

ONLINE BEHAVIOURAL INTENTIONS: AN EMPIRICAL INVESTIGATION OF ANTECEDENTS AND MODERATORS

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ABSTRACT

The objectives of this paper is to recognize, confirm and evaluate the underlying factors toward behavior intention of Indonesian online shoppers; specifically the antecedents including perceived online reputation, banner advertising, perceived online security, perceived reliability, appearance, site design, and website presentational consistency. Questionnaires were posted through online survey targeted to 200 respondents. The data collection methods and variable measures were discussed. Zero-order correlation and regression analysis were conducted to evaluate whether the antecedents and moderator have relationships with the online behavior intention. Analyses found that perceived online security was the only antecedent variable that directly and positively associated with behavioral intentions. The study also found that perceived switching costs did not moderate the links between those variables, whereas perceived switching inducements moderated the links between banner advertising and perceived online security to online behavior intentions.

Keywords: online consumer behavior, online retailer, Internet, online shopping, switching costs, switching inducements.

This research “Online behavior Intentions: An Empirical Investigation of Antecedents and Moderator: The Case of Indonesia” is a replication from previous study “Online Behavioural Intentions: An Empirical Investigation of Antecedents and Moderators”, conducted by Mark M.H. Goode and Lloyd C. Harris in 2007.

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INTRODUCTION

Internet has become a major part of our daily lives, the massive amount of information available and the many uses one can have through the internet have made it the most valuable tool and have opened up opportunities for various types of businesses at the same time. The accessibility of technology, the availability of information, and the ability to interact through the Internet increase and evolve since more and more people use the Internet more intensively.

Schneider (2007) stated that in developed economies all over the world the Internet has grown into an essential part of daily life for both consumers and business enterprises. The Internet is a significant channel for digital products and information. In fact, the Internet makes both time and distance irrelevant to many trades. In recent years, the Internet is a tool to connect the commercial enterprises to one another and with customers. Today, the Internet provides information of all kinds of businesses about their products and services.

The internet usage has grown significantly in all countries. According to the Internet World Stats (2009), the estimated Internet users around the world are 1,733,993,741 people for September 30, 2009. Asia is the leading in the usage of Internet with 738,257,230 users, followed by Europe with 418,029,796 users, North America with 252,908,000 users, Latin America / Caribbean with 179,031,479 users, Africa with 67,371,700 users, Middle East 57,425,046 users, and Oceania / Australia with 20,970,490 users. Schneider (2007) stated that in developed economies all over the world the Internet has grown into an essential part of daily life for both consumers and business enterprises.

The growing trend of the Internet has also affected Indonesia. Based on Internet World Stats, in 2009 the estimated population of Indonesia is 240,271,522 people with 30,000,000 Internet users. From year 2000-2009 the user growth is 1,400.0 %. While in Asia, as shown in figure 1.1 in 2009, Indonesia is in the fifth position of the most Internet users, below China, Japan, India, and Korea. However, electronic commerce system is less popular in Indonesia, as there is still a great deal of skeptical and doubtful Internet users concerning the security of e-commerce system and their lacking knowledge about e-commerce. As a fact, the development of e-commerce in Indonesia is still hindered by some existing factors. Among of them is the factor of security guarantee.

Indonesian users show that the main estimation which occupy in their minds is about the safety of doing a transaction via Internet. And the habit of using credit cards is still rare and scarce in Indonesia for its symbol and status, therefore there are sufficient e-commerce Websites in Indonesia which are offering the system of online purchasing with not only credit/debit cards but also with another way of payment such as cash on delivery or transfer through banks. There are also pages of Website offering the only products which are sold whereas the transaction and the payment is done by offline or make a call by phone, as it is usually done in common business.

Aside from this phenomenon, the online business keeps growing, thus it is vital to learn about every aspect of it. Reichheld and Schefer's study (as cited in Goode and Harris, 2007) stated that online behavioral intentions and e-loyalty have been somewhat ignored in the study. However, it is very important to investigate how the online behavioral intentions related to online loyalty. Previous study conducted by Mark M.H Goode and Lyoyd C. Harris on their paper entitled '*Online Behavioural Intentions: An Empirical Investigation of Antecedents and Moderators*' has developed and extended existing research into online behavioral intentions of consumers' by proposing, testing, and evaluating a model of the antecedents of behavioural intentions that models and evaluates how switching costs and inducements moderate the behavioural intentions of online shoppers in United Kingdom. As mentioned in previous we recognize that different people with different background and consumer behavior might require different information and communication strategy that affect their online behavioral intentions.

Therefore, this study is to recognize what affects the online behavioral intention of Indonesian customers using antecedents that are used as determination which are perceived online reputation, banner advertising, perceived online security, perceived reliability, appearance and site design, and website presentational consistency. It is also to evaluate whether the moderators (switching costs and switching inducements) moderate the behavioral intentions of Indonesian online shoppers.

Problem Identification

The availability of e-commerce as a new transaction media is absolutely profitable for many parties, both for the consumers and the retailers. By using the Internet, the process of trading is able to be done economically for the expenses and the time as well.

Scope

The questionnaire was randomly distributed by online survey. The distribution of the questionnaires is targeted to 200 respondents across Indonesia. In this way, authors try to capture the whole society in Indonesia, not only focusing on one type of customers.

Research Objectives

The purposes of doing this research are to:

- Test a model of the antecedents of online behavioral intentions towards a particular Website which uses e-commerce.
- Evaluate how switching costs and switching inducements moderate the behavioral intentions of online shopper.

Aims and Benefits

This study was conducted to recognize, confirm, and evaluate the underlying factors toward behavioral intention of online shopper; specifically the antecedents including perceived online reputation, banner advertising, perceived online security, perceived reliability, appearance and site design, and website presentational consistency. Another objective of this research is to evaluate how the switching cost and switching inducements moderate the behavioral intentions of online shopper. The result of this study will expectantly be useful and effective in reflecting the online behavioral intention, so that actions made to improve the area of weakness to enhance performance of online retailers can be made and to increase the understand of consumer online behavior for future research in e-commerce.

LITERATURE REVIEW

Online Shopping

Online shopping is defined as a computer activity or exchange performed by a consumer via a computer-based interface, where the consumer's computer is connected to, and can interact with, a retailer's digital storefront through a network (Haubl and Trifts, 2000).

Online shopping allows companies to provide product information and direct sales to their consumers. Turban et al. (2002, p. 89) has identified several unique categories of online shoppers, differentiated by buying motivation and spending behavior as follows.

1. *Time-starved consumers* will pay more or additional costs to save time on shopping no matter they like the online shopping or not, since they usually have two incomes sources.

2. *Shopping avoiders* hate shopping, however for staying away from people, lines, or traffic they possibly will use the Internet.
3. *New technologists* are usually youthful and comfy with technology, perhaps they shop online just because it looks cool.
4. *Time-sensitive materialists*, or *click-and-mortar consumers* prefer traditional stores rather than do online shopping due to the security concerns or other motives, thus they use the Internet just for looking the products.
5. *Traditional* likely to choose stores rather than do online shopping.
6. *Hunter-gatherers* have pleasure in comparing prices and exploring good values.
7. *Brand loyalists* shop online for a particular brand, most likely account for the most per-person profit levels.
8. *Single* shoppers use the Internet for shopping, and also other activities like communications, banking, game playing, reading news, and etc.

Online Behavioral Intention

According to Goode and Harris (2007) definition of behavioral intentions is “a person’s conscious plan to exert effort to carry out a particular behavior with these intentions being formed from both a personal evaluative and a normative construct.” In order to effectively drive consumers to accept electronic commerce and online transactions, there is an urgent need to understand the factors that influence consumer behavior towards continued use of online transactions. The behavioral intentions are represented by six antecedent factors including perceived online reputation, banner advertising, perceived online security, perceived reliability, appearance and site design, and website presentational consistency; and moderated by the effects of switching costs and switching inducements. Each of the antecedent and moderator is explained below (Goode and Harris, 2007)

Perceived Online Reputation

Building a large customer base, making a trust relationship with the customers, and offering various selection and choices of products and services to maintain the relationship are the main objectives of e-commerce business (Rayport and Jaworski, 2003). Reputation is an important aspect in e-commerce. Reputation has been termed as “the current assessment of a firm’s desirability as seen by some external person or group of people” (Standifird et al., as cited in Goode and Harris, 2007, p. 514). In the physical world, companies that have good reputations frequently build trust by making sure that customers know their real identity, such as establishing brand names. Barney and Hansen’s study (as cited in Goode and Harris, 2007, p. 514) stated that reputation is frequently

perceived as a method to guarantee trustworthy behavior of a company. As doing online transactions are riskier than before thus good reputation make customers trusting the company.

Banner advertising

According to Turban et al. (2002), banner ads are used mostly in the advertising on the Web. Some Internet users are familiar with a banner ad as “a rectangular box, usually horizontal on the page that contains advertising material” (Roberts, 2007). Typically, a banner has links that can transfer the customers to the advertiser’s home page when clicked on. Usually a banner contains a short text or graphical message to promote a product. In addition, the abundance usage of banner advertisements due to their perceived cost effectiveness, ability to be put based on user’s profiles, and flexibility (Shen, as cited in Goode and Harris, 2007). Roberts (2007) has indicated that there are three main issues related to banner ads. Firstly, banner ads cannot contain much information, usually they include just a logo and ad advertising slogan, because they are not too big. Secondly, banner ads can be put in two sides either vertically or horizontally on the page. However, Rayport and Jaworski (2007) confirmed that banner ads have a problem. It seems that as users become more experiences and understandings with the Web, they turn to be more unwilling to click on banner ads.

Perceived Online Security

In today’s world of e-commerce almost all Internet users have some concerns about the security that a company with a website must face. Grewal et al., and Montoya-Weiss ’studies (as cited in Goode and Harris, 2007) have argued that one of the most significant contemporary online exchange issues is consumers perception towards online security. Security is still a major concern when it comes to online shopping. According to Grewal and Dharwadkar’s study (as cited in Goode and Harris, 2007), security on the Internet refers to any matter which influencing the accepted bad result in the ease of financial and private matters (such as, privacy). The term security also means “the ability of a system to prevent illegal or inappropriate use of its data and to deter hackers” (Rayport and Jaworski, 2003, p. 348).

Perceived Reliability

According to Rayport and Jaworski (2003, p. 348) reliability refers to “the amount of time a system can be expected to be available to user”. Perceived online reliability has been defined as “the extent to which the site consistently responds and functions as expected (without broken links, broken pages or dead-end-links)” (Swaminathan et al., as cited in Goode and Harris, 2007).

Rayport and Jaworski (2003) state that there are two aspects that prove reliability, first is how frequently a site experience “downtime” for example, system breaks down; second is how likely the site is to load on user’s computer screen properly. As mentioned in Savin and Silberg’s study (as cited in Goode and Harris, 2007), new customers will avoid the usage of unreliable online site, whereas existing customers will minimize usage and will likely to go away from the site, get annoyed with the unreliable service (e.g. broken links, lettering errors, missing graphics, and failed java script).

Appearance and Site Design

Based on Gordon and Fisk; and Bitner’s study (as cited in Goode and Harris, 2007) the design, layout, and functionality of a website in online transactions are important. Thus, a company that uses e-commerce needs graphic and web designers to recognize the significance of aesthetics, structure, and functionality clearly (Wanninger et al., as cited in Goode and Harris, 2007). Those findings prove that functionality of website design is very vital to the company. According to Rayport and Jaworski (2003), there are two key aspects in context (the look-and-feel of a customer interface): aesthetic and functional criteria.

1. Aesthetics

According to Rayport and Jaworski (2003), a website which focus on aesthetics element is created based on visual selections such as colors, graphics image, photographs, and fonts.

2. Functional Criteria

Rayport and Jaworski (2003) define function as a usability of a website. A well-designed website manages the huge quantity of information into sets of pages that can fit on a single computer display and assists customers surf the site without problems and please them. Another consideration is speed because most Internet connections at home have limitations with the hardware, software, and bandwidth available to them, so it influences designer’s choice about multimedia and graphics.

Web Presentational Consistency

Web presentational consistency highlights the design, appearance, and aesthetics to be consistent to attract consumer intentions and actions (Ekhaml, as cited in Goode and Harris, 2007). It is important to consider the nature, size, overall presentation, and amount of online images. Ekhaml’s study (as cited in Goode and Harris, 2007) also states that many website designers have examined the important parts of the image and effectiveness of pages and sites which are the correct use of consistent typography and appropriate

backgrounds. Another important part in design is color (Roberts, 2007); it is added to communicate the site that reflects the overall image.

Switching Costs

Switching costs refer to “the loss of financially quantifiable resources and consist of the benefit loss and financial loss to the customer” (Goode and Harris, 2007). Rayport and Jaworski (2003) argue that customers will use a certain amount more to keep on shopping in e-commerce store if they feel satisfied with the store. On the other hand, they will move on to other competitors if they feel unsatisfied. This is a must for companies to keep maintaining their customers to revisit their stores, because it will lead to switching costs that involve just one easy click of the mouse. However, according to Chen and Hitt’s study (as cited in Goode and Harris, 2007) switching costs has been given a small consideration in online transaction compared to offline context and also Reichheld and Schefter’s study (as cited in Goode and Harris, 2007) show that switching costs have significant relation to e-loyalty.

Switching Inducements

Grace and O’Cass’ study (as cited in Goode and Harris, 2007) identify switching inducements as any aspect or factor that affect customers to change store. Other simpler definition for switching inducements is “the attractiveness of alternatives” (Jones et al., as cited in Goode and Harris, 2007). Thus, it can be said that the customers will almost undoubtedly change store if the perceived benefit of switching is high; whereas the customers will remain if the perceived benefit is low. It is the study of Keaveney (as cited in Goode and Harris, 2007) that forms eight main factors which are the reasons for consumers to change stores which are pricing, inconvenience, response to failed service, core service failures, failed service encounters, competition, ethical problems, involuntary switching, and finally a “catch-all” category for additional inducements.

According to Reichheld and Sasser’s study (as cited in Goode and Harris, 2007) generally those factors affect the company because when customers change supplier the company require higher costs, the market share will be damaged, and reduce profits; then they believe that decreasing the attractiveness of other company’s inducements will lead to online loyalty which should be the primary aim of online company. Therefore, company that use e-commerce is encouraged to uphold the switching inducements offered and protect from other inducements offered by other companies (Smith and Rowley, as cited in Goode and Harris, 2007).

Online Loyalty / E-loyalty

Turban et al. (2002) define customer loyalty as “the degree to which a customer will stay with a specific vendor or brand”. By maintaining customers to be loyal (more purchase and more sales) a company can enhance its profits, thus customer loyalty is a major contributor to give profits. Beside profits, customer loyalty also makes the company’s market position stronger as the loyal customers will not often buy from competitors.

Customer loyalty is very important in online context namely e-loyalty. Customer loyalty in online store is even more significant rather than in offline store, since it is very easy for customers to change to another supplier by just one click of a mouse, for example customers could surf through all websites with ease to look for the lowest price.

Conceptual Model

Since this study is a replication of previous research conducted by mark M.H. Goode and Lloyd C. Harris in their study titled “Online behavioral intentions: an empirical investigation of antecedents and moderators”, therefore we adopt similar conceptual model adopted in Goode and Harris’s research.

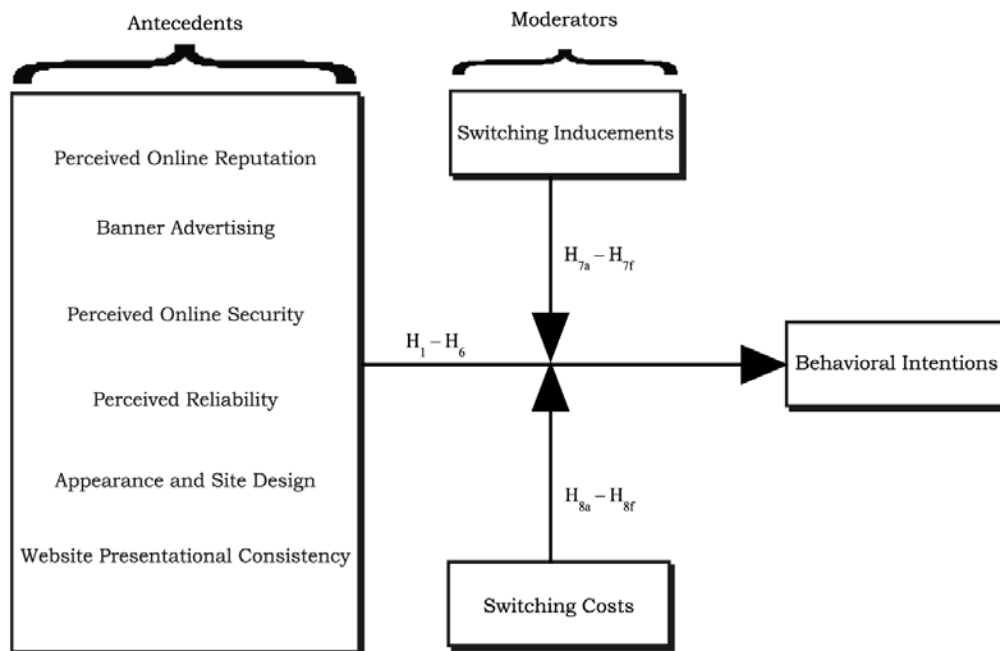


Figure 1: A conceptual model of the antecedents of online behavior intentions (Goode and Harris, 2007)

The model shows the drivers of consumer behavior intentions and factors that may moderate the relationship between such antecedents and behavioral intentions. The behavioral intentions are presented by six antecedent factors including perceived online reputation banner advertising perceived online security, perceived reliability, appearance and site design, and website presentational consistency; moderated by the effects of switching costs and switching inducement.

Hypotheses

- H1: Favourable interpretations of the online reputation of an online supplier are directly and positively associated with the behavioral intentions consumers.
- H2: Favourable interpretations of a supplier's banner advertisements are directly and positively associated with the behavioral intentions consumers.
- H3: Favourable interpretations of online security are directly and positively associated with the behavioral intentions consumers.
- H4: Favourable interpretations of website reliability are directly and positively associated with the behavioral intentions consumers.
- H5: Favourable interpretations of online appearance and site design are directly and positively associated with the behavioral intentions consumers.
- H6: Favourable interpretations of online website presentational consistency are directly and positively associated with the behavioral intentions consumers.
- H7: Perceived switching costs moderate the relationships between (a) perceived online reputation, (b) banner advertising, (c) perceived online security, (d) perceived reliability, (e) appearance and site design, (f) website presentational consistency and online behavioural intentions.
- H8: Perceived switching inducements moderate the relationships between (a) perceived online reputation, (b) banner advertising, (c) perceived online security, (d) perceived reliability, (e) appearance and site design, (f) website presentational consistency and online behavioural intentions.

RESEARCH METHODOLOGY

Data Collection Method

Primary data was obtained through survey research using questioners as instrument. The questioners were posted as an online survey through

esurveycreator.com. An online survey was chosen in order to attain respondents who are familiar with the internet.

To choose the most popular e-commerce website among respondents in Indonesia, the authors carried out pre survey, the questioners were distributed to 15 respondents to find four most popular e-commerce websites among to respondents. This pre-survey questioners were distributed on 23rd June 2010, and the result shows that Bhinneka.com, Plaza.com, Butik.com, and Pasarbatik.com are the most popular websites, thus the study will be based on respondents evaluation on these four websites.

Research Variable

Based on framework (figure 1) used for this research we can see that our survey instruments contained measures of behavioral intentions as a consequence of six antecedent factors; perceived online reputation, banner advertising, perceived online security, perceived reliability, appearance and site design and website presentational consistency), moderated by the effect of switching costs and switching inducements.

Table 1. Operationalization of Variables

Variables	Description	Items
Behavioral intentions	Behavioral intentions have been viewed as part of the phases of loyalty. We followed seven –item scale developed by Zethaml et al. (1996) and	<ol style="list-style-type: none"> 1. I like to say positive things about the website to other people. 2. I am happy to recommend the website to someone who seeks my advice. 3. I expect to spend less at the website in the next few years. 4. I would move my business away from the website if a competitor were cheaper. 5. I would not switch to a competitor if I were experience a problem with the website service. 6. I would speak to other customers if I were to experience a problem with the website service 7. I would complain to the website

		directly if I were to experience a problem.
Perceived online reputation	The reputation scale was designed to measure the overall dependability and trustworthiness of the website. We used three-item scaled modified from four-item scaled forwarded by Swaminathan et al. (1999).	<ol style="list-style-type: none"> 1. The website is dependable 2. The website is trustworthy 3. The website is honest
Banner Advertising	The questions on banner advertising scale measure how useful people' perception on web advertising. The four-scale was taken from Swaminaathan et al. (1999).	<ol style="list-style-type: none"> 1. Banner advertisements do not annoy me 2. I rarely make a purchase after seeing a banner advert. 3. I ignore all banner advertising 4. I find that banner adverts provide useful information
Perceived online security	The questions measure consumers' overall feeling to general security, the possibility of fraud on the Internet, and concerns about purchases. They are adapted from a three-item measure forwarded by Swanubathan et al. (1999)	<ol style="list-style-type: none"> 1. I am concerned about security on the internet. 2. I am very concerned about buying things on the internet.
Perceived reliability	The reliability construct measures overall construction and integrity of the website. The	<ol style="list-style-type: none"> 1. The website does not have dead-end links. 2. On the website I have found pages not working.

	questions was developed basen on a three-item scale adapted from the work of Bauer and Scharl (2000)	
Appearance and site design	The measurement of appearance and design determine the cisual attractiveness, presentation of information on the screen, and the easiness and simplicity with which the site can bne used. Based on a seven-item scale developed by Abels et al. (1997) and Szymanski and hise (2000)	<ol style="list-style-type: none"> 1. In general the website is interactive. 2. I think that the website graphics are poor. 3. I am able to search the website fairly easily 4. I am able to send online comments about the website. 5. The online ordering of the website is involving. 6. Minimal effort has been spent making the website visually appealing.
Website presentational consistency	The consistency measures overall look, feel, and how visual graphics are used in the creation of the website. The questions were followed a three-item scale put forward by hasan and Tibbits (2000)	<ol style="list-style-type: none"> 1. The website does not make effective. 2. The website is visually consistent even without graphics
Perceived switching costs	The switching cost variable indicated the level of respondents' perceptions about costs of moving to other retailers. Taken from a three-item	<ol style="list-style-type: none"> 1. In general, it would be a hassle to change to other websites 2. It would take a lot of effort to change/use a different websites. 3. Switching to another firm would cost too much.

	scale developed by Jones et al. (2000), but was adapted to the online context.	
Perceived switching inducement	Switching inducement variable indicated factors that make respondents' move to other retailer and also their level of satisfaction with the current retailer. Taken from the four-item scale put forward by Jones et al. (2000), but was adapted to the online context.	<ol style="list-style-type: none"> 1. The website products are excellent value for money 2. The website services are excellent value 3. I am happy with the value for money I get at the website.

Source: Author (2010)

Data Analysis Methods

1. Distribution frequency

The main function of the distribution frequency analysis is to provide an overview and summary of an aggregation of data.

2. Reliability and Validity Analysis

Reliability test define as the extent to which a scale produces consistent results if repeated measurements are made on the characteristics (Maholtra and Peterson, 2006) The higher the degree of association between the scores derived through this repeated measurement the more reliable the scale is (Malholtra an Peterson, 2006). In addition, validity test was performed to examine the extent to which differences in observed scale score reflect true differences among objects on the characteristics being measured rather than systematic or random errors. A scale with perfect validity would contain no measurement error or no systematic error and no random error (Malholtra and Peterson, 2006).

For this study the Cornbach's Alpha was employed to test the reliability of the data set, the reliable test should achieve the alpha value of equal or higher than 0.4, for the questions to be considered reliable (Spoles and Kendall, 1986). The validity of the data was assessed using Confirmatory factor Analysis

(CFA), test value should be equal or higher than 0.5 for further analysis can be done on the variables of samples taken in this study.

3.Zero-order correlation analysis

Zero-order correlation analysis provides a useful means to explore potential association (Goode and Harris, 2007).

4.Moderated regression

Moderated regression employs what are known as “moderator” or “interaction” effects within the regression model that allows for the slope of one or more of the independent variables to vary across values of the moderator variable. Thus, in circumstances, where independent factors are likely to vary, moderated regression has major advantages and allows greater flexibility in designing and testing of a wide range of relationships and different function forms (Goode and Harris, 2007).

FINDINGS AND DISCUSSION

The author used SPSS 17.0 to test the reliability of the data used in this thesis. There are two methods that are used in order to measure the reliability of the data. First, the author use Cronbach’s Alpha to test the reliability of overall variables and each of the entire main variables used in this thesis including online behavioral intentions, perceived online reputation, banner advertising, perceived online security, perceived reliability, appearance and site design, website presentational consistency, switching costs, and switching inducements. It was conducted to determine if the author was successful in creating questions to measure the opinion (Uyanto, 2006).

Demographic statistic creates the sample profile to provide simple summaries about the sample and the measures. It includes gender, age, last education level, income per month, and most frequent visited site. The gender split for the respondents was fairly equally divided between males and females with males 57.5% and females 42.5%. The age variance of respondents who had participated in this research shows the highest result is age 17-22 with 32% followed by age 29-35 with 26%, age 23-28 with 24%, more than 35 with 15.5%, and below 17 with only 2.5%. Most of the respondents had accomplished undergraduate degree with the total percentage of 62%, followed by 22.5% who had completed high school degree, 13% who had finished Diploma, and 2.5% who have not finished high school. Participants who have income below than IDR 2,000,000 per month has accounted for 29.5%. 21.5% have income IDR 8,000,000 – 9,999,999 per month. Whereas participants who

have income IDR 5,000,000 – 7,999,999, more than 10,000,000 (>IDR 10,000,000), and IDR 2,000,000 – 4,999,999 accounted for 19.5%, 16.5%, and 13% respectively.

Correlation Test

The data was evaluated using zero-order correlation analysis that is used to discover possible connections between antecedents and behavioral intention. Zero-order correlation analysis offers a helpful means to discover possible relations, in order to evaluate the effects of multiple aspects (Goode and Harris, 2007).

As a result of zero-order correlation analysis, the data found that behavioral intention was related to only one antecedent factor which is perceived online security. It was strongly statistical related to behavioral intention (sig. <0.05) with sig. 0.018. Thus, *H3* is accepted. Perceived online security shows the most significant association with behavioral intentions in this zero-order analysis. The finding of a strong association between perceived online security and behavioral intentions makes obvious the importance of the security of online suppliers for the customers.

In contrast there is no evidence of a statistically significant link between perceived online reputation, banner advertising, perceived reliability, appearance and site design, and website presentational consistency and behavioral intention was found. Thus, there is no support is discovered for *H1*, *H2*, *H4*, *H5*, and *H6*. In Table 2. there are two other antecedent factors that are directly related. First is perceived online reputation and perceived online security with sig. 0. Second is perceived online security and perceived reliability with sig. 0.01.

Perceived online reputation is directly interconnected to perceived online security. People usually have the perception of the higher the reputation of a company the more secure it is. Thus, it highlights the importance of goodwill. Online consumers are notoriously cautious and alert, have doubts about “new” online suppliers and use perceptions of “reputation” as alternatives for trustworthiness and credibility of a website. Online consumers’ value highly reputation. Consumers must feel the site to be reliable, genuine, honest, and most importantly trustworthy if they are to perceive the website has a good reputation and highly regarded.

Table 2. Correlation Test Result

		BI	Reputation	Banner	Security	Reliability	Appearance	Consistency
BI	Pearson Correlation	1	0.084	0.024	0.168*	-0.045	-0.004	-0.067
	Sig. (2-tailed)		0.235	0.738	0.018	0.529	0.956	0.346
	N	200	200	200	200	200	200	200
Reputation	Pearson Correlation	0.084	1	0.057	.335**	-0.072	-0.049	0.114
	Sig. (2-tailed)	0.235		0.42	0	0.309	0.487	0.108
	N	200	200	200	200	200	200	200
Banner	Pearson Correlation	0.024	0.057	1	0.116	-0.065	0.085	-0.063
	Sig. (2-tailed)	0.738	0.42		0.103	0.357	0.233	0.376
	N	200	200	200	200	200	200	200
Security	Pearson Correlation	0.168*	.335**	0.116	1	-.181*	0.008	0.068
	Sig. (2-tailed)	0.018	0	0.103		0.01	0.907	0.342
	N	200	200	200	200	200	200	200
Reliability	Pearson Correlation	-0.045	-0.072	-0.065	-.181*	1	0.079	-0.062
	Sig. (2-tailed)	0.529	0.309	0.357	0.01		0.269	0.384
	N	200	200	200	200	200	200	200
Appearance	Pearson Correlation	-0.004	-0.049	0.085	0.008	0.079	1	0.08
	Sig. (2-tailed)	0.956	0.487	0.233	0.907	0.269		0.26
	N	200	200	200	200	200	200	200
Consistency	Pearson Correlation	-0.067	0.114	-0.063	0.068	-0.062	0.08	1
	Sig. (2-tailed)	0.346	0.108	0.376	0.342	0.384	0.26	
	N	200	200	200	200	200	200	200

*. Correlation is significant at the 0.05 level (2-tailed).

**. Correlation is significant at the 0.01 level (2-tailed)

Perceived online security is also directly connected to perceived reliability based on the result on Table 2. Perceived reliability is how a website responds broken links, broken pages or dead-end-links, lettering errors, missing graphics, and failed java script. People may have the perception of the higher the security of a website the higher the reliability. People will not expect to face such problems in reliability of the website, thus they will visit a site which is considered the most secure according to their perception.

Regression Analysis

In this study, two regressions are run. First is linear regression, and second is moderated regression. Linear regression is used to determine the significance of each of the antecedents without the effects of moderating factors. Second, a moderated regression is employed in the current study to some extent because of the nature of the model (including the effects of moderating factors) and to a certain extent due to the nature of the technique. It is also used to find out whether the moderators moderate the link between the antecedents and behavioral intentions. Moderated regression also uses “moderator” or “interaction” effects within the regression model. Moderated regression has major advantages and offers greater flexibility in designing and testing of a broad range of associations and different function forms in conditions where independent factors are likely to be different (Goode and Harris, 2007). In this regard, if moderated regression is in use, it is forecasted that the links between exogenous and endogenous variables are likely to be different.

From the regression table below, *H1-H6* respectively argue that perceived online reputation, banner advertising, perceived security, perceived reliability, appearance and site design, and website presentational consistency are directly (linearly) associated with the behavioral intentions of online consumers.

Regression analysis finds that perceived online security is directly associated with the behavioral intentions of online shoppers with sig. 0.042 which is below the criteria of 0.05. Thus, *H3* is accepted. *H3* which is “Favourable interpretations of online security are directly and positively associated with the behavioral intentions consumers” plays the major role in the behavioral intentions of online shoppers. Whereas, perceived online reputation, banner advertising, perceived reliability, appearance and site design, and website presentational consistency are not directly related with the behavioral intentions of online shoppers with sig. more than 0.05. Thus, *H1*, *H2*, *H4*, *H5*, and *H6* are rejected. In Indonesia, the major issue in terms of online behavioral intention is the security, while other factors have no significant effect to the behavioral intentions of online shoppers.

Table 3. Multiple Regressions Test Result

Variables	Estimated parameters (Sig.)	t values
Constant	0	6.418
<i>Direct Linkages</i>		
Hypothesis 1: perceived online reputation	0.592	0.536
Hypothesis 2: banner advertising	0.959	-0.051
Hypothesis 3: perceived online security	0.042	2.048
Hypothesis 4: perceived reliability	0.789	-0.268
Hypothesis 5: appearance and site design	0.941	0.074
Hypothesis 6: website presentational consistency	0.244	-1.169
Adjusted R ²	0.006	
F statistic (df)	6	
<i>Moderators - perceived switching costs (PSC)</i>		
Hypothesis 7a: perceived online reputation*PSC	0.405	-0.835
Hypothesis 7b: banner advertising*PSC	0.676	-0.419
Hypothesis 7c: perceived online security*PSC	0.459	-0.743
Hypothesis 7d: perceived reliability*PSC	0.836	0.207
Hypothesis 7e: appearance and site design*PSC	0.965	-0.043
Hypothesis 7f: website presentational consistency*PSC	0.526	0.635
Adjusted R ²	-0.017	
F statistic (df)	13	
<i>Moderators - perceived switching inducements (PSI)</i>		
Hypothesis 8a: perceived online reputation*PSI	0.055	-1.93
Hypothesis 8b: banner advertising*PSI	0.007	-2.733
Hypothesis 8c: perceived online security*PSI	0.043	2.039
Hypothesis 8d: perceived reliability*PSI	0.065	1.854
Hypothesis 8e: appearance and site design*PSI	0.444	0.767
Hypothesis 8f: website presentational consistency*PSI	0.265	1.118
Adjusted R ²	0.051	
F statistic (df)	12	

H7a-f and *H8a-f* correspondingly argue that switching costs and switching inducements moderate the links between each of the antecedent factors including perceived online reputation, banner advertising, perceived security, perceived reliability, appearance and site design, and website presentational consistency, and behavioral intentions.

There is no support found for *H7a-f* in the regression table above since the significance is > 0.05 . Therefore all of these hypotheses are accordingly rejected. Thus, all antecedents are found to be insignificantly indirectly (non-linearly) linked with behavioral intentions due to the moderating effects of switching costs. Consequently, *H7a*, *H7b*, *H7c*, *H7d*, *H7e*, *H7f* are rejected.

As we can see from the regression table, all antecedents moderated by switching costs are not indirectly linked to the behavioral intentions of online consumers. It probably means that the antecedent factors could not keep or hold the customers to just stay in one website or supplier. While some support is found for *H8b* and *H8c* with significance of 0.007 and 0.043 respectively. Thus, banner advertising and perceived online security are found to be significantly indirectly (non-linear) associated with behavioral intentions due to the moderating effects of switching inducements. That is banner advertising and perceived online security is associated with behavioral intentions since the factors raise perceived switching inducements. Hence, *H8b* and *H8c* are accepted.

Banner advertising and perceived online security are moderated by switching inducements indirectly linked to the behavioral intentions of online consumers. Online shoppers will possibly move to other websites because they are attracted by the eye-catching banner advertising of other websites. Probably because the banner advertising provides useful information and catches the eye of the consumers, so that consumers just simply click it and they will see the websites. Banner advertising is more noteworthy in online context rather than offline because customers can so easy just click the banner ads. Similarly, perceived online security can also pull away the consumers to stay in one website. They will easily move to other websites, since there is no significant cost for moving on to other websites. Thus, if consumers feel that one website is not secure, honest, and trustworthy, they will look for other websites that are more secure. Security gives more impacts in online contexts rather than offline contexts. Because when people do online transactions they have to give their personal data. When the site cannot be trusted, it is very risky to give the personal data; therefore customers must feel that the site is trusted before

giving the personal information such as ID card, address, and etc to the websites.

Therefore, banner advertising and perceived online security are two important factors that will not hold customers to stay in one website but they can possibly make the customers to move away to other websites.

CONCLUSION

The purpose of this thesis is to recognize, confirm, and evaluate the underlying factors toward behavioral intention of online shopper; specifically the antecedents including perceived online reputation, banner advertising, perceived online security, perceived reliability, appearance and site design, and website presentational consistency. Also, the other purpose is to evaluate how the switching cost and switching inducements moderate the behavioral intentions of online shoppers. Thus, it comes out to do research into aspects that possibly will moderate the relation between such antecedents and behavioral intentions. As a result, a conceptual model of the antecedents and moderators of online consumer behavior was built up. As a reference for this thesis is a similar study (journal) entitled '*Online Behavioural Intentions: An Empirical Investigation of Antecedents and Moderators*' by Mark M.H. Goode and Lloyd C. Harris.

The study is about doing an experimental analysis about the online behavioral intentions using antecedents and moderators. This study analyzes whether the antecedents (perceived online reputation, banner advertising, perceived online security, perceived reliability, appearance and site design, and website presentational consistency) are statistically significant with the behavioral intentions. Other purpose is also to recognize whether the moderators (switching costs and switching inducements) moderate the link between antecedents and behavioral intentions.

In conducting the research, the author used 4 methods to analyze the data namely: reliability check by Cronbach's Alpha and Confirmatory Factor Analysis (CFA), Zero-order Correlation Analysis, Simple Regression, and Moderated Multivariate Regression. Data were collected from the online survey (www.esurveycreeator.com) to 200 respondents across Indonesia. After the data is examined by using those methods mentioned above the research hypotheses can be analyzed.

During the preliminary exploration of data, zero-order correlation and simple regression analysis indicated that perceived online security was directly and positively associated with behavioral intentions, thus *H3* is accepted. The more sophisticated the digital world is, the higher the opportunity that people will use it for criminal and illegal actions. It is a major concern about e-commerce that the possible security risk of revealing to supplier personal information such as e-mail addresses and credit card information. From the finding it can be concluded that perceived online reputation, banner advertising, perceived reliability, appearance and site design, and website presentational consistency are not directly related to online behavioral intentions. For Indonesian people the main issue is security. As explained in Chapter II, Indonesia has high level in cyber crime, thus it affects the intention of consumers to buy things online. The consumers' perception and image to Indonesia security is bad, thus instead of considering the other factors including perceived online reputation, banner advertising, perceived reliability, appearance and site design, and website presentational consistency, Indonesian consumers still do not have the intention to buy online if they are still not trust the website itself. They may just visit the site but not purchase.

After the data are being analyzed by moderated regression, the findings are first, perceived switching costs do not moderate the relationship between all antecedents and online behavioral intentions. Thus *H7a-f* is rejected. Second, perceived switching inducements moderate the relationships between banner advertising and online behavioral intentions; and perceived switching inducements moderate the relationships between perceived online security and online behavioral intentions. Thus, *H8b* and *H8c* are accepted.

Switching costs does not moderate the relationship between each of the antecedents with behavioral intentions because of several reasons. Indonesian consumers are not loyal to just one website. Antecedents like reputation, banner, security, reliability of the website, appearance and design, and consistency of the website are not sufficient to make consumers stay in one website. As long as there is website that offer lower price for example, consumers will just directly move on to other websites.

Banner advertising is not directly linked to consumer's intention; however the moderating effects of switching costs and inducements are significant. In this regard, switching costs does not insignificantly moderate the relationship between banner advertising and online behavioral intentions while switching inducements did; similar case happen to relationship between perceived online security with behavioral intentions which is moderated by switching inducements.

Reputation, reliability of the website, appearance and design, and consistency of the website do not attract Indonesian consumers to move away to other

websites. However, Indonesian consumers tend to be attracted by banner advertising and online security of other websites.

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