ผลของการใช้การสื่อสารปากต่อปากแบบอิเล็กทรอนิกส์ที่มีต่อความตั้งใจในการซื้อสินค้าประเภทความงามและการเสริมสวย – กรณีศึกษาแอปพลิเคชันไลน์บนมือถือในประเทศไทย

The Effect of Electronic Word of Mouth (eWOM) Engagement Toward Purchasing Intention of Beauty and Grooming Products : A Case of LINE Mobile Application in Thailand

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บทคัดย่อ

งานวิจัยนี้เพื่อศึกษาบทบาทของผู้ใช้งานและลักษณะของระบบของการมีส่วนร่วมในการกระจายข้อมูลโดยการบอกปากต่อปากแบบอิเล็กทรอนิกส์ รวมถึงความตั้งใจในการซื้อผลิตภัณฑ์เพื่อความงามและผลิตภัณฑ์ดูแลผิว การวิจัยใช้กรณีศึกษาจากแอปพลิเคชันไลน์บนมือถือ ซึ่งเป็นเครือข่ายโซเชียลที่มีกลุ่มผู้ใช้ผลิตภัณฑ์ด้านความงามและผลิตภัณฑ์ดูแลผิว รวมทั้งกลุ่มผู้สนใจจากการสำรวจผู้ใช้งานไลน์ที่เป็นคนไทย รวมทั้งยังเป็นสมาชิกของกลุ่มไลน์ผู้ใช้ผลิตภัณฑ์ด้านความงามและผลิตภัณฑ์ดูแลผิว โดยได้ดำเนินการศึกษาจากกลุ่มตัวอย่าง การวิเคราะห์ข้อมูลใช้สถิติเชิงพรรณนา การสร้างแบบจำลองสมการโครงสร้าง และการวิเคราะห์ปฏิสัมพันธ์ระหว่างตัวแปร ผลการวิจัย พบว่า ลักษณะของผู้ใช้งานที่ประกอบด้วย ความพึงพอใจของผู้ใช้งาน ความคล้ายคลึงกันของผู้ใช้ ความสัมพันธ์ระหว่างผู้ใช้งาน และความกังวลของผู้ใช้งานที่มีต่อผู้อื่นล้วนมีอิทธิพลต่อการมีส่วนร่วมในการกระจายข้อมูลโดยการบอกปากต่อปากแบบอิเล็กทรอนิกส์ โดย ผลกระทบสูงสุด คือ ด้านของความคล้ายคลึงกันของผู้ใช้งาน ลักษณะของระบบที่ผู้ใช้งานรับรู้ได้ว่าเป็นระบบที่ใช้งานได้ง่าย และมีประโยชน์ต่อการใช้งานล้วนมีความสำคัญต่อการมีส่วนร่วมในการกระจายข้อมูลโดยการบอกปากต่อปากแบบอิเล็กทรอนิกส์ ซึ่งส่งผลมากกว่าคุณลักษณะของผู้ใช้งาน การมีส่วนร่วมของการกระจายข้อมูลโดยการบอกปากต่อปากแบบอิเล็กทรอนิกส์ส่งผลอย่างมีนัยสำคัญต่อความตั้งใจในการซื้อผลิตภัณฑ์ โดยเฉพาะในผลิตภัณฑ์ที่มีผู้รีวิว หรือ แสดงความเห็นแล้ว โดยมีค่าเบต้า 0.380 นอกจากนี้ยังพบผลจากปฏิสัมพันธ์ซึ่งเป็นผลจากการเกิดอิทธิพลปฏิสัมพันธ์ระหว่างตัวแปรอิสระกับตัวแปรควบคุมในปัจจัย

ดังต่อไปนี้ อายุ ระดับการศึกษาและระดับรายได้ การค้นพบนี้มีความสำคัญเนื่องจากได้รวมทั้งปัจจัยของระบบและ ปัจจัยผู้ใช้งานในการมีส่วนร่วมของการกระจายข้อมูลโดยการบอกปากต่อปากแบบอิเล็กทรอนิกส์และตรวจสอบผลต่อประชากรในกลุ่มผู้ใช้งานซึ่งมีความสำคัญมากขึ้น เนื่องจากพบการใช้การกระจายข้อมูลโดยการบอกปากต่อปากแบบอิเล็กทรอนิกส์ที่กระจายตัวในประเทศไทยและกลายเป็นแหล่งข้อมูลของผู้บริโภคที่พบบ่อยมากขึ้น

คำสำคัญ: การมีส่วนร่วมในการกระจายข้อมูลโดยการบอกปากต่อปากแบบอิเล็กทรอนิกส์ การสื่อสารระหว่างผู้ใช้ รูปแบบการยอมรับเทคโนโลยี การกระจายข้อมูลแบบการบอกปากต่อปากทางอิเล็กทรอนิกส์

Abstract

This research investigates the role of user and system characteristics in electronic word of mouth (eWOM) engagement and purchase intention for beauty and grooming products. The research uses a case study of LINE, a social network which has an active community of beauty and grooming product users and interest groups. A survey of Thai LINE users who are members of cosmetic and grooming communities on LINE was conducted. The analysis included descriptive statistics, structural equation modelling (SEM) and moderation analysis. The results showed that user characteristics including user preference, user similarity, user interaction and user concern for others, influenced eWOM engagement, with the strongest effect from user similarity (homophily). System characteristics of perceived ease of use and perceived usefulness were also significant for eWOM engagement, having a stronger effect than user characteristics. eWOM engagement had a significant effect on purchase intention for reviewed products (B = .380). Moderation effects were also observed for age, education level, and income level. The findings are significant because they integrate both system and user factors in eWOM engagement and examine demographic effects for users, which are increasingly important as online use of eWOM spreads in Thailand and it becomes a more frequent source of consumer information.

Keywords: eWOM engagement, User interaction, Technology acceptance model, Electronic word of mouth

Introduction

The world of marketing is changing rapidly with the onset of digital media. In traditional mass media marketing, the marketer communicates in a one-way fashion with consumers about the benefits and characteristics of the product, but consumers may have limited access to outside information from other sources (Chaffey & Ellis-Chadwick, 2019). The introduction of digital market, and later social marketing, in the late 1990s changed this situation entirely. The introduction of Web 2.0-based social media sites meant that suddenly, consumers could discuss products and services, allowing their reviews, opinions and advice to reach far beyond their personal social circle (Tuten & Solomon, 2017). Thus, the development of social media markets the transition from word of mouth (WOM) to electronic word of mouth (eWOM).

WOM, or information and advice provided from consumer to consumer based on their own experience, has been present for centuries (Hennig-Thurau *et al.*, 2004). However, prior to the development of the Internet and social media, the reach of any one consumer was limited to their friends and family – they could give and receive WOM within this circle, but it was difficult to access consumer experiences outside. eWOM, which is offered through social media sites and review sites (Hennig-Thurau *et al.*, 2004), changed this situation significantly, as consumers giving and receiving eWOM can reach far outside their personal social circle. Thus, understanding what influences people to seek out and provide in eWOM and how this affects the consumer behaviour of people.

eWOM engagement is the set of consumer engagement behaviours that surrounds giving and receiving eWOM (Gvili & Levy, 2018). Such behaviours, which include passively seeking eWOM, soliciting eWOM, and providing eWOM (either proactively or in response to eWOM solicitations) can be divided into two categories – intent to receive (ITR) and intent to send (ITS) eWOM (Gvili & Levy, 2018). However, the literature review revealed that there are some research gaps that can be addressed through this study. The main gap is that no studies have been conducted on Line or in Thailand. This research gap is significant, since Line and Thai users of Line represent a unique population and research setting that may not be consistent with other online settings where research has been conducted. Thus, it is possible that investigating this setting would yield a better understanding of the formation of online purchase intention.

The objective of this research is to examine the interaction between user characteristics and technology characteristics in the formation of eWOM engagement and the role eWOM engagement plays in the purchasing decision. Beauty and grooming products were chosen as the customer focus because of the rapid growth of the sector in the Thai market. Thus, this study addresses these objectives through a quantitative survey of Thai beauty consumers who use LINE for beauty and grooming products information. The objectives were accomplished using a consumer survey of Thai LINE users. The research framework explained in the following section offers insight into the existing knowledge and theories that relate to these questions.

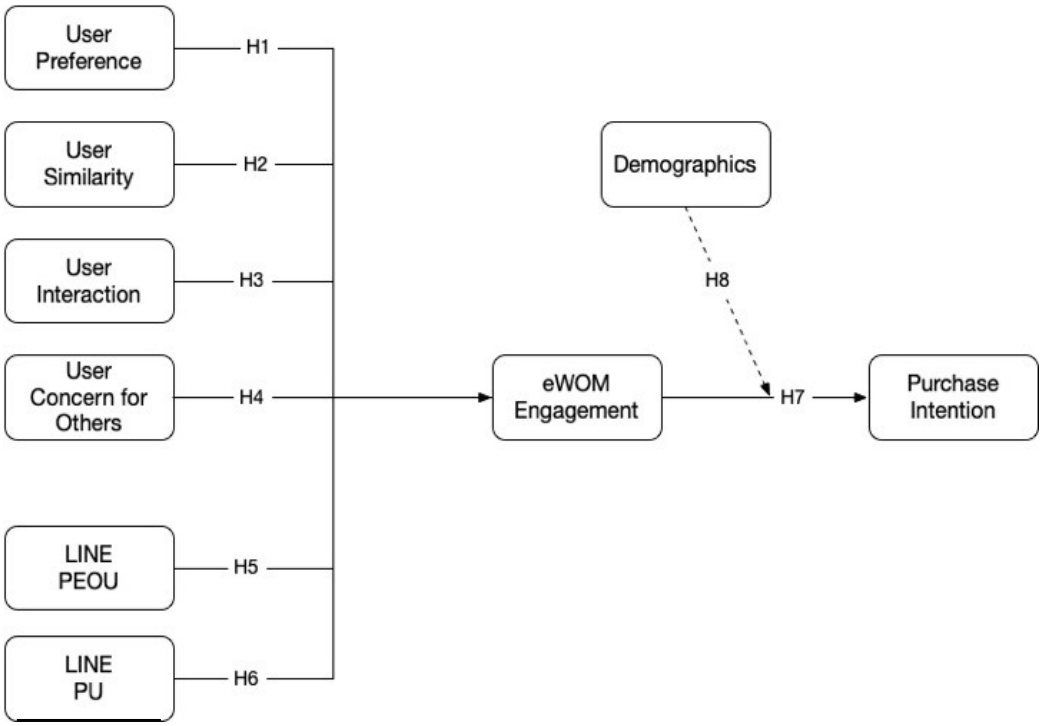

Figure 1 Conceptual framework of the paper

Methodology

Population and sampling

The target population of this research included Thai people who use the LINE mobile application and are members of at least one group. LINE was the third most active social media platform in Thailand as of 2019, with 85% of Thai Internet users having a LINE

account. This makes Thailand LINE's second largest user market after Japan, with about 44 million users (or 26.8% of the active user base).

The size of the population means that it can be treated as an effectively infinite population size (Anderson, Sweeney & Williams, 2018). The sample size was determined based on the number of parameters in the models and constructs, and with the recognition that SEM-based approaches require larger sample size than traditional regression models (Westland, 2010). The minimum sample size was set to 400 members. The final sample size was 408 members.

To select the sample, a convenience sampling approach was used. Participants were recruited from LINE groups that were related to beauty product reviews and recommendations, to ensure that the participants had a minimum level of involvement or interest in the topic of the study. Participants were self-selected, responding to the recruitment message and clicking through to the online platform. The six-point scale was used for measurement items. These were adapted from previous studies (Mao & Lyu, 2017; Yang (2012))

Data collection

Data collected was conducted using an online platform. The data collection used a questionnaire developed by the researcher, drawing on the literature review but not adapted from existing instruments. Six-point Likert scales were used to assess the structural items, since these items were primarily attitudinal and experiential in nature (Azzara, 2010). The six-point scale was chosen, rather than a five- or seven-point scale, to mitigate central tendency bias (Subedi, 2016). Demographic and behavioural data was also collected from participants. The questionnaire was developed in English and back-translated to Thai by professional translators for accuracy (Chen & Boore, 2010).

A pilot test was conducted using the first 40 questionnaires collected to evaluate the scale structure. Internal consistency was tested using Cronbach's alpha, with a minimum value of .700 for acceptance of the initial structure (Bryman & Bell, 2015). Confirmatory factor analysis (CFA) was used to test the individual items, with individual factor loadings below .600 removed due to poor internal correlations with the other scale items (Brown, 2015). Table 1 summarizes the items, sources and alpha coefficients for the questionnaire items, as well as the final items included and excluded following the factor analysis.

Table 1 Summary of questionnaire and pilot testing outcomes

Scale	Initial Items	Alpha	Excluded Items
User Preference	6	.838	UP1
User Similarity	6	.835	
User Interaction	4	.803	
User Concern for Others	5	.912	UC4
LINE Ease of Use	4	.915	
LINE Usefulness	7	.900	LU4
eWOM Engagement	6	.852	eWOM6
Purchase Intention	3	.891	

Data analysis

Data analysis was conducted in SPSS AMOS. A three-step analysis process was used. The process began with descriptive statistics for all variables. Next, structural equation modelling (SEM) was used to test the direct hypotheses of the study. The SEM approach was selected because it is ideal for testing interactions and complex models (Byrne, 2016). A measurement model was developed using CFA to test the relationship of the observed and latent variables (Schumacker & Lomax, 2010). This was then followed by a structural model, which tested internal relationships and was used to assess the hypotheses. Hypotheses were assessed based on the regression coefficients ($p < .05$).

Moderation effects were tested using chi-square tests between the constrained and unconstrained models for age, education and income. Moderation effects were accepted based on the significance of the chi-square test ($p < .05$).

Result

Preliminary analysis

Reliability, convergent validity and discriminant validity was tested using composite reliability (CR) and average variance extracted (AVE). CR for the constructs ranged from 0.894 to 0.973, all higher than the lower threshold of .700 for adequate reliability (Hair *et al.*, 2016). AVE values ranged from 0.679 to 0.902, which are also higher than the floor of .500 for this criterion (Hair *et al.*, 2016), demonstrating convergent validity. Discriminant validity is evaluated by comparison of correlations and AVE (Table 2). All items showed AVE > r (Hair

et al., 2016). Thus, the constructs used demonstrated internal consistency reliability and adequate factor loadings (Table 1) as well as composite reliability and convergent and discriminant validity.

Table 2 Correlations and AVE of constructs

	UP	US	UI	UC	LE	LU	EW	PI
UP	**0.824**							
US	0.265***	**0.908**						
UI	0.108*	0.250***	**0.918**					
UC	0.176**	0.309***	0.302***	**0.895**				
LE	0.177**	0.198***	0.363***	0.222***	**0.950**			
LU	0.348***	0.359***	0.328***	0.293***	0.266***	**0.933**		
EW	0.351***	0.491***	0.479***	0.470***	0.457***	0.573***	**0.922**	
PI	0.412***	0.275***	0.181***	0.147**	0.266***	0.343***	0.438***	**0.865**

Note: Diagonal elements are the squared root of AVE for each construct. *p < .05, **p < .01, ***p < .001.

Respondent demographics

Respondent demographics are summarised in Table 2. The sample included slightly more female respondents (54.7%) than male ones, but a chi-square test reveals that this is not significantly different from the expected equal distribution ($\chi^2(1) = 3.539$, $p = .06$). 87.5% of the sample was aged 30 and under, while 89.5% held at least a Bachelor's degree. The majority of respondents were employed by private companies (64%). Most had incomes of 20,000 to 39,999 baht/month (52.7%) or over 40,000 baht/month (27.5%). This indicates that the average respondent to the survey was young, well-educated, privately employed and had a moderate to high income.

Table 3 Respondent demographics

Characteristics	Number	Percentage
Gender		
Male	185	45.30
Female	223	54.70
Age		
Below 25	212	52.00
26-30	145	35.50
31 and Above	51	12.50
Education		
Below Bachelor Degree	43	10.50
Bachelor Degree	293	71.80
Master Degree	72	17.70
Occupation		
Private	261	64.00
Public	78	19.10
Freelance	69	16.90
Income		
Below 19,999 BAHT	81	19.90
20,000-39,999 BAHT	215	52.70
More than 40,000 BAHT	112	27.50

Structural model and regressions

The structural model (Figure 2) demonstrated acceptable goodness of fit (χ^2/df 2.316, CFI = 0.957, NFI = 0.927, RMSEA = 0.057, HOELTER = 202). These values indicate that the model meets or exceeds criteria on both absolute and relative fit measures (Byrne, 2016).

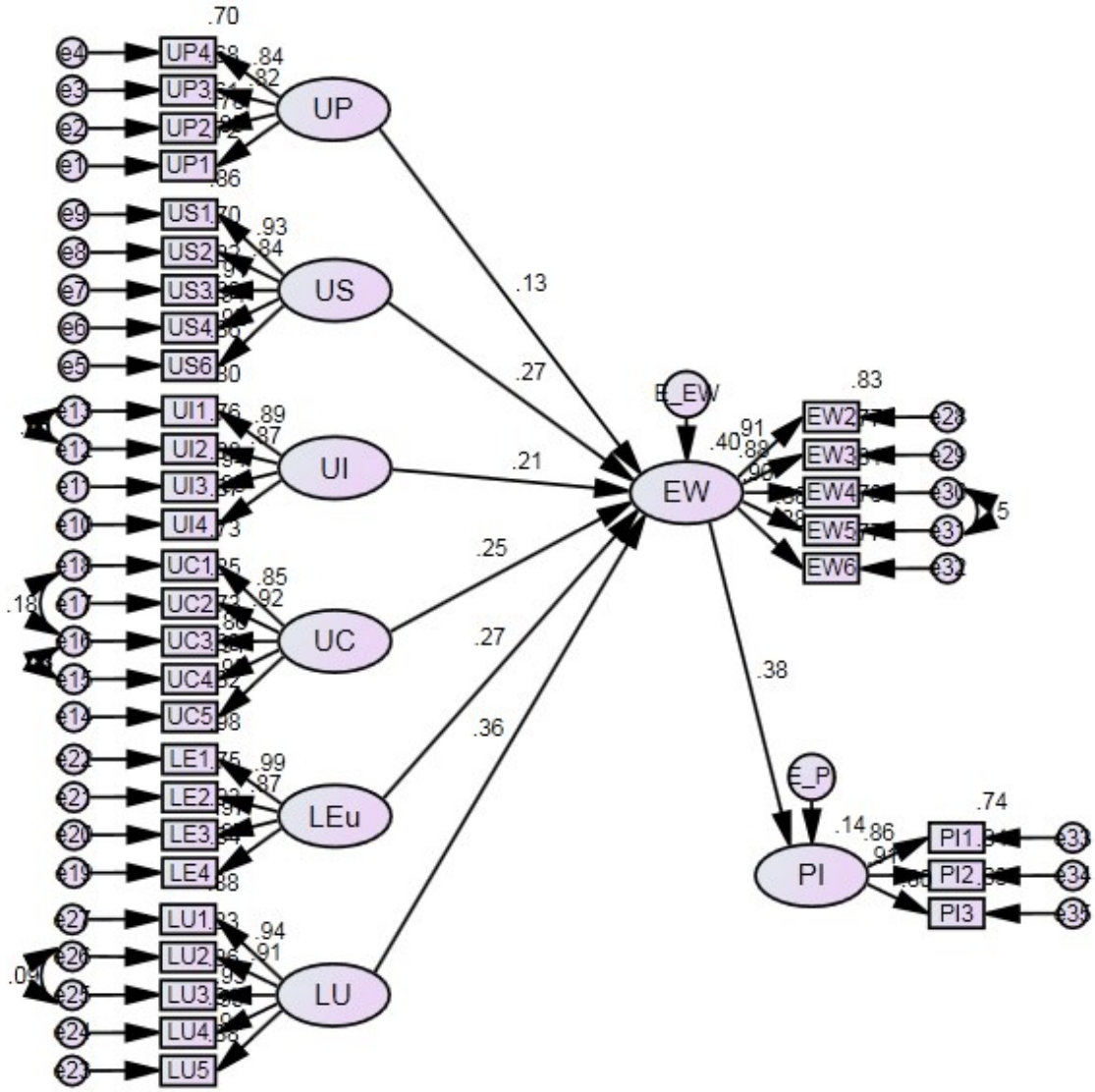

Figure 2 Structural model

To evaluate the hypotheses, the standardised coefficients and significance (p-value) of the regression relationships is assessed. This data is contained in Table 3. Assessment shows that the tested regression relationships were all significant. Of the factors tested in response to eWOM engagement (EW), the strongest factor observed was Line Usefulness (LU). This was followed by Line Ease of Use (LEU), User similarity (US), User concern for others (UC), User interaction (UI), and User preference (.128). Thus, the technology factors had the strongest influence on eWOM engagement, but user similarity and concern for others also had a relatively strong effect in eWOM engagement. The relationship between eWOM Engagement and Purchase Intention (PI) was also positive, strong and significant, indicating that eWOM engagement did influence the purchase intention for the product.

Table 4 Regression effects of internal relationships

Relationship	Standardized Coefficient (B)	p
UP ⟶ EW	.128	.003
US ⟶ EW	.267	<.001
UI ⟶ EW	.214	<.001
UC ⟶ EW	.251	<.001
LEU ⟶ EW	.270	<.001
LU ⟶ EW	.355	<.001
EW ⟶ PI	.380	<.001

Moderation effects

Moderation effects of demographic c factors (age, education level and income level) were tested using chi-square and degrees of freedom (df) for constrained and unconstrained models. Additionally, the standardised coefficients and significance for each group are calculated to provide additional support.

The moderation effects of Age are summarised in Table 5. The results showed that younger respondents had a steeper difference between constrained and unconstrained models. The difference in chi square was 60.577 in the Below-25 group. This fell to 34.094 in the 26-30 group, and to 13.975 in the Above 31 group. The standardised coefficients show that the EW ⟶ PI relationship is significant in all three groups. However, the effect size is strongest in the 26-30 years age group. Thus, there is a partial moderation of the EW ⟶ PI relationship, with respondents aged 26 to 30 showing the strongest effect of EW on PI.

Table 5 Moderation effects of Age in EW ⟶ PI

Age	Index	Fully Constrained Model	Unconstrained Model	Df	Standardized Coefficients	P-value
Below 25	Chi-square	1145.098	1084.521	60.577	0.359	0.000
	df	549	548	1		
26-30	Chi-square	961.953	927.859	34.094	0.426	0.000
	df	549	548	1		
Above 31	Chi-square	1045.155	1031.180	13.975	0.314	0.045
	df	549	548	1		

Moderation effects of Education Level are summarised in Table 6. Here, the differences between the constrained and unconstrained models were highest at the Bachelor's degree group, with a chi-square difference of 75.106. This fell to 18.076 for the Master's degree group, and fell further to 9.765 for the respondents with lower than a Bachelor's degree. The effects of EW on PI were significant for all three groups. However, there were differences in the standardized coefficients. For the Master's degree (B = .290) and Bachelor's degree (B= .393) groups, the effects size could be considered moderate. However, the Below Bachelor's degree group (B = .506) showed strong effect. Therefore, there is partial moderation of the EW ⟶ PI relationship, with the strongest effects shown for the respondents with the lowest education, and the weakest effects shown for those with the highest education level.

Table 6 Moderation effects of Education Level in EW ⟶ PI

Education Level	Index	Fully Constrained Model	Unconstrained Model	Df	Standardized Coefficients	P-value
Below Bachelor Degree	Chi-square	1100.254	1090.489	9.765	0.506	0.000
	df	549	548	1		
Bachelor Degree	Chi-square	1199.538	1124.432	75.106	0.393	0.000
	df	549	548	1		
Master Degree	Chi-square	884.072	865.996	18.076	0.290	0.017
	df	549	548	1		

The moderation effects of Income Level (Table 7) also show that there is a significant effect. The chi-square differences are strongest for the moderate income (20,000 to 39,999 baht/month) group, with a difference of 60.291. The high-income group (above 40,000 baht) had the next biggest difference at 29.262 points, while the low income group (below 20,000 baht) had a difference of 15.214 points. The effects sizes showed that overall, all three groups had a moderate effect size for EW ⟶ PI. However, the effect for the high-income group (B = .399) was higher than the others. This was followed by the medium-income group (B = .390) and the low-income group (B = .338). Thus, while the high-income and medium-income groups are relatively close, the low-income group had a lower effect. This indicates that income level does moderate the EW ⟶ PI relationship, with low-income respondents having a weaker effect of EW compared to middle- and high-income respondents.

Table 7 Moderation effects of Income Level in EW ⟶ PI

Income Level	Index	Fully Constrained Model	Unconstrained Model	Df	Standardized Coefficients	P-value
Below 19,999 THB	Chi-square	751.556	736.342	15.214	0.338	0.004
	df	549	548	1		
20,000 – 39,999 THB	Chi-square	1092.327	1032.036	60.291	0.390	0.000
	df	549	548	1		
Above 40,000 THB	Chi-square	867.025	837.763	29.262	0.399	0.000
	df	549	548	1		

Hypothesis summary

Table 8 Summarises the hypothesis outcomes of the study. As it shows, all main hypotheses (H1 to H7) were supported by the SEM outcomes. The analysis also showed that user age, education level and income level had moderating effects on the outcome, leading to the support of the three sub-hypotheses of H8 as well.

Table 8 Hypothesis outcomes

Hypothesis	Relationship	Outcome
H1	User Preference ⟶ eWOM Engagement	Supported
H2	User Similarity ⟶ eWOM Engagement	Supported
H3	User Interaction ⟶ eWOM Engagement	Supported
H4	User Concern for Others ⟶ eWOM Engagement	Supported
H5	Line Ease of Use ⟶ eWOM Engagement	Supported
H6	Line Usefulness ⟶ eWOM Engagement	Supported
H7	eWOM engagement ⟶ Purchase Intention	Supported
H8a	eWOM engagement⟶User Age⟶ Purchase Intention	Supported
H8b	eWOM engagement⟶User Education Level⟶Purchase Intention	Supported
H8c	eWOM engagement ⟶ User Income Level ⟶ Purchase Intention	Supported

Discussion

The findings of this study can be considered in three parts: factors in eWOM engagement, the relationship of eWOM engagement and purchase intention, and the moderating effects of demographic variables on the relationship of eWOM engagement and purchase intention.

The key finding of this research is that both individual user characteristics and user perceptions of the technology platform influence eWOM engagement. Here, the PU and PEOU of LINE did have the strongest influence on the overall eWOM engagement of users, but the effects of the individual characteristics like user preferences, user similarities, user interaction and user concern for others was also significant (though somewhat weaker). These findings follow several previous studies on both topics, as discussed in the research framework. However, where they make an advance on the existing research is by investigating the relative effects of both factors and examining a specific construct of eWOM engagement. The eWOM engagement construct goes beyond passive reading of eWOM, as used in previous studies, including both reading and sharing eWOM. This is particularly useful as it addresses the factors that lead consumers to overall eWOM engagement as a routine activity, rather than an activity that is only oriented toward resolving post-purchase cognitive dissonance as in earlier consumer models (Engel, Blackwell & Miniard, 1986; Blackwell, Miniard & Engel, 2005).

The relationship between eWOM engagement and purchase intention for the reviewed products was as expected, given the wide array of literature which has indicated that eWOM engagement (especially ITR, eWOM reading or passive eWOM engagement) influences the purchase intention for the products reviewed (Khammash & Griffiths, 2011; Cheung & Lee, 2012; Babić Rosario *et al.*, 2016; Elwalda, Lü & Ali, 2016; Saleem & Ellahi, 2017; Yusuf, Che Hussin & Busalim, 2018; Ismagilova *et al.*, 2019). Of course, this does not mean that the simple existence of eWOM will influence the consumer's purchase intentions. Among other problems, most consumers have access to (or can find) far more eWOM than they can read and use (Gottschalk & Mafael, 2017). Thus, this finding does not apply merely to eWOM that the user could access, but the eWOM that they have accessed and read. This is a crucial difference. This study does advance the state of knowledge on this question slightly because, unlike most of the studies reviewed, the eWOM engagement construct used here includes both ITR and ITS. Further knowledge about both facets of eWOM

engagement – not just ITR or reading as in previous studies – would be a helpful addition to the research in future.

The investigation of the moderation effects of demographic variables was exploratory in nature, given that there had been only a few studies that suggested such an effect (Bronner & de Hoog, 2011; Boo & Kim, 2013; Engelbertink & van Hullebusch, 2013; Kudeshia & Kumar, 2017; Zhang, Omran & Cobanoglu, 2017). Most of these studies suggested a moderation effect, but had not actually tested it directly. Thus, this research contributes to the literature by identifying that there is a potential moderating effect of demographics on the relationship of eWOM engagement and purchase intention. It should be noted that because this study drew on a very specific interest group (those with enough interest in beauty products to engage in beauty product groups on LINE), it is likely that the demographic characteristics may not remain stable. For example, it is possible that the moderation effect may go along with the demographic differences in interest, rather than being an inherent characteristic of the demographic group itself. Since this has been investigated so rarely, it is one of the main recommendations of this study for additional research.

Conclusion and Suggestions

This study set out to investigate the effects of individual and technology characteristics and demographics on eWOM engagement and purchase intention. It examined Thai consumers, focusing on LINE users who engage with beauty product interest groups on LINE. The findings showed that individual characteristics like user similarity and user concern for others did have a significant effect on eWOM engagement. User interaction and user preference also had a significant effect, although it was much weaker. The effect of LINE ease of use and usability were somewhat stronger. Thus, this finding shows that both of these factors are relevant in eWOM engagement, although the technology characteristics are somewhat stronger than the individual characteristics. The study also showed that eWOM engagement influenced purchase intentions. However, this relationship was moderated by demographic factors – respondents who were aged 26 to 30, had a lower education level and a higher income level all had a stronger relationship than others.

This study is an elaboration on the literature on eWOM because, rather than focusing on one aspect of eWOM (typically eWOM reading or passive eWOM), it used a holistic measure of eWOM engagement which included both reading eWOM and sending eWOM.

This holistic perspective is important because increasingly, consumers engage in eWOM not just as an effort to remedy cognitive dissonance about a purchase they made, but as a community-oriented and helpful activity (Litvin, Goldsmith & Pan, 2008). Thus, consumers who are more likely to provide eWOM to others may also be more influenced by their overall engagement in eWOM. These results may be hard to observe directly, since reading and offering eWOM may occur simultaneously. For example, a consumer who is deeply engaged in an eWOM community may build a stock of knowledge about products resulting from eWOM reading, even if they mainly contribute. This study's findings serve as a reminder that eWOM is a more complex phenomenon than often modelled, and could have pervasive effects on consumer decisions.

There are some limitations to the scope and methodology of this study, which affect how far the findings can be generalised. The limitations include the population (Thai consumers, predominantly young and highly educated) and the topic of interest (beauty and cosmetic products). This limitation may particularly apply to the moderation effects, as it is likely that other types of products and target markets may show different effects. The research also could not investigate all facets of eWOM engagement. For example, although previous studies have shown that social friendships and the quality of the eWOM message itself are relevant in the purchase decision, these were outside the scope of the study. This leaves opportunities for additional research into eWOM engagement, along with the areas for further research that were suggested in the discussion.

New knowledge and the effects on society local and communities

According to this study, The implication of this is that some consumers engage in eWOM more than others, and that some consumers are more influenced by eWOM more than others. Although a few studies have shown similar findings, this study has been one of the first to demonstrate these differences in Thailand. Furthermore, the findings regarding wealth were inconsistent with other studies, suggesting either that developing countries like Thailand have different economic conditions or that the role of eWOM is culturally different. This observation forms the basis for the second research suggestion.

Although the research was oriented toward academic concerns, there are some practical implications of the findings. The most important implication is that marketers must assume that Thai consumers are going to seek out and use eWOM in their purchase decisions. While this may not be universally true for all consumers, this study has

demonstrated that it is very common as a source of information, especially for consumers in their mid-20s and older and who are university-educated and have higher than average pay. Since these consumers may be considered in a desirable target market by many marketers, and since eWOM does have a moderate effect on the purchase decision, it is essential that marketers are aware of what kinds of eWOM are being offered about their products. Thus, marketers should be prepared to investigate eWOM for their products and should incorporate this information into their environmental scanning. It may also be appropriate to build eWOM into the marketing strategy for products. This should set a strategy for promoting positive eWOM as well as a strategy to manage the effects of negative eWOM (for example, by engaging in service recovery with the eWOM provider). This type of proactive strategy would keep firms from being surprised about negative eWOM and its effects on the consumer decision process.

References

Anderson, D. R., Sweeney, D. J., & Williams, T. A. (2018). *Essentials of statistics for business and economics*. Cengage Learning.

Azzara, C. V. (2010). *Questionnaire design for business research*. London: Tate Publishing.

Babić Rosario, A., Sotgiu, F., De Valck, K.., & H.A. Bijimolt, T. (2016). The effect of electronic word of mouth on sales: A meta-analytic review of platform, product and metric factors. *Journal of Marketing Research*, *53*(3), 297–318. DOI:10.1509/jmr.14.0380

Blackwell, R. D., Miniard, P. W., & Engel, J. F. (2005). *Consumer behavior*. Cincinnati, OH: South-Western College Publishing.

Boo, S., & Kim, J. (2013). Comparison of Negative eWOM Intention: An Exploratory Study. *Journal of Quality Assurance in Hospitality and Tourism*, *14*(1), 24–48. DOI: 10.1080/1528008X.2013.749381

Bronner, F., & de Hoog, R. (2011). Vacationers and eWOM: Who posts, and why, where, and what?. *Journal of Travel Research*, *50*(1), 15–26. DOI:10.1177/0047287509355324

Brown, T. A. (2015). *Confirmatory factor analysis for applied research*. New York: The Guilford Press.

Bryman, A., & Bell, E. (2015). *Business research methods*. Oxford: Oxford University Press.

Byrne, B. M. (2016). *Structural equation modeling with AMOS: Basic concepts, applications and programming*. 3rd (ed.). London: Routledge. DOI:10.4324/9781410600219

Chaffey, D., & Ellis-Chadwick, F. (2019). *Digital marketing: strategy, implementation and practice*. (7thed.). London: Sage.

Chen, H. Y., & Boore, J. R. P. (2010). Translation and back-translation in qualitative nursing research: Methodological review. *Journal of Clinical Nursing*, *19*(1–2), 234–239. DOI: 10.1111/j.1365-2702.2009.02896.x

Cheung, C. M. K., & Lee, M. K. O. (2012). What drives consumers to spread electronic word of mouth in online consumer-opinion platforms. *Decision Support Systems*. Elsevier B.V., *53*(1), 218–225. DOI:10.1016/j.dss.2012.01.015

Elwalda, A., Lü, K., & Ali, M. (2016). Perceived derived attributes of online customer reviews. *Computers in Human Behavior*, *56*(0), 306–319. DOI:10.1016/j.chb.2015.11.051

Engel, J. F., Blackwell, R. D., & Miniard, P. W. (1986). *Consumer behavior*. (5thed.). Hinsdale, IL: Dryden.

Engelbertink, A., & van Hullebusch, S. (2013). The effects of education and income on consumers' motivation to read online hotel reviews. *Research in Hospitality Management*, *2*(1–2), 57–61. DOI:10.1080/22243534.2013.11828292

Gottschalk, S. A., & Mafael, A. (2017). Cutting through the online review jungle—Investigating selective eWOM processing. *Journal of Interactive Marketing, 37,* 89–104. DOI:10.1016/j.intmar.2016.06.001

Gvili, Y., & Levy, S. (2018). Consumer engagement with eWOM on social media: the role of social capital. *Online Information Review*, *42*(4), 482-505. DOI:10.1108/OIR-05-2017-0158

Hair Jr, J. F., Hult, G. T. M., Ringle, C., & Sarstedt, M. (2016). *A primer on partial least squares structural equation modeling (PLS-SEM).* Sage Publications.

Hennig-Thurau, T., Gwinner, K.P., Walsh, G., & Gremler, D.D. (2004). Electronic Word-of-Mouth via Consumer-Opinion Platforms: What Motivates Consumers to Articulate Themselves on the Internet. *Journal of Interactive Marketing, 18*, 38-52. DOI:10.1002/dir.10073

Ismagilova, E., Slade, E., Rana, N. P., & Dwivedi, Y. K. (2019). The effect of characteristics of source credibility on consumer behaviour: A meta-analysis. *Journal of Retailing and Consumer Services*, 53, 1-40. DOI:10.1016/j.jretconser.2019.01.005

Khammash, M., & Griffiths, G. H. (2011). Arrivederci CIAO.com, Buongiorno Bing.com' - Electronic word-of-mouth (eWOM), antecedences and consequences. *International Journal of Information Management*, *31*(1), 82-87. DOI:10.1016/j.ijinfomgt.2010.10.005

Kudeshia, C., & Kumar, A. (2017). Social eWOM: does it affect the brand attitude and purchase intention of brands?. *Management Research Review, 40*(3), 310-330. DOI:10.1108/MRR-07-2015-0161

Litvin, S. W., Goldsmith, R. E., & Pan, B. (2008). Electronic word-of-mounth in hospitality and tourism management. *Tourism Management, 29*(3), 458-468. DOI:10.1016/j.tourman.2007.05.011

Mao, Z., & Lyu, J. (2017). Why travelers use Airbnb again?: An integrative approach to understanding travelers' repurchase intention. *International Journal of Contemporary Hospitality Management*, *29*(9), 2464–2482. DOI:10.1108/IJCHM-08-2016-0439

Saleem, A., & Ellahi, A. (2017). Influence of electronic word of mouth on purchase intention of fashion products in social networking websites. *Pakistan Journal of Commerce and Social Sciences (PJCSS), 11*(2), 597-622.

Schumacker, R. E., & Lomax, R. G. (2010). *A beginner's guide to structural equation modeling.* (3rded.). Routledge/Taylor & Francis Group.

Subedi, D. (2016). Explanatory Sequential Mixed Method Design as the Third Research Community of Knowledge Claim. *American Journal of Educational Research, 4(7)*, 570-577.

Tuten, T.L., & Solomon, M.R. (2016). *Social Media Marketing*. New Delhi, India: Sage Texts.

Westland, J.C. (2010). Lower bounds on sample size in structural equation modeling. *Electronic Commerce Research and Applications, 9*(6), 476-487.

Yang, K. (2012). Consumer technology traits in determining mobile shopping adoption: An application of the extended theory of planned behavior. *Journal of Retailing and Consumer Services*, *19*(5), 484–491. DOI:10.1016/j.jretconser.2012.06.003

Yusuf, A.S., Che Hussin, A.R., & Busalim, A.H. (2018). Influence of e-WOM engagement on consumer purchase intention in social commerce. *Journal of Services Marketing*, *32* (4), 493-504. DOI:10.1108/JSM-01-2017-0031

Zhang, T.(C)., Abound Omran, B., & Cobanoglu, C. (2017). Generation Y's positive and negative eWOM: use of social media and mobile technology. *International Journal of Contemporary Hospitality Management*, *29*(2), 732-761. DOI:10.1108/IJCHM-10-2015-0611