceptable values in defining the goodness of fit. Factor loadings are higher than 0.50 and p-value of lower than 0.05. Furthermore, aligning with the recommendation from Fornell and Larcker (1981), if Average Variance Extracted (AVE) is less than 0.5, but Composite Reliability (CR) is higher than 0.6, the convergent validity of the construct is still adequate.

All 4 criteria were met (Table 2). All the observed variables had a factor loading exceeding the recommended minimum of 0.586. Cronbach's alpha values were above the minimum of 0.777. The AVE values for all constructs exceeded the minimum of 0.469, and the CR values met the minimum of 0.779. These results demonstrate that all of the constructs in this study achieved an acceptable level of convergent validity. Campbell and Fiske (1959) introduced the concept of discriminant validity in their research on evaluating test validity. They emphasized the importance of employing identification and convergence verification techniques when evaluating new tests. Discriminant validity occurs when the number of trait-correlation evaluations is > 2. with standard errors less than 1.00. According to the data of discriminant validity (Table 3), the square roots of AVE demonstrated in the diagonal were 0.688, 0.724, 0.852, 0.702, 0.702, 0.686, 0.709, 0.844 and 0.685.

**Table 2 Confirmatory Factor Analysis Result, Composite Reliability (CR) and Average Variance Extracted (AVE)**

Variables	Factors Loading	CR	AVE
Perceived Value	0.651-0.787	0.815	0.525
Brand Image	0.822-0.898	0.888	0.726
Attitude toward product	0.687-0.723	0.829	0.492
Attitude toward brand	0.641-0.764	0.794	0.492
Need for Uniqueness	0.586-0.735	0.816	0.471
Trust	0.587-0.802	0.780	0.473
E-WOM	0.686-0.733	0.801	0.502
Attitude toward Online Shopping	0.646-0.729	0.779	0.469
Online Purchase Intention (PI)	0.816-0.878	0.908	0.713

Note: CR = Composite Reliability, AVE = Average Variance Extracted, \*=p-value<0.05

Based on these statistical data, discriminant validity for this study was achieved. Since convergent and discriminant validity were proven, construct validity was established. Based on the suggestion by Hair et al., 2006 the following criteria were used to determine model chi-squared goodness of fit statistic over degrees of freedom (CMIN/DF); goodness-of-fit index (GFI); adjusted goodness-of-fit index (AGFI); normed fit index (NFI); comparative fit index (CFI); Tucker-Lewis index (TLI); and root mean square error of approximation (RMSEA). A research model with a good fit meets the following criteria: CMIN/DF< 3.00 (Hair et al., 2006); GFI, AGFI, NFI, CFI, TLI, IFI  $\geq$  0.85 (Kline, 2010) and RMSEA $\leq$  0.05 (Pedroso et al., 2016). The research model exceeded every criterion and achieved an acceptable model fit (Table 3).

**Table 3 Discriminant Validity**

	T	PV	BI	AP	AB	UNI	EWOM	PI	AO
T	0.688								
PV	0.268	0.724							
BI	0.313	0.538	0.852						
AP	0.295	0.525	0.542	0.702					
AB	0.170	0.407	0.429	0.277	0.702				
UNI	0.287	0.622	0.651	0.530	0.628	0.686			
EWOM	0.217	0.648	0.648	0.621	0.342	0.605	0.709		
PI	0.256	0.421	0.730	0.502	0.372	0.621	0.574	0.844	
AO	0.262	0.612	0.593	0.579	0.440	0.620	0.528	0.485	0.685

Note: The diagonally listed value is the AVE square roots of the variables

## Structural equation model

The objective of this section was to evaluate and verify the structural instrument. After the first data examination stage in SEM, the investigators confirmed the goodness of fit for the SEM. Two classifications of the goodness of fits were performed to modify the SEM matrix. They included CMIN/DF, GFI, AGFI, and RMSEA from the absolute fit indices; and CFI and TLI from the incremental fit indices.

Next, the investigators modified the matrix according to the modification indices. The covariance was used to determine the interrelated deviation correlate and hence to obtain better fitness for the SEM matrix. The goodness-of-fit results before and after adjustment are summarized in Table 4. Alternative hypotheses were examined after modifying the structural equation matrices whose goodness of fit matched the relevant standards. Table 5 details the hypothetical test results of the alternatives Direct, indirect, and total effects

**Table 4 Goodness of Fit for Measurement Model**

Index	Acceptable Values	Statistical Values
CMIN/DF	< 3.00 (Hair et al., 2006)	891.547/593 = 1.503
GFI	≥ 0.85 (Kline, 2010)	0.914
AGFI	≥ 0.85 (Kline, 2010)	0.898
NFI	≥ 0.85 (Kline, 2010)	0.905
CFI	≥ 0.85 (Kline, 2010)	0.966
TLI	≥ 0.85 (Kline, 2010)	0.962
IFI	≥ 0.85 (Kline, 2010)	0.966
RMSEA	≤ 0.05 (Pedroso et al., 2016)	0.032
<b>Model summary</b>		Acceptable Model Fit

Remark: CMIN/DF = The ratio of the chi-square value to degree of freedom, GFI = goodness-of-fit index, AGFI = adjusted goodness-of-fit index, NFI = normalized fit index, CFI = comparative fit index, TLI = Tucker-Lewis index, IFI = Incremental Fit Index, and RMSEA = root mean square error of approximation

This research has 8 independent variables (perceived value, brand image, trust, attitude toward product, attitude toward brand, E-WOM, need for uniqueness, and attitude toward online shopping.) and also measured the dependent variable (purchase intention). The statistical results were related to the direct, indirect, and overall impacts of the 8 variables. The significance of each variable was examined by analyzing its standardized path coefficient ( $\beta$ ) and t-value, as depicted in Table 5.11 and Figure 5.4. The hypotheses were supported at  $p$ -value < 0.05. The strongest significance was shown in the relationship between need for uniqueness has significant impact on attitude toward online shopping at the value of  $\beta = 0.711$  and t-value = 11.022. The second-order relationship between attitude toward product and E-WOM is reflected by a significant  $\beta$  value of 0.611 and a t-value of 9.787, as indicated in the analysis. Later, there was the significance impact between attitude toward brand and online purchase intention indicated  $\beta = 0.385$  and t-value = 5.698. Next, the relationship between attitude toward product and online purchase intention was supported at the level of  $\beta = 0.373$  and t-value = 5.133. Attitude toward brand has significant impact on E-WOM at  $\beta = 0.293$  and t-value = 5.422. Brand image has significant impact on trust at  $\beta = 0.266$  and t-value 4.068. The impact of E-WOM on online purchase intention is significant,

with a  $\beta$  value of 0.193 and a t-value of 2.653. Last, trust also shows a significant impact on online purchase intention, with a  $\beta$  value of 0.088 and a t-value of 2.041. On the other hand, the result reported the nonsupport between perceived value has significant impact on trust at the level of  $\beta = 0.123$  and t-value = 1.845 as well as attitude toward online shopping has significant impact on online purchase intention at the level of  $\beta = -0.087$  and t-value = -1.461. The results of this study provide confirmation of the significant impact of H2, H3, H4, H5, H6, H7, H8. However, H1 and H10 were found to be insignificant as the test results did not support them.

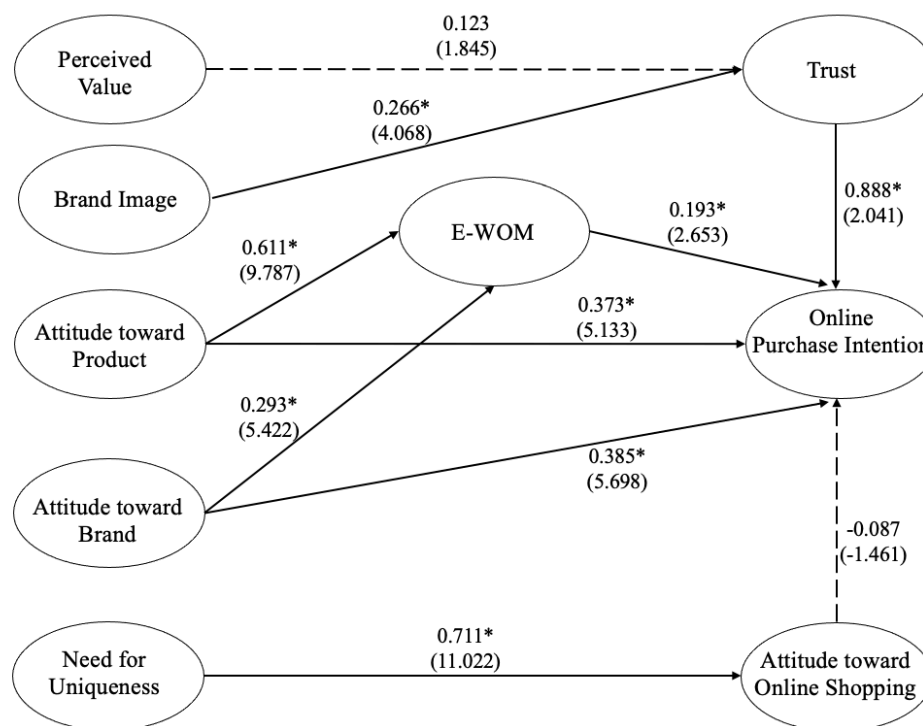


Figure 2 Results of structural model.

Table 5 Hypotheses Testing Result of the Structural Model

Hypothesis	Standardized coefficient ( $\beta$ )	t-value	Test result
H1: Perceived value has significant impact on trust	0.123	1.845	Not Supported
H2: Brand image has significant impact on trust	0.266	4.068*	Supported
H3: Attitude toward product has significant impact on E-WOM	0.611	9.787*	Supported
H4: Attitude toward brand has significant impact on E-WOM	0.293	5.422*	Supported
H5: Need for uniqueness has significant impact on attitude toward online shopping	0.711	11.022*	Supported
H6: Trust has significant impact on online purchase intention	0.888	2.041*	Supported

Table 5 Hypotheses Testing Result of the Structural Model (Cont)

Hypothesis	Standardized coefficient ( $\beta$ )	t-value	Test result
H7: E-WOM has significant impact on online purchase intention	0.193	2.653*	Supported
H8: Attitude toward product has significant impact on online purchase intention	0.373	5.133*	Supported
H9: Attitude toward brand has significant impact on online purchase intention	0.385	5.698*	Supported
H10: Attitude toward online shopping has significant impact on online purchase intention	-0.087	-1.461	Not Supported

Note: \*=p-value<0.05

## Discussion

This study accomplishes its objective on surveying the factors impacting online purchase intention to personalized cosmetic products among online female users who have experience doing it and Facebook members for at least one year. A total of 500 online female consumers that have been a member of any cosmetic fan page were tapped for the investigational case study. The literatures were reviewed to examine all relevant theories and references and clarified all the significant impact of the online personalized cosmetic purchase intention. In this study, the determinants of personalized cosmetic online purchase intention were adapted from TRA and TPB including perceived value, brand image, trust, attitude toward product, E-WOM, attitude toward brand, need for uniqueness, attitude toward online shopping, online personalized cosmetic purchase intention.

Per the findings, the significant factors are discussed in this part. Firstly, hypotheses one was insignificant relationships found in this study which contradicted with numerous scholars. Firstly, hypothesis one showed insignificant relationship among perceived value and trust in personalized cosmetic products. The results indicate that despite consumers obtaining a high perceived value from personalized cosmetic products, it does not necessarily result in an increased belief in the products. This finding deviates from previous studies conducted by Nel and Marawule (2018), Berraies et al. (2017), Lhawonk, (2014), which established a positive impact of perceived value on trust.

Secondly, hypothesis two revealed that brand image significant impact on trust which was explained that brand image is a foundation of consumer trust in personalized cosmetic products. This study supports the findings of earlier findings that brand image impact trust (Zhang, 2010; Chinomona, 2016). When consumers perceive a cosmetic brand positively, it instills a high level of trust in personalized cosmetic products. For online female consumer, their trust in the products they consume by what they purchase, along with the brand image of a product.

Moreover, the results on hypothesis three and hypothesis four indicated that both consumers' attitude toward a product and attitude toward a brand significant impact on E-WOM. Generally, consumers who actively engage with cosmetics fan pages demonstrate that their purchase intention is influenced by various attitude factors. Besides their affinity for the product or brand, the E-WOM plays a pivotal role in shaping their final purchase decision. As a result, it is essential for brands to focus on cultivating community loyalty by catering to shared interests and fostering strong member connections. Consequently, followers of social media groups develop a sense of fondness for a particular product or brand based on the evaluations and experiences shared by others. This fondness then plays a crucial role in determining whether they choose to engage with E-WOM messages and, ultimately, affects their intention to make a purchase from the brand or acquire the product.

Afterward, the fifth hypothesis has the strongest significance and showed the relationship between need for uniqueness significant impact attitude toward online shopping. Similarly, in line with the mainstream of e-service, it has been found that consumers with a strong need for uniqueness tend to have a more positive inclination towards online shopping. In this regard, an alternative explanation is that online shopping provides consumers with convenient access to unique products and rare items. This finding aligns with the insights presented in the Global Online Consumer Report (Willy, 2017).

Moreover, the results of the sixth hypothesis indicate that consumers' trust in the product is influenced by their perception of trustworthiness in previously accepted cosmetic products. The presence of a strong trust attitude among consumers has a significant impact on their increased intention to purchase personalized cosmetic products online. The results of this study confirmation the research performed by (Lhawonk , 2014).

Besides, the hypothesis seven is E-WOM significant impact to online purchase intention. This is indicated that E-WOM messages are an important means by which consumers may get information about the quality of the service or product (Chevalier & Mayzlin, 2006). Another finding of this study is that EWOM has a direct impact on purchase intention.

Next hypothesis eight and nine is attitude toward a product and attitude toward a brand has a significant impact to the online purchase intention. The results obtained were found in relevant studies (Elseidi & El-Baz, 2016). Generally, consumers who actively engage with cosmetics fan pages are influenced by attitude factors that impact their purchase intention. Additionally, the level of consumer fondness for the product or brand serves as a strategic factor that drives their final purchase decision.

Lastly, the thypothesis tenth was the relationship between attitude towards online shopping online purchase intention was found insignificant. This finding is not supported in other conclusions where attitude has impact on online purchase intention when participants already have knowledge of online shopping (Hernandez et al., 2009). These findings also opposing that after consumers have positive attitudes about corresponding e-retailers, in general originated when whatsoever they view on their website, the more possible they create online activity and online purchasing process this is reliable with existing investigate (Soh et al., 2017). However, when consumers come by negative attitudes about product or service they will disfavor the e- retailer. Although all respondents in our study are a Thai member of Facebook and has been a member of cosmetic Fan pages more than one year, they still observe that the internet circumstances is unreliable and they are not confident, which is consistent with prior research (McCole et al., 2010).



## Implications for Theory

It can be concluded that the intention of consumers to purchase personalised cosmetic products was determined by trust, E-WOM, attitude toward products and attitude toward products brand. Moreover, trust is impact by brand image. The E-WOM was impact by attitude toward products and attitude toward products brand. Attitude toward online shopping impact by need for uniqueness. This suggests that the personalised cosmetic consumer is driven to buy by both internal and external factors. Thus, the results of this study support the theory of TRA and TPB (Ajzen, 1980) in the context of personalised cosmetic products. The finding of this study expected to contribute to the development of marketing theory. Specifically related to consumer purchase intention of online personalised cosmetic products, as well as the development of the concept of consumer on demographics as Thai female consumer.

## Conclusion

This study aimed to comprehensively analyze the important factors impacting purchase intention of buying online personalised cosmetic products of females Facebook member in Thailand. The researcher proposed ten hypotheses in the conceptual framework to investigate the factors impact on online purchase intention. Furthermore, after the questionnaire was organized and confirmed reliability, the questionnaire was distributed online to 500 females and all of respondents be a member of Facebook more than one year and be member of cosmetic fan pages with experience of using top three cosmetic brands. With the collected data, CFA was adopted to measure and test validity and reliability of research conceptual model. SEM was also employed to analyze and discuss the factor impacting purchase intention to buy online personalised cosmetic products for female Facebook members. Eight out of then hypotheses proposed were supported and proven fulfill research objectives. The finding of this research can be summarized as following: first, trust was the strongest predictor of purchase intention to buy online personalised cosmetic products. Trust had determined the power on confirmation that support of approaching action of purchase intention (See-To & Ho, 2014). In conclusion, building trust was critical to building customer confidence and trustworthiness. Brand trust was the belief that customers have in a brand to deliver on its promises. When consumers trust a company or product, they have greater confidence in purchasing decisions and are more likely to be faithful customers. Trust was critical because it was the foundation of any successful relationship, including the relationship between a brand and its customers.

Secondly, the precursors that significantly contributed to trust was brand image. Regarding to Chinomona (2016), Zhang (2010), and Erkmen and Hancer (2019) exposed that brand image has an impact on buyer trust. It was crucial for brand to success that brand have a strong brand image. Potential customers were better placed to choose brand over the competition due to a strong and consistent brand image, which they regard as credible and reliable. Also, consumers were more likely to associate a brand image with brand or product if company target their audience correctly and attract them into it in the first place.

## Recommendations

The researcher identified key factors of brand image, trust, E-WOM, attitude toward product and attitude toward brand impacting online purchase intention in context of personalised cosmetic products. The above key factors should be developed and promoted in order to gain purchase intention. Excluding perceived value and attitude toward online shopping. In this research, trust was the strongest predictor of E-WOM, attitude toward product, attitude toward brand and online purchase intention to buy online personalised cosmetic products. Hence, long-term action plan within which a system of coordinated actions aimed at developing, maintaining, and increasing trust must be emphasized. Building trust goes beyond delivering quality products or services. Managers should carefully attend to strategies that result in a conceivably positive experience. A positive service experience may be the key to returning business. This is especially important since maintaining customers is more efficient than acquiring new ones. The need of uniqueness presented the strongest impact on attitude toward online shopping. In summary, this study explains in detail that factors impacting the online purchase intention of personalised cosmetic product. It provides cosmetic brand, developer and marketer of beauty industry that impact female consumer to buy personalised cosmetic product can be applied to project, investment and make full use of personalised cosmetic product.

## Limitations of Research

There were certain limitations to this study that need to be noted and the following were recommendations for further research. First, this study was only focusing only female Facebook members in Thailand. The scope and sample size were limited. Second, is important to note that the limitation of this study lies in its broad focus on a wide range of cosmetic products, without specific emphasis on any particular product. Therefore, in future researchers are recommended to conduct a comparative test using specific product. It is also recommended in future studies to conduct research of different generations and age groups towards personalized cosmetic products. In addition, qualitative research may be added for better understand of women's online purchase intention for personalised cosmetic product.

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