

## **Exploring Key Factors for Customer Satisfaction in Online Shopping: A Systematic Literature Review**

**P.A. Deyalage**

University of Sri Jayewardenepura

**D. Kulathunga**

University of Sri Jayewardenepura

### **Abstract**

*In the context of online shopping, customer satisfaction is considered as a important matter to be focused by marketers and organizations. Consequently, identification of what really affects customer satisfaction in online context is useful from many aspects. Previous researchers have attempted to address this important concept mostly through their empirical studies, utilizing limited number of factors. A closer examination reveals that those studies have utilized different sets of factors and been performed in different contexts. Overall, prior studies remain broad and appear relatively fragmented. At present, there is a lack of research which have used a systematic literature review process to examine the factors affecting online customer satisfaction. Therefore, the purpose of this research is to perform a comprehensive study on literature related to online customer satisfaction and analyze the factors identified by previous scholars under different criteria. Accordingly, the researchers gathered all possible studies related to online customer satisfaction between the period 2000 and January 2019. The study identified forty-one previous studies done by different researchers which revealed fifty-one different factors affecting online customer satisfaction. The researchers performed a rigorous*

---

### **Corresponding Author:**

P.A. Deyalage, University of Sri Jayewardenepura, E-mail: [piruni@sjp.ac.lk](mailto:piruni@sjp.ac.lk)

*analysis of those fifty-one factors under different criteria and results are presented in this paper.*

## **Keywords**

*Online customer satisfaction; Online shopping; Systematic literature review*

## **Introduction**

What is customer satisfaction and what affect customer satisfaction are of greater importance to any business—online or offline in order to attract and retain customers (Reibstein, 2002). Focus of this study is customer satisfaction related to online shopping due to the fact that technological advancements including the internet have resulted in the rapid growth in online shopping. According to Pentina, Amialchuk and Taylor (2011), online shopping is playing a prominent role in global marketplace since it empowers the customers by providing them with rich information. Online shopping has provided many opportunities for businesses to build and maintain relationships and interactions with the customers (Pappas, Pateli, Giannakos, & Chrissikopoulos, 2014), which can lead to customer satisfaction.

Even though the online mechanisms may provide easy to use and efficient methods of shopping (Momtaz, Islam, Ariffin, & Karim, 2011), customers may not select it unless it meets their expectations. When customer expectations match with the organization's performance, customers will be satisfied whereas they will be dissatisfied when the organization's performance is poor compared to the customer expectations (Swan & Combs, 1976). Highly satisfied customers stay loyal to the company (Williams & Naumann, 2011) and tend to purchase more, spread positive word of mouth about the company and its products, offer new ideas to the company, provide less attention towards competing brands and less sensitive to the price (Kotler & Keller, 2012). When the customer is satisfied with a particular online or offline store, there is a high tendency that he or she will shop again from the same place.

Alternatively, customer dissatisfaction signals that service encounter does not match with the expectations (Churchill, Jr, & Surprenant, 1982). Customer dissatisfaction will lead to loss of customer loyalty, which in turn results in discontinuity of subsequent transactions and repeat purchases by that customer (Moriuchi & Takahashi, 2016). Further, it has been identified that customer

dissatisfaction arises as a result of service failure or feeling of service unfulfillment. Customer dissatisfaction has been identified as a significant predictor of customers' switching behavior (Bougie, Pieters, & Zeelenberg, 2003).

Even though customer satisfaction has been researched extensively, it is apparent that there is no agreement among past researchers about the specific factors influencing online customer satisfaction. For an example, contradictory findings on the relationship between website design and online customer satisfaction were presented in the studies done by Chen, Ling, Ying, and Meng (2012) and Ranjbarian, Fathi, and Rezaei (2012). Another two studies conducted by Maditinos and Theodoridis (2010) and Evanschitzky, Iyer, Hesse, and Ahlert (2004) have presented opposite views on the effect of product information quality on online customer satisfaction.

Since these findings are not consistent but contradictory in certain instances, this research revisits those findings aiming at recognizing factors that affect on online customer satisfaction. Therefore, the aim of the current paper is to review factors that affect the online customer satisfaction.

### **Theoretical foundation**

The current study involves two major concepts: customer satisfaction and online retail shopping. A clear understanding on these both concepts is vital to proceed with this study and achieve the aims. Consequently, first the paper defines respective concepts and their scopes. Next, customer satisfaction in online shopping context and factors affecting customer satisfaction in online shopping are explained.

#### ***Customer Satisfaction***

Customer satisfaction is identified as one of the most examined constructs in marketing literature. It plays a major role in competitive environment because of its ability to retain the existing customers and attract new customers (Tandon et al., 2017). Kotler and Keller (2012, p.128) identified satisfaction as "a person's feeling of pleasure or disappointment which occurs as a result of the comparison between product or service performance and expectation". Oliver (2015, p.8), defined customer satisfaction as "consumer's fulfillment response. It is a judgment related to a product/service feature, or whether the product or service

has actually provided (or is providing) a pleasurable level of consumption-related fulfillment”. Giese and Cote (2000) stated that customer satisfaction encompasses three basic components: *a response* (emotional or cognitive) pertaining to a particular *focus* (expectations, product, consumption experience, etc.) determined at a particular *time* (after consumption, after choice, based on accumulated experience, etc.).

### ***E – satisfaction***

E-satisfaction can be defined as “contentment of a consumer with respect to his or her prior purchasing experiences with a given retail-oriented website” (Anderson & Srinivasan, 2003, p.125). In this research, customer satisfaction construct is mainly identified as the satisfaction of the customer in relation to his/her previous purchasing experience on online shopping. In most of the contexts e–satisfaction is also referred as online satisfaction.

### ***Online shopping***

Online shopping can be defined as the “use of online stores by consumers up until the transactional stage of purchasing and logistics” (Monsuwé, Dellaert & Ruyter, p.103). According to Makwan, Pathak and Sharma (2017, p.42), online shopping can be identified as the buying and selling of products and services over the Internet. Online shopping evokes the physical analogy of buying products or services at a bricks-and-mortar retailer or shopping center (Gupta, Bansal & Bansal, 2013, p.01). This encompasses three main facilities including product search facility, online purchase facility and product delivery facility (Kolesar & Galbraith as cited in Barutçu, 2010).

Online shopping has recorded a rapid growth due to the unique benefits offered to both retailers and customers. From retailers’ point of view online shopping provides the opportunity to deliver their marketing mix; product, price, place and promotion in an effective manner. In terms of right product, online store can offer a wide array of products and services compared to traditional retailers. When it comes to right price, online businesses can offer products at a lower price by incorporating all the cost savings. With regard to right place, online retailers can eliminate location and time barriers. As a result, customers can connect and purchase from the Internet at any time and any place. Finally, with regard to the right promotion, a large amount of opportunities is available to the businesses to undertake direct marketing, advertising and other promotional campaigns (Barutçu, 2010).

From customers' point of view, online shopping eliminates Spatio-temporal boundary, which indicates that customer can shop at any time and place if he or she is connected to the Internet. A comprehensive understanding of products' information would be another benefit available to the customer who shops online. Consumer can grasp entire list of products' information such as place of origin, manufacturers, price, features and functions. In addition to that consumers can view the products in the form of 3D dynamic images. All these provide the opportunity to the customer to make better purchasing decisions. Moreover, the opportunities such as convenient payment and cost savings of shopping are also available to the customers. In comparison to the traditional shopping, online shopping significantly reduces transaction cost by eliminating several monetary and non-monetary costs (Yang, Zhao & Wan, 2010).

### ***Customer satisfaction in an online shopping context***

Customer satisfaction is one of the essential factors in an online environment due to several reasons. Satisfaction has been identified as a good predictor of future purchasing behavior (McQuitty, Finn & Wiley, 2000). Therefore, in an online environment, customer satisfaction plays a significant role by assisting decision making of customers, which in return leads to repurchase behaviors and repeat purchases (Gupta & Kim, as cited. in Lin & Lekhawipat, 2014). According to Bhattacharjee (2001), greater believability is associated with the personal experience. He also stated that satisfied customers are considered to be less costly and they become more effective communication channels in spreading positive word of mouth about the organization. Further, Howat and Crilley (2007) found that when customers are satisfied, they tend to increase the usage of service and recommend it to others enabling customer attraction and retention. In addition, it has been identified that the satisfaction on quality of online service offered, determines the success or failure of the online business (Reichheld & Scheffer, 2000). When customers are dissatisfied with the service offered by an online retailer, they tend to discontinue their purchases with the company and disseminate negative information to the potential customers (Hsu, 2008). He further stated that the negative experience a customer had with a particular retailer can easily be shared among potential customers in the online context, since customers have different platforms to post their reviews or feedbacks about the online retailers. Therefore, it has become paramount important to satisfy the customers in an online shopping environment.

***Factors affecting customer satisfaction in an online shopping context***

Previous researchers have attempted to identify what affects customer satisfaction from different perspectives and in different contexts; but there is a lack of agreement among such factors. According to Maditinos & Theodoridis (2010) in Greek online shopping context, product information quality, user interface quality, service information quality, purchasing process convenience, security perception and product attractiveness have been identified as the significant determinants of customer satisfaction. Trong, Khanh, and Gim (2014) revealed website design, merchandise attributes, transaction capability, security/privacy, payment, delivery and customer service as the significant predictors of online customer satisfaction. Tandon, Kiran, & Sah (2017) also found that website functionality and perceived usefulness as factors leading to customer satisfaction in an online shopping environment.

However, it is evident that the findings of previous studies are not consistent. For instance, Chen, Ling, Ying, and Meng (2012) found that website design is the most powerful independent variable which influences customer satisfaction in online shopping environment. In contrary to this study, Ranjbarian, Fathi, and Rezaei (2012) have identified that there is no significant association between website design and customer satisfaction. Further, Maditinos and Theodoridis (2010) identified that product information quality is highly related to the overall customer satisfaction. As opposed to this result, Evanschitzky, Iyer, Hesse, and Ahlert (2004) found that product information quality is not a significant determinant of online customer satisfaction.

According to the above discussion, even though many researchers have examined customer satisfaction in general, owing to its significance in today's context, the researchers could not agree on the factors affecting customer satisfaction in online shopping context. Even though there is no agreement on factors affecting customer satisfaction, comprehensive review or systematic literature review has not been identified so far in the current scholarly world. Thus, the aim of the current paper is to review factors affecting customer satisfaction in online shopping context.

**Methodology**

In order to achieve the aim of the study, a systematic and a detailed literature review was carried out. To make the review comprehensive, several aspects

were considered such as time periods of studies, frequency of variables used, significance of variables etc. In this systematic literature review process, we followed the guidelines specified by Xiao and Watson (2017).

### ***Databases and Search Strategy***

Initial search conducted in Google Scholar and Google indicated that customer satisfaction related articles have been published in a wide variety of journals. Therefore, the researchers decided not to limit the search to specific journals, instead, to consider the available databases. This study examined Emerald Insight, Science Direct, JSTOR, Wiley online library, Semantic Scholar, Elsevier, Taylor and Francis, Google Scholar, and ResearchGate data bases. Due to the limitations to access, we couldn't reach all the databases and certain articles. However, we tried our best to include all possible articles from the databases for which we had the access. Only the journal articles (both conceptual and empirical in nature) were considered for this study and case studies, chapters, conference proceedings were out of concern.

We used "key-word" based search mechanism to find the relevant literature, starting with a single keyword and expanding it by adding a single term at a time. A total of fifteen keywords were used (Appendix A) to facilitate the search process in all databases. Keyword searching usually resulted a long list consisting of thousands of hits. When the number of hits exceeded 1,000, we limited our search to first 200 since when we move down the list of hits, we used to find more irrelevant articles than relevant articles.

### ***Selection of Articles***

Initial screening of the articles was done based on the titles of research articles. As the next step, we carefully reviewed the abstracts to determine the suitability of them for our analysis. Abstract reviews facilitated the researchers to infer the appropriateness of the articles for the study. Finally, full texts of the most related articles were reviewed

Apart from the online databases, some articles were manually searched by referring to the reference lists of the selected articles. However, the articles of which full texts were not accessible and the focus was not relevant to customer satisfaction in online context were excluded from further reference.

Timeframe of the publication was another key criterion of selecting articles, since, the factors affecting customer satisfaction can be highly influenced by the technology evolution. Accordingly, the researchers decided to consider the articles which were published in or after 2000. A careful examination revealed that 64% of the articles have been published between 2010 and 2019. Thereafter, the Content Analysis was used to review and analyze the articles comprehensively.

### **Analysis of the articles and findings**

Contents of forty-one research papers were analyzed using different criteria in achieving research objectives.

#### ***Factors for Customer Satisfaction in Online Shopping by different scholars***

The researchers studied full texts of all forty-one articles published in different journals for this analysis, and the details of the articles are presented in Table 1. It illustrates fifty-one factors used by different researchers in examining customer satisfaction in online shopping.

**Table 1: List of factors for customer satisfaction in online shopping**

No	Author(s)	Year	Factors for customer satisfaction in online shopping
01	Szymanski, D.M. and Hise, R.T.	2000	Convenience, Product Offerings, Product Information quality, Website design, Security
02	Barutcu, S.	2000	Product Information quality, Website design, Customer service, Payment, Shipping policy, Cargo Carriers service quality
03	Cho, N. and Park, S.	2001	Convenience, Product Information quality, Website design, Customer service, Merchandising
04	Kim, S. and Stoel, L.	2004	Website design, Transaction capability, Trust, Information fit to task, Entertainment
05	Evanschitzky, H., Iyer, G.R, Hesse, J. and Ahlert, D.	2004	Convenience, Product Offerings, Product Information quality, Website design, Security
06	Kim, H. R.	2005	Convenience, Product Information quality, Website design, Security, Customer service, Payment, Delivery, Price, Product attractiveness
07	Schaupp, L. C. and Bélanger, F.	2005	Convenience, Security, Merchandising, Perceived privacy, Delivery, Perceived usability, Product quality, Product customization

---

08	Rodgers, W., Negash, S. and Suk, K	2005	System Quality, Product information quality, Service quality,
09	Lin, H. F.	2007	Product Information quality, Website design, Security, Response, Interactivity, Trust, Empathy
10	Yang, H. and Tsai, F.S..	2007	Customer service, Perceived privacy, Response, Efficiency, Fulfillment & reliability, System availability, Compensation
11	Anand, A	2007	Convenience, Website design, Security, Customer service, Merchandising
12	Liu, X., He, M., Gao, F. and Xie, P.	2008	Product Information quality, Website design, Security, Customer service, Merchandising, Transaction capability, Response, Payment, Delivery
13	Chang, H. H. and Chen, S. W.	2009	Website design, Security
14	Zeng, F., Hu, Z., Chen, R. and Yang, Z.	2009	Product offering, Security, Customer service, Ease of use, Fulfillment & reliability
15	Kim, J., Jin, B. and Swinney, J.L.	2009	Website design, Security, Response, Fulfillment & reliability
16	Maditinos, D. I. and Theodoridis, K.	2010	Convenience, Product Information quality, Website design, Security, Product attractiveness, Service information quality, User participation,
17	Alam, S.S. and Yasin, N.M.	2010	Website design, Delivery, Product variety, Fulfillment & reliability, Time
18	Chung, K.H. and Shin, J.I.	2010	Convenience, Product Information quality, Website design, Security, Customer service,
19	Sheng, T. and Liu, C.	2010	Perceived privacy, Efficiency, Fulfillment & reliability, Accessibility
20	Al-Kasasbeh, M., Dasgupta, S. and Al-Faouri, A.	2011	Website design, Navigation, Personalization,
21	Edi, M.I.	2011	Product Information quality, Website design, Security, Perceived privacy
22	Gelard, P. and Negahdari, A.	2011	Convenience, Website design, Security, Customer service, Merchandizing, Company
23	Lin, C. C., Wu, H. Y. and Chang, Y. F.	2011	System Quality, Product Information quality, Customer service, Delivery, Price, Product quality
24	Momtaz. H., Islam, A. M., Ariffin, K.H. K and Karim, A.	2011	Promotional aspect/Advertisements, Product quality, Brand, Shopping experience
25	Ranjbarian, B., Fathi, S. and Rezaei, Z.	2012	Convenience, Website design, Security, Customer service, Merchandizing
26	Chen, Z., Ling, K.C., Ying, G.X and Meng, T.C.	2012	Product Information quality, Website design, Perceived privacy, Payment, Delivery, Price, Trust

---

EXPLORING KEY FACTORS FOR CUSTOMER SATISFACTION IN ONLINE SHOPPING: A SYSTEMATIC LITERATURE REVIEW

27	Guo, X., Ling, K. C. and Liu, M.	2012	Product Information quality, Website design, Security, Customer service, Payment, Delivery, Product quality, Product variety
28	Polites, G. L. Williams C.K., Karahanna, E. and Seligman, L.	2012	System quality, Product Information quality, Perceived usability, Trust, Perceived value,
29	Dharmesti, M.D.D. and Nugroho, S. S.	2012	Product Information quality, Website design, Security, Customer service, Transaction capability, Response, Payment, Delivery, Product variety
30	Silva, L.A.R.H.D and Abeysekara, N.	2012	Convenience, Promotional aspect/ Advertisements, Customer service, Technological aspect,
31	Bellaaj, M.	2013	System quality, Service quality, Web content quality
32	Nikhashemi, S.R., Paim, L., Yasmin, F. and Yousefi, A.	2013	Security, Service quality, Payment, Ease of use,
33	Trong, V.H., Khanh, N.T.V and Gim, G.	2014	Website design, Security, Customer service, Merchandizing, Transaction capability, Payment, Delivery,
34	Ludin, I.H.B.H. and Cheng, B.L.	2014	Product Information quality, Website design, Security, Service quality
35	Khan, S.A., Liang, Y. and Shahzad, S.	2015	Convenience, Product Information quality, Price, Return policy, Product risk, Finance risk, Delivery risk
36	Musa, H., Mohamad, M. A., Khalid, F.A., Rahim, N.A. and Zamri, N.N.A.	2015	Product quality, Brand, Shopping experience
37	Thilakarathne, C. and Abeysekara, N.	2016	Convenience, Security, Customer service, Response, Price,
38	Ting, O. S., Ariff, M.S.M., Zakuan, N., Sulaiman, Z. and Saman, M.Z.M.	2016	Website design, Customer service, Perceived privacy, Response, Efficiency, Fulfillment and reliability
39	Tandon, U., Kiran, R. and Sah, A.	2017	Website design, Perceived usability, Perceived usefulness
40	Al-Jahwari, N. S., Khan, M.F.R., Al-Kalbani, G. K. and Al Khansouri, S.S.	2018	Product offerings, Security, Delivery, Product quality
41	Vasic, N., Kilibarda, M. and Kaurin, T.	2019	Product information quality, Security, Delivery, Price, Product quality, Time

***Factors for customer satisfaction in online shopping in terms of different time periods***

During our study period (2000 to 2019), the technology and user behavior have changed increasing the trend towards online shopping, Therefore, it is worth examining whether factors affecting customer satisfaction in online shopping context has changed over time. To identify that, we divided the study period into four-year time scales. The results are presented in Table 2.

**Table 2: Usage of different factors for customer satisfaction in online shopping in different time periods**

No	Factor	2000- 2003	2004- 2007	2008- 2011	2012- 2015	2016- Jan. 2019
01	Website design	3	5	9	6	2
02	Security	1	5	8	6	3
03	Product Information quality	3	4	5	6	1
04	Customer service	2	3	5	5	2
05	Convenience	2	4	3	3	1
06	Delivery	1	2	3	4	2
07	Payment	2	1	1	5	
08	Merchandising	1	2	2	2	
09	Response		2	2	1	2
10	Price	1	1	1	2	2
11	Product quality		1	2	2	2
12	Perceived privacy		2	2	1	1
13	Fulfillment & reliability		1	4		1
14	Product Offerings	1	1	1		1
15	System Quality		1	1	2	
16	Service Quality		1		3	
17	Transaction capability		1	1	2	
18	Trust		2		2	
19	Ease of use	1		1	1	
20	Perceived usability		1		1	1
21	Product variety			1	2	
22	Efficiency		1	1		1
23	Product attractiveness		1	1		
24	Time			1		1

EXPLORING KEY FACTORS FOR CUSTOMER SATISFACTION IN ONLINE SHOPPING: A SYSTEMATIC  
LITERATURE REVIEW

25	Promotional aspect/Advertisements		1	1
26	Brand		1	1
27	Shopping experience		1	1
28	Navigation		1	
29	personalization		1	
30	Company		1	
31	Perceived usefulness			1
32	Additional information services	1		
33	Service information quality		1	
34	Interactivity	1		
35	Empathy	1		
36	Perceived value			1
37	User participation		1	
38	Product customization	1		
39	System Availability	1		
40	Compensation	1		
41	Return policy			1
42	Web content quality			1
43	Technological aspect			1
44	Information fit to task	1		
45	Entertainment	1		
46	product risk			1
47	Delivery risk			1
48	Financial risk			1
49	Shipping policy	1		
50	Cargo Carriers service quality	1		
51	Accessibility		1	

When we carefully examine Table 2, it is apparent that compared to the first four-year time period (2000-2003), the use of the identified variables in researches in recent time periods has generally increased. It is also visible that during the next three four-year time periods (2004-2007, 2008-2011 and 2012-

2015), the number of times each variable has been used are consistent. Especially, when we consider the top six variables in the table, it is apparent that the importance given to those variables in examining customer satisfaction in online shopping remains almost same for those three periods.

***Factors for customer satisfaction in online shopping context in terms of frequency of usage***

Table 3 illustrates the frequency of usage of different factors used to examine customer satisfaction in online shopping by different researchers. Further, it provides the list of researchers who had cited each of the fifty-one variables. The percentage value in Table 3 was calculated by dividing the frequency of usage of a particular variable by forty-one, which is the total number of articles used in this analysis. According to Table 3, “Website design” and “Security” have been used by different researchers more than 20 times in their studies. It is also apparent that “Product Information quality”, “Customer service”, “Convenience”, and “Delivery” factors have been used by researchers between 12 and 19 times. Thus, these six factors can be identified as the most frequently used factors by the researchers in studying customer satisfaction in online shopping context.

**Table 3: Frequency of usage of online customer satisfaction related factors**

No.	Determinant	Literature citation	Articles count (n = 41)	
			Frequency	%
01	Website design	Szymanski and Hise (2000); Barutçu (2000); Cho and Park (2001); Evanschitzky (2004); Kim(2005); Kim and Stoel (2004); Lin (2007); Anand (2007); Liu et al. (2008); Kim et.al. (2009); Chang and Chen (2009); Alam and Yasin (2010); Chung and Shin (2010); Maditinos and Theodoridis (2010); Al-Kasasbeh et al. (2011); Eid (2011); Gelard and Negahdari (2011); Chen et al. (2012); Guo et al. (2012) ; Dharmesti and Nugroho (2012); Ludin and Cheng (2014); Ranjbarian et al. (2012); Trong et al.(2014); Ting et al. (2016); Tandon et al.(2017)	25	61%
02	Security	Szymanski and Hise (2000); Evanschitzky (2004); Kim(2005); Schaupp and Belanger (2005); Lin (2007); Anand	23	56%

EXPLORING KEY FACTORS FOR CUSTOMER SATISFACTION IN ONLINE SHOPPING: A SYSTEMATIC LITERATURE REVIEW

		(2007); Liu et al. (2008); Zeng et al. (2009); Kim et.al.(2009); Chang and Chen (2009); Chung and Shin (2010); Maditinos and Theodoridis (2010); Eid (2011); Gelard and Negahdari (2011); Guo et al. (2012); Dharmesti and Nugroho (2012); Ranjbarian et al. (2012); Nikhashemi et al (2013); Ludin and Cheng (2014); Trong et al (2014); Thilakarathne and Abeysekara (2016); Al- Jahwari et al.(2018); Vasic et al. (2019)		
03	Product Information Quality	Barutçu (2000); Szymanski and Hise (2000); Cho and Park (2001); Evanschitzky (2004); Kim (2005); Rodgers et al (2005); Lin (2007); Liu et al.(2008); Chung and Shin (2010); Maditinos and Theodoridis (2010); Eid (2011); Lin et al. (2011); Chen et al. (2012); Polites (2012); Guo et al. (2012); Dharmesti and Nugroho (2012); Ludin and Cheng (2014); Khan (2015); Vasic et al. (2019)	19	46%
04	Customer service	Barutçu (2000); Cho and Park (2001); Kim (2005); Anand (2007); Yang and Tsai (2007); Liu et al. (2008); Zeng et al. (2009); Chung and Shin (2010); Gelard and Negahdari (2011); Lin et al.(2011); Ranjbarian et al. (2012); Guo et al. (2012); Silva and Abesekara (2012); Trong et al.(2014); Dharmesti and Nugroho (2012); Thilakarathne and Abeysekara (2016); Ting et al. (2016)	17	41%
05	Convenience	Szymanski and Hise (2000); Cho and Park (2001); Evanschitzky (2004); Kim (2005); Schaupp and Belanger (2005); Anand (2007); Chung and Shin (2010); Maditinos and Theodoridis (2010); Gelard and Negahdari (2011); Ranjbarian et al. (2012); Silva and Abeysekara (2012); Khan (2015); Thilakarathne and Abeysekara (2016)	13	32%
06	Delivery	Cho and Park (2001); Kim (2005); Schaupp and Belanger (2005); Liu et al. (2008); Alam&Yasin (2010); Lin et al. (2011); Chen et al. (2012); Guo et al.(2012); Dharmesti and Nugroho (2012); Trong et al. (2014); Al- Jahwari et al. (2018); Vasic et al. (2019)	12	29%

07	Payment	Barutçu (2000); Cho and Park (2001); Kim (2005); Liu et al. (2008); Guo et al. (2012); Dharmesti and Nugroho (2012); Chen et al. (2012); Nikhashemi et al. (2013); Trong et al. (2014)	9	22%
08	Response	Kim and Stoel (2004); Lin (2007); Yang and Tsai (2007); Liu et al. (2008); Kim et al. (2009); Dharmesti and Nugroho (2012); Ting et al. (2016)	7	17%
09	Merchandising	Cho and Park (2001); Schaupp and Belanger (2005); Anand (2007); Liu et al. (2008); Gelard & Negahdari (2011); Ranjbarian et al. (2012); Trong et al. (2014)	7	17%
10	Price	Cho and Park (2001); Kim (2005); Lin et al. (2011); Chen et al. (2012); Khan (2015); Thilakarathne and Abeysekara (2016); Vasic et al. (2019)	7	17%
11	Product quality	Schaupp and Belanger (2005); Lin et al. (2011); Momtaz et al. (2011); Guo et al. (2012); Musa et al. (2015); Al- Jahwari et al. (2018); Vasic et al. (2019)	7	17%
12	Privacy	Schaupp and Belanger (2005); Yang and Tsai (2007); Sheng and Liu (2010); Eid (2011); Chen et al. (2012); Ting et al. (2016)	6	15%
13	Fulfillment/ reliability	Yang and Tsai (2007); Kim et al. (2009); Zeng et al. (2009); Alam and Yasin (2010); Sheng and Liu (2010); Ting et al. (2016)	6	15%
14	Transaction capability	Kim and Stoel (2004); Liu et al. (2008); Dharmesti and Nugroho (2012); Trong et al. (2014) ;	4	10%
15	Product Offerings	Szymanski and Hise (2000); Evanschitzky (2004); Zeng et al. (2009); Al- Jahwari et al.(2018)	4	10%
16	Trust	Kim and Stoel (2004); Lin (2007); Polites (2012); Chen et al.(2012)	4	10%
17	System Quality	Rodgers et al (2005); Lin et al. (2011); Polites (2012); Bellaj (2013)	4	10%
18	Service Quality	Rodgers et al. (2005); Bellaj (2013); Nikhashemi et al. (2013); Ludin and Cheng (2014)	4	10%
19	Efficiency	Yang and Tsai (2007); Sheng and Liu (2010); Ting et al. (2016)	3	7%
20	Perceived usability	Schaupp and Belanger (2005); Polites (2012); Tandon et al. (2017)	3	7%
21	Product variety	Alam and Yasin (2010); Dharmesti and Nugroho (2012); Guo et al. (2012)	3	7%

EXPLORING KEY FACTORS FOR CUSTOMER SATISFACTION IN ONLINE SHOPPING: A SYSTEMATIC  
LITERATURE REVIEW

22	Ease of use	Cho and Park (2001); Zeng et al. (2009); Nikhashemi et al. (2013)	3	7%
23	Product attractiveness	Kim (2005); Maditinos and Theodoridis (2010)	2	5%
24	Time	Alam and Yasin (2010); Vasic et al. (2019)	2	5%
25	Promotional aspect	Momtaz et al. (2011); Silva and Abeysekara (2012)	2	5%
26	Brand	Momtaz et al. (2011); Musa et al. (2015)	2	5%
27	Shopping experience	Momtaz et al. (2011) Musa et al. (2015)	2	5%
28	Navigation	Al-Kasasbeh et al. (2011)	1	2%
29	Personalization	Al-Kasasbeh et al. (2011)	1	2%
30	Company	Gelard and Negahdari (2011)	1	2%
31	Additional information services	Cho and Park (2001)	1	2%
32	Interactivity	Lin (2007)	1	2%
33	Empathy	Lin (2007)	1	2%
34	Perceived value	Polites (2012)	1	2%
35	User participation	Maditinos and Theodoridis (2010)	1	2%
36	Product customization	Schaupp and Belanger (2005)	1	2%
37	System Availability	Yang and Tsai (2007)	1	2%
38	Compensation	Yang and Tsai (2007)	1	2%
39	Return policy	Khan (2015)	1	2%
40	Web content quality	Bellaaj (2013)	1	2%
41	Technological aspect	Silva and Abeysekara (2012)	1	2%
42	Information fit to task	Kim and Stoel (2004)	1	2%
43	Entertainment	Kim and Stoel (2004)	1	2%
44	Product risk	Khan (2015)	1	2%
45	Delivery risk	Khan (2015)	1	2%
46	Financial risk	Khan (2015)	1	2%
47	Shipping policy	Barutçu (2000)	1	2%
48	Cargo carriers service Quality	Barutçu (2000)	1	2%
49	Accessibility	Sheng amd Liu (2010)	1	2%

50	Service information quality	Maditinos et al. (2010)	1	2%
51	Perceived usefulness	Tandon et al. (2017)	1	2%

### ***Factors for customer satisfaction in online shopping in terms of significance***

The researchers analyzed the findings of each research article considered in this study to identify which factors have been used in the study and which have been significant. By doing this analysis for all the forty-one articles, the researchers could uncover all the variables used in those articles and how many times each variable has been significant. The results are presented in Table 4. The Percentage of Significance given in Table 4 was calculated by dividing number of instances a particular variable became significant by the frequency of usage of that particular variable. Variables are presented from highest frequency of significance to the lowest frequency of significance. The value of 100% indicates that the variable has become significant all the time it was used. The value of 0% indicates those variables have not become significant in any of the instances they were used. Results of this analysis reveal that out of the fifty-one variables used in this study, there are thirty-four variables which became significant 100%. It is also apparent that ‘Empathy’, ‘User participation’, ‘Entertainment’, ‘Shipping policy’, and ‘Accessibility’ have not been significant at any of the studies considered in this research.

Even though, there are thirty-four variables which have been significant in all the time, it is evident that for certain variables frequency of usage is fairly low. In twenty-one of the instances, the frequency of usage is one. Therefore, interpretation of results just based on the percentage of significance seems to be unrealistic.

**Table 4 : Significant factors in relation to online customer satisfaction**

No.	Variable	Frequency of usage	Frequency of significance	Percentage of significance
01	Website design	25	21	84%
02	Security	23	20	87%
03	Customer service	17	17	100%
04	Product information quality	19	16	84%

EXPLORING KEY FACTORS FOR CUSTOMER SATISFACTION IN ONLINE SHOPPING: A SYSTEMATIC  
LITERATURE REVIEW

05	Convenience	13	13	100%
06	Delivery	12	12	100%
07	Payment	9	9	100%
08	Price	7	7	100%
09	Product quality	7	7	100%
10	Merchandising	7	6	86%
11	Fulfillment & reliability	6	6	100%
12	Response	7	4	57%
13	Perceived privacy	6	4	67%
14	System quality	4	4	100%
15	Service quality	4	4	100%
16	Product offerings	4	3	75%
17	Transaction capability	4	3	75%
18	Ease of use	3	3	100%
19	Efficiency	3	3	100%
20	Trust	4	2	50%
21	Perceived usability	3	2	67%
22	Product variety	3	2	67%
23	Product attractiveness	2	2	100%
24	Promotional aspect/ Advertisements	2	2	100%
25	Time	2	1	50%
26	Navigation	1	1	100%
27	Personalization	1	1	100%
28	Company	1	1	100%
29	Perceived usefulness	1	1	100%
30	Additional information services	1	1	100%
31	Service information quality	1	1	100%
32	Interactivity	1	1	100%
33	Perceived value	1	1	100%
34	Product customization	1	1	100%
35	System Availability	1	1	100%
36	Compensation	1	1	100%
37	Return policy	1	1	100%
38	Web content quality	1	1	100%
39	Technological aspect	1	1	100%

40	Information fit to task	1	1	100%
41	Product risk	1	1	100%
42	Delivery risk	1	1	100%
43	Financial risk	1	1	100%
44	Cargo carriers service quality	1	1	100%
45	Brand	1	1	100%
46	Shopping experience	1	1	100%
47	Empathy	1	0	0%
48	User participation	1	0	0%
49	Entertainment	1	0	0%
50	Shipping policy	1	0	0%
51	Accessibility	1	0	0%

## Discussion and Conclusion

Due to the boom of online shopping, customer satisfaction has become a prime concern. However, it was apparent that a comprehensive literature review to identify the factors affecting customer satisfaction in online shopping context is scarce. Further, prior researchers have focused on a limited number of factors in their individual studies. Therefore, this study focused on performing a systematic literature review to identify the variety of factors identified by prior researchers as the factors for customer satisfaction in relation to online shopping.

The analysis revealed that previous scholars have used fifty-one different factors in their studies (Table 2), which were spread among forty-one articles Table 01 published by variety of publishers. Thus, it is evident that knowledge in relation to factors affecting online customer satisfaction is fragmented. This makes it difficult for individual researchers to identify all the related factors for their separate studies. However, through this paper, the researchers have brought all those factors to a single source, making it widely available to future researchers.

The breakdown of factors according to different time periods (see Table 2) revealed that there are certain factors which have been used extensively by researchers. According to Table 2, there are two factors which have been used

by researchers more than twenty times; there are four factors which have been used between twelve and nineteen times; and there are six factors which have been used between six and nine times. Usage of other factors is less than or equal to four times throughout the two-decade period considered in this study. Therefore, amongst the all factors, thirteen factors (Factors 1 to 13 in Table 2), where usage is six times or more, can be identified as the set of factors which have a higher usage. Among them, there are six factors (Website design, Security, Product information quality, Customer service, Convenience, Delivery) which have a very high usage (12 times or more) by different researchers, during the time period considered.

The frequency analysis (see Table 3) revealed that 'Website design' is the most frequently used factor (61%), followed by 'Security' (56%). Thus, this study considered these two factors as the most important in examining online customer satisfaction. 'Product information quality' and 'Customer service' also have been used above 40%, indicating the preference given by researchers to include these two variables in their studies. 'Convenience', 'Delivery', and 'Payment' have a usage between 22% and 32%. Therefore, it can be seen that researchers have repeatedly used these seven factors compared to other factors. Frequency of usage of other forty-four factors vary between 2% and 17%. Thus, it is apparent that the usage of certain factors is extremely low.

The researchers also examined the number of times each factor became significant in previous studies. The results (see Table 4) revealed that there are thirty-four variables which have been significant 100% of the times they were used. The top six variables included 'Customer service', 'Convenience', 'Delivery', 'Payment', 'Price' and 'Product quality'. Number of times the other factors have been significant is between 0% and 87%. Even though, thirty-four variables have been significant 100% of the time, we cannot consider them as equally important since the frequency of usage of those variables differ. The frequency of usage ranges from 1 to 17 for them. Also, there are five factors (Empathy, User participation, Entertainment, Shipping policy, Accessibility) which have not become significant in any of the studies. Therefore, these five factors may be considered as less relevant for online customer satisfaction.

This study has both theoretical and practical implications. When it comes to theoretical contributions, the researchers have identified a pool of factors that influence the customer satisfaction in online shopping. This study compiled the

knowledge fragmented in many researches studies and made available in a single source for future researchers. According to the authors' understanding, there was no such systematic literature review examining customer satisfaction in online shopping. Thus, with this paper, the researchers have added new knowledge into this context. Further, we analyzed factors for customer satisfaction in online shopping from different perspectives such as time of study, frequency of usage of variables, significance of variables etc. Those results can be used by future researchers in formulating their research frameworks and in their studies.

This study has managerial implications too. The study has revealed a list of significant factors for customer satisfaction in an online shopping context. Businesses can pay attention to those factors to improve customer satisfaction in online shopping context, which is different from conventional customer satisfaction, which can lead to a variety of benefits such as higher sales and profits, customer retention, customer loyalty, and customer returning.

The present study has a few limitations as well. The analysis part of the study was based on the research articles which researchers downloaded from several online databases, which the researchers had access to. However, there can be other places where online customer satisfaction related articles published which the researchers could not access. Therefore, future researchers can expand this study by incorporating more research articles found from a variety of other sources. The factors that were explored from the current paper solely through a desk research approach can be further tested empirically either in a single study or in multiple studies.

## References

- Al-Jahwari, N. S., Khan, M.F.R., Al- Kalbani,G. K. & Al Khansouri, S.S. (2018). Factors influencing customer satisfaction of online shopping in Oman – youth perspective. *Humanities and Social Sciences Research*,6 (2), 64-73. <https://doi.org/10.18510/hssr.2018.628>
- Al-Kasasbeh, M., Dasgupta, S. & Al-Faouri, A. (2011). Factors affecting e-service satisfaction. *Communications of the IBIMA*, 2011 (2011), 1–12.
- Alam, S.S. &Yasin, N.M. (2010). An investigation into the antecedents of customer satisfaction of online shopping. *Journal of Marketing Development and Competitiveness*, 5(1), 71–79.

- Anand, A. (2007). E-satisfaction - A comprehensive framework. *Second International Conference on Internet and Web Applications and Services*. <https://doi.org/10.1109/ICIW.2007.30>
- Anderson E.W., Fornell, C. & Lehmann, D.R. (1994). Customer satisfaction, market share and profitability: findings from Sweden. *Journal of Marketing*, 58 (3), 53-66. <https://doi.org/10.2307/1252310>
- Anderson, R.E. and Srinivasana, S.S. (2003). E-satisfaction and E-Loyalty: a contingency framework. *Psychology & Marketing*, 20(2), 123–138. <https://doi.org/10.1002/mar.10063>
- Barutçu, S. (2010). E-customer satisfaction in the e-tailing industry: an empirical survey for turkish e-customers. *Ege Academic Review*, 10 (1), 15-35. <https://doi.org/10.21121/eab.2010119646>
- Bellaaj, M. (2013). Web-based information systems success: testing the antecedents of online customer satisfaction. *International Journal of Internet and Enterprise Management*, 8(2), 129–145. <https://doi.org/10.1504/IJIEM.2013.055959>
- Bhattacharjee, A. (2001). An empirical analysis of the antecedents of electronic commerce service continuance. *Decision Support Systems*, 32 (2), 201–214. [https://doi.org/10.1016/S0167-9236\(01\)00111-7](https://doi.org/10.1016/S0167-9236(01)00111-7).
- Bougie, R., Pieters, R. & Zeelenberg, M. (2003). Angry customers don't come back, they get back: the experience and behavioral implications of anger and dissatisfaction in services. *Journal of the Academy of Marketing Science*, 31(4), 377–393. <https://doi.org/10.1177/0092070303254412>
- Chang, H. H. & Chen, S. W. (2009). Consumer perception of interface quality, security, and loyalty in electronic commerce. *Information and Management*, 46(7), 411–417. <https://doi.org/10.1016/j.im.2009.08.002>
- Chen, Z., Ling, K.C., Ying, G.X. & Meng, T.C. (2012). Antecedents of online customer satisfaction in China. *International Business Management*, 6(2), 168-175. <https://doi.org/10.3923/ibm.2012.168.175>
- Cho, N. & Park, S. (2001). Development of electronic commerce user-consumer satisfaction index for internet shopping. *Industrial Management and Data Systems*, 101(8), 401-405, <https://doi.org/10.1108/EUM0000000006170>
- Chung, K.H. and Shin, J.I. (2010). The antecedents and consequents of relationship quality in internet shopping. *Asia Pacific Journal of Marketing and Logistics*, Vol. 22, No.5, pp. 473-491. <https://doi.org/10.1108/13555851011090510>

- Churchill, G.A., Jr. & Surprenant, C. (1982). An investigation in to determinants of customer satisfaction. *Journal of Marketing Research*, 19(4), 491-504. <https://doi.org/10.2307/3151722>
- Dharmesti, M.D.D. & Nugroho, S.S. (2012). The Antecedents of online customer satisfaction and customer loyalty. *The Business & Management Review*, 7(2), 57–68.
- Edi, M.I. (2011). Determinants of e-commerce customer satisfaction, trust, and loyalty in Saudi Arabia. *Journal of Electronic Commerce Research*, 12 (1), 78-93.
- Eklof, J., Podkorytova, O. and Malova, A. (2018). Linking customer satisfaction with financial performance: an empirical study of Scandinavian banks. *Total Quality Management & Business Excellence*, 1–19. <https://doi.org/10.1080/14783363.2018.1504621>
- Evanschitzky, H., Iyer, G.R, Hesse, J. and Ahlert, D. (2004). E-satisfaction: A re-examination. *Journal of Retailing*, 80 (3), 239–247. <https://doi.org/10.1016/j.jretai.2004.08.002>
- Flavián, C., Guinalú, M. &Gurrea, R. (2006). The role played by perceived usability, satisfaction and consumer trust on website loyalty. *Information and Management*, 43(1), 1–14. <https://doi.org/10.1016/j.im.2005.01.002>
- Gelard, P. & Negahdari, A. (2011). A new framework for customer satisfaction in electronic commerce. *Australian Journal of Basic and Applied Sciences*, 5(11), 1952-1961.
- Giese, J.L & Cote, J.A. (2000). Defining Consumer Satisfaction. *Academy of Marketing Science Review*, 2000 (1), 1-27.
- Guo, X., Ling, K. C. & Liu, M. (2012). Evaluating factors influencing consumer satisfaction towards online shopping in China. *Asian Social Science*, 8(13), 40–49. <https://doi.org/https://doi.org/10.5539/ass.v8n13p40>
- Gupta, A., Bansal, R., Bansal, A. (2013). Online shopping: a shining future. *International Journal of Techno-Management Research*, 1(1), 1-10.
- Howat, G. & Crilley, G. (2007). Customer service quality, satisfaction, and operational performance: a proposed model for Australian public aquatic centres. *Annals of Leisure Research*, 10(2), 168-195.
- Hsu, S. H. (2008). Developing an index for online customer satisfaction: Adaptation of American customer satisfaction index. *Expert Systems with Applications*, 34 (4), 3033–3042. <https://doi.org/10.1016/j.eswa.2007.06.036>
- Khan, S.A., Liang, Y. & Shahzad, S. (2015). An empirical study of perceived factors affecting customer satisfaction to repurchase intention in online store

- in China. *Journal of Service Science and Management*, 8(3), 291-305.  
<https://doi.org/10.4236/jssm.2015.83032>
- Kim, H. R. (2005). Developing an index of online customer satisfaction. *Journal of Financial Services Marketing*, 10(01), 49-64.  
<https://doi.org/10.1057/palgrave.fsm.4770173>
- Kim, J., Jin, B. & Swinney, J.L. (2009). The role of retail quality, e-satisfaction and e-trust in online loyalty development process. *Journal of Retailing and Consumer Services*, 16(4), 239-247.  
<https://doi.org/10.1016/j.jretconser.2008.11.019>
- Kim, S. & Stoel, L. (2004). Apparel retailers: Website quality dimensions and satisfaction. *Journal of Retailing and Consumer Services*, 11(2), 109–117.  
[https://doi.org/10.1016/S0969-6989\(03\)00010-9](https://doi.org/10.1016/S0969-6989(03)00010-9)
- Kotler, P & Keller, K. L. (2012). *Marketing Management* (15<sup>TH</sup> ed.). New Jersey, Prentice Hall.
- Lin, C. and Lekhawipat, W. (2014). Factors affecting online repurchase intention. *Industrial Management and Data Systems*, 114 (4), 597–611.  
<https://doi.org/10.1108/IMDS-10-2013-0432>
- Lin, C. C. (2003). A critical appraisal of customer satisfaction and e-commerce. *Managerial Auditing Journal*, 18 (3), 202–212.  
<https://doi.org/10.1108/02686900310469952>
- Lin, C. C., Wu, H. Y. & Chang, Y. F. (2011). The critical factors impact on online customer satisfaction. *Procedia Computer Science*, 3(2011), 276–281. <https://doi.org/10.1016/j.procs.2010.12.047>
- Lin, H. F. (2007). The impact of website quality dimensions on customer satisfaction in the B2C e-commerce context. *Total Quality Management and Business Excellence*, 18(4), 363-378.  
<https://doi.org/10.1080/14783360701231302>
- Liu, X., He, M., Gao, F. & Xie, P. (2008). An empirical study of online shopping customer satisfaction in China: A holistic perspective. *International Journal of Retail and Distribution Management*. 36(11), 919–940.  
<https://doi.org/10.1108/09590550810911683>
- Ludin, I.H.B.H. & Cheng, B.L. (2014). Factors influencing customer satisfaction and e-loyalty: online shopping environment among the young adults. *Management Dynamics in the Knowledge Economy*, 2 (3), 462-471.
- Maditinos, D. I. & Theodoridis, K. (2010). Satisfaction determinants in the Greek online shopping context. *Information Technology and People*, 23 (4), 312–329.  
<https://doi.org/10.1108/09593841011087789>

- Makwana, K., Pathak, A. & Sharma, P. (2017). What drives consumers to shop online. *IOSR Journal of Computer Engineering*, 42-47.
- McQuitty, S., Finn, A. & Wiley, J. B. (2000). Systematically varying consumer satisfaction and its implications for product choice. *Academy of Marketing Science Review*, 2000 (10), 1–16.
- Momtaz. H., Islam, A. M., Ariffin, K.H. K & Karim, A. (2011). Customer satisfaction on online shopping in Malaysia. *International Journal of Business and Management*, 6(11), 162 - 169. <https://doi.org/10.5539/ijbm.v6n10p162>
- Monsuwé, T. P., Dellaert, B.G.C. & Ruyter, K. (2004). What drives consumers to shop online? A literature reviews. *International Journal of Service Industry Management*, 15 (1),102-121. <https://doi.org/10.1108/09564230410523358>
- Moriuchi, E. & Takahashi, I. (2016). Satisfaction trust and loyalty of repeat online consumer within the Japanese online supermarket trade. *Australasian Marketing Journal*, 24(2), 146–156. <https://doi.org/10.1016/j.ausmj.2016.02.006>
- Musa, H., Mohamad, M. A., Khalid, F.A., Rahim, N.A. & Zamri, N.N.A. (2015). Factors Affecting Customer Satisfaction towards Online Shopping, *The 3rd International Conference on Technology Management and Technopreneurship*, 1-17.
- Nikhashemi, S.R., Paim, L., Yasmin, F. & Yousefi, A. (2013). Critical factors in determining customer satisfaction toward internet shopping in Malaysia. *International Journal of Business and Management Invention*, 2 (1), 44-51.
- Oliver, R. L. (1980). A cognitive model of the antecedents and consequences of satisfaction decisions. *Journal of Marketing Research*, 17 (4), 460-469.
- Oliver, R.L. (2015). *Satisfaction: A Behavioral Perspective on the Consumer*. New York, NY: Routledge.
- Pappas, I. O., Pateli, A.G., Giannakos, M.N. & Chrissikopoulos, V. (2014). Moderating effects of online shopping experience on customer satisfaction and repurchase intentions. *International Journal of Retail and Distribution Management*, 42(3), 187–204. <https://doi.org/10.1108/IJRDM-03-2012-0034>
- Parker, C. & Mathews, B.P. (2001). Customer satisfaction: contrasting academic and consumers' interpretations. *Marketing Intelligence & Planning*, 19 (1), 38-44. <https://doi.org/10.1108/02634500110363790>
- Pentina, I., Amialchuk, A. & Taylor, D. G. (2011). Exploring effects of online shopping experiences on browser satisfaction and e-tail performance.

- International Journal of Retail and Distribution Management*, 39 (10),742–758. <https://doi.org/10.1108/09590551111162248>
- Polites, G. L. Williams C.K., Karahanna, E. & Seligman, L. (2012). A theoretical framework for consumer e-satisfaction and site stickiness: an evaluation in the context of online hotel reservations. *Journal of Organizational Computing and Electronic Commerce*, 22 (1), 1–37. <https://doi.org/10.1080/10919392.2012.642242>
- Ranjbarian, B., Fathi, S. & Rezaei, Z. (2012). Factors influencing on customers' E-satisfaction: a case study from Iran. *Interdisciplinary Journal of Contemporary Research in Business*, 3(9), 1496-1511.
- Reibstein, D.J. (2002) What Attracts Customers to Online Stores, and What Keeps Them Coming Back? *Journal of the Academy of Marketing Science*, 30(4), 465-473. <https://doi.org/10.1177/009207002236918>
- Reichheld, F.F. & Schefter, P. (2000). E-loyalty: your secret weapon on the web. *Harvard Business Review*, 78, 105-113.
- Rodgers, W., Negash, S. & Suk, K. (2005). The moderating effect of on-line experience on the antecedents and consequences of on-line satisfaction. *Psychology & Marketing*, 22 (4), 313-331. <https://doi.org/10.1002/mar.20061>
- Schaupp, L. C. & Bélanger, F. (2005). A conjoint Analysis of Online Consumer Satisfaction. *Journal of Electronic Commerce Research*, 6 (2), 95–111.
- Sheng, T. and Liu, C. (2010). An empirical study on the effect of e-service quality on online customer satisfaction and loyalty, *Nankai Business Review International*, 1 (3), 273-283. <https://doi.org/10.1108/20408741011069205>
- Silva, L.A.R.H.D & Abeysekara, N. (2012). Influence of Internet banking on customer satisfaction in the Sri Lankan context. *Annual Academic Sessions, Open University of Sri Lanka*, pp.183-185.
- Swan, J.E. & Combs, L.J. (1976). Product Performance and Consumer Satisfaction: A New Concept. *Journal of Marketing*, 40 (2). 25-33. <http://psycnet.apa.org/doi/10.2307/1251003>
- Szymanski, D.M. & Hise, R.T. (2000). E- satisfaction: an initial examination. *Journal of Retailing*, 76(3), 309-322. [https://doi.org/10.1016/S0022-4359\(00\)00035-X](https://doi.org/10.1016/S0022-4359(00)00035-X)
- Tandon, U., Kiran, R. & Sah, A. (2017). Analyzing customer satisfaction: users perspective towards online shopping. *Nankai Business Review International*, 8 (3), 266–288. <https://doi.org/10.1108/NBRI-04-2016-0012>
- Thilakarathne, C. & Abeysekara, N. (2016). Influencing factors for customer satisfaction of mobile-money services, with special reference to mcash

- service by Mobitel Sri Lanka. *Asia Pacific Journal of Marketing and Retail Management*, 7(2), 2317-2349.
- Ting, O. S., Ariff, M.S.M., Zakuan, N., Sulaiman, Z. & Saman, M.Z.M. (2016). E-Service Quality, E-Satisfaction and E-Loyalty of Online Shoppers in Business to Consumer Market; Evidence form Malaysia. *IOP Conference Series: Materials Science and Engineering*, 131, 1-11. <https://doi.org/10.1088/1757-899X/131/1/012012>
- Trong, V.H., Khanh N.T.V & Gim, G. (2014). Evaluating factors influencing consumer satisfaction towards online shopping in Viet Nam. *Journal of Emerging Trends in Computing and Information Sciences*, 5(1), 67-71. <https://doi.org/10.5539/ass.v8n13p40>
- Vasic,N., Kilibarda, M. and Kaurin, T.(2019). The influence of online shopping determinants on customer satisfaction in the Serbian market. *Journal of Theoretical and Applied Electronic Commerce Research*, 14 (2), 70-89. <https://doi.org/10.4067/S0718-18762019000200107>
- Williams, P. & Naumann, E. (2011). Customer satisfaction and business performance: a firm-level analysis. *Journal of Services Marketing*, 25(1), 20-32. <https://doi.org/10.1108/08876041111107032>
- Xiao, Y. and Watson, M. (2017). Guidance on Conducting a Systematic Literature Review. *Journal of Planning Education and Research*, 39(1), 1-20. <https://doi.org/10.1177/0739456X17723971>
- Yang, H. & Tsai, F.S. (2007). General E-S-QUAL scales applied to websites satisfaction and loyalty model. *Communications of the IIMA*, 7(2), 115–126.
- Yang, J., Zhao, H. & Wan, J. (2010). Research on the advantages and disadvantages of online shopping and corresponding strategies, *International Conference on E-Product E-Service and E-Entertainment*. doi:10.1109/iceee.2010.5660278.
- Zeng, F., Hu, Z., Chen, R. & Yang, Z. (2009). Determinants of online service satisfaction and their impacts on behavioural intentions. *Total Quality Management and Business Excellence*, 20(9), 953-969. <https://doi.org/10.1080/14783360903181719>

## Appendix A

List of key-words used in the search process

1. Customer + satisfaction
2. e-satisfaction
3. e-satisfaction + online
4. e-satisfaction + online + shopping
5. customer + satisfaction + online
6. customer + satisfaction + online + shopping
7. determinants + customer + satisfaction
8. determinants + customer + satisfaction + online
9. determinants + customer + satisfaction + online + shopping
10. factors + online + customer + satisfaction
11. factors + affecting + online + customer + satisfaction
12. factors + customer + satisfaction + online shopping
13. factors + affecting + customer + satisfaction + online + shopping
14. factors + customer + satisfaction + online + shopping + Sri Lanka
15. factors + affecting + customer + satisfaction + online + shopping + Sri  
Lanka