Economic Demand Formation Motives in Online-Shopping

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The study of online shopping motives becomes more important because of the increasing number of online shops and the fast-growing size of the online retail market. This makes a significant impact on the consumer experience and changes the behaviour of people, profit, and the use of the distribution channels. The novelty of this research is based on the development of the classification model, which explores economic demand formation motives perceived by sellers in online shopping. It consists of: deliberate, reasonable-price shopping model, clear and easy, lower-price shopping model, fast, easy shopping model, fast and informed, reasonable-price shopping model, fast, low-price shopping model, clear and easy shopping model, clear, lower-price shopping model, and cheap and simple shopping model. These models are developed based on the interdependence of the following created latent models: demand inclination and growth interferences model, demand emergence stimulation model, and demand growth acceleration and growth incentives model. The study of online shopping economic motives perceived by the sellers has revealed that it is the multidimensional structure, which is essentially based on the understanding of the added value of shopping. This value usually depends on a set of factors that reduce the shopping attractiveness and, vice versa, induce it. For this study, the survey was used, and the experts representing top e-commerce managers and owners were selected. The five categories empirically defining the economic demand motives were extracted. Additionally, three categories that are unexplored empirically also were extracted due to a limited number of possible categories. The complete eight-category model fully describes the internationally relevant models of an e-commerce business.

Keywords: *Demand Formation Models; Economic Motives; Typology; E-Commerce.*

Introduction

For more than twenty years, the internet is used for online shopping, and it has been the major factor in the constantly changing consumer shopping behaviour (Lim *et al.,* 2016). It has become more important due to the number of those who shop online, and this number is growing every day.

The researchers also have focused on this topic. It became popular to study the consumer shopping behaviour by marketing researchers (Lim *et al.,* 2016; Parsons, 2002; Lim *et al.,* 2004; Chang *et al.,* 2011; Lim, 2015) economics and psychology researchers (Bhatnagar, 2007; Jarvenpaa *et al.*, 2013; Al-Qeisi *et al.,* 2014; Yu *et al.,* 2007). All of them made an impact on developing new technologies that helped to find new ways for the use of online shopping, but at least one thing remains unstudied in this case. It is the economic demand formation motives. It is important to study these motives in answering the question of what drives online shopping. Such motives are important

because they could help to answer the question of what is the customers' understanding of the value they obtain and how closely this value depends on the economic motives.

Research problem. Until now, the demand formation of economic motives has been incompletely investigated. There is a lack of evidence of how the sellers perceive the customers' economic motives. To study this is important because the sellers, the same as customers, can have their own vision about the customers' economic motives and may have an explanation about the reasons that drive customers to shop online.

There is a number of studies that confirm the existence of personal opinion towards others' attitudes, and this is the fundamental issue in the behavioural economics theory (Foxall, 2002). Moreover, sometimes, people develop the model of others thinking. It helps them imagine the notions and attitudes of others. This is important, especially in the context of business development, when the manager draws the strategic directions for their business. Therefore, the imagined model of other's thinking becomes the perceived

understanding of the market needs. The more this model corresponds to the real needs of the customer, the more successful the business is. And vice versa, there are some efforts to research the issue of shaping the "common" consumer behaviour patterns by implementing long term marketing incentives and using mass media instruments in online shopping platform (Pavitt, 2004).

The aim of this research was to develop the full model of shopping online economic motives of customers that are perceived by online shop managers and using it to find the main economic motives that have led the most advanced online sellers into success. The study based on expert evaluation was used.

During this case, the top leaders in the Lithuanian online business were selected as experts. Based on their perception of the shoppers' needs and their experience to offer, the empirical fifth-dimensional six-cluster model was extracted. This deductive model represents the range of the seller's strategies, ensuring successful leadership in the Lithuanian online shopping sector.

Factors Determining Motives that Cause the Demand Inclination and its Growth Interference

The online shopping has been studied already, but an incompleteness of the findings still exists. Until now, the researchers had already studied the process and the main factors of shopping (Chang *et al.,* 2011; Lim *et al.,* 2004; Lim, 2015; Pentina *et al.,* 2011; Huang *et al.,* 2013). The findings that describe the motives leading to the demand inclination in their studies help to relate the e-service quality that the websites offer to the satisfaction that customers receive (Lim *et al.,* 2004; Chang *et al.,* 2011; Pentina *et al.,* 2011; Huang *et al.,* 2013). This discovery is important because it indirectly explains why not all online shops become popular among customers. Some authors discuss these features deeper and present five dimensions related to online shopping problems: Sensory, Cognitive, Emotional, Pragmatic, and Relational (Huang *et al.,* 2013). All of this was important in the development of a behavioural model that would describe the customer's intention to buy and would allow management of the shopping motives in order to prevent the possible demand inclination because of customer dissatisfaction on their first experience.

The studies also explored that customer's motives that lead to their dissatisfaction are the antecedents and the consequences of online shopping; and the customers' usage behaviour. Based on the findings, Lim (2015) design the model that consists of 13 constructs. The author creates the scales for perceived value, attitude, e-shopping intention, actual e-shopping purchase, e-shopping experience, trust, perceived usefulness, perceived ease of use, entertainment gratification, web irritation, social factors, web atmospherics, and emotional state. The importance of this research is that the problems of shopping also relate to information gathering and information accessibility (Lim, 2015). This refers to the fact that the first impress of the customer is important in the formation of the motives to shop online, and if it is not happening, this may lead to the inclination of the demand or interference of its growth.

Factors Stimulating the Attraction of New Customers and Increasing the Demand

Authors that studied the demand disturbances have studied the factors, which influence the increase in demand (Rowley, 1997; Bigne-Alcaniz *et al.*, 2008). Some of their findings can be related to the attraction of new customers, while others are more related to the factors influencing the existing ones to consume more. In this part will be discussed motives that can cause the attraction of the new customers.

Authors studying online shopping have discussed convenience as one of the main criteria causing the emergence of the motive responsible for online shopping selection (Al-Qeisi *et al.,* 2014). Authors expand convenience into the multidimensional structure where they extract dimensions: time utilization, accessibility, portability, appropriateness, handiness, and avoidance of unpleasantness, time, place, acquisition, use, execution convenience, effort, search, possession, transaction, benefits, and post benefit, etc. Some of these dimensions can be re-grouped and distributed across other categories like access convenience, search convenience, evaluation convenience, transaction convenience, possession convenience, and post-purchase convenience. Most of them remain important in the process of considering start shopping or not on a particular website, and some of them, like: time, utilization, effort, benefits, etc. will remain important later too. That is the main reason why these dimensions are so important from the very beginning of the shopping process.

First, an important factor is the accessibility of a web site. It considered as the most important in determining consumers' perceived online shopping convenience (Al-Qeisi *et al.,* 2014).

Time is considered as a second important factor. The time is important because of the several different perspectives. One is the shopping time - the 24-hour access to the internet shop, and the other - the amount of time spent shopping. Both of them are important because they are responsible for customers' motives to find the most convenient time for shopping online.

The difference between shopping experience in the online shopping industry and retail industry is basically based on the possibility to present the information for the buyer. For example, some authors discuss the importance of functional and non-functional motives (Parsons, 2002; Lim *et al.,* 2004). Early discussion in marketing literature has led to the statement that online shopping will never be similar to retail shopping because, for online shoppers, it is impossible to fulfil the non-functional motives. Today the situation changes, and some of the non-functional motives could be already fulfilled by presenting more valuable information needed for shoppers (Becerra *et al.,* 2011). For example, the need to touch and evaluate the product alive can be changed by the pictures (for the used product) or by the example pictures and the detailed description of the product characteristics (for the new one). This led to the imagination of the product and to accept it as it is real (Parsons, 2002). Therefore, what indeed changed in the shopping experience, it is the way of getting information about the product. In both cases, the shopper seeks the right

information and decide to buy or not based on it. This makes the information the highly important factor based on which depends on the success of the attraction of new shoppers and the possibility to keep the existing one.

Another discussion that concerns online shopping is related to the shopping security and security of payments (Rowley, 2000; Monsuwe *et al.,* 2004). The security of payments depends on information on transaction security, whereas the shopping security depends on the trust, personal information, and privacy security concerns of the shopper (Lim *et al.,* 2004; Rowley, 2000). The results of previous research indicate that buyers tend to be more careful in shopping online by examining the credibility of the vendor, than buying in a traditional manner in the shops (Lim *et al.,* 2004). All this is closely related to the uncertainty and inconvenience that comes from changing habits and consumer behaviour.

Factors Determining Motives that Stimulate the Intensity of Shopping Online and Accelerate the Demand Growth

The online shopping motives have been based on the functionality, reputation, shopping quality, ease of shopping, accessibility, assortment, and sufficiency of information (Al-Qeisi *et al.,* 2014; Kim *et al.,* 2010; Akroush & Al-Debei, 2015). All of these factors can be experienced during the first shopping and will evolve together with the gained experience during future shopping.

The analysis of literature indicates that functionality mostly is analysed in a processual perspective, and it mostly refers to the quality dimension (website quality, network quality, navigation quality) (Forbes *et al.,* 2005; Al-Debei, M. M. *et al.,* 2015). Studies so far have revealed that functionality and web site content influence online shopping satisfaction, which is related to e-shopping intentions. Furthermore, it has been analysed as a factor influencing the retail e-commerce failures (Al-Debei, M. M. *et al.,* 2015). All the mentioned once again confirm that the functionality as a factor become meaningful after it is experienced during the online shopping process, and the measurement of functionality is closely related to the characteristics of websites browsing, ordering, and information location (Kanibir *et al.,* 2009).

Researchers also have discussed the reputation and trust relation in terms of companies' credibility/reliability from the consumer's point of view (Lee *et al.,* 2011; Zheng *et al.,* 2015; Jairak *et al.,* 2015). This becomes highly important when opened online shops that have no physical trading venue. Therefore, the customer could not go and see the product alive. This has led to the strengthening of the other means responsible for reputation development. The consumer changing in his purchasing manner and social networks enabled consumers to compare prices, to discuss with friends about the quality and satisfaction of products, and to find non-formal information about a particular company. The reputation formation process becomes more complicated because it started to depend on more enriched feelings and the secondary details that support the imagination of the consumer product. The secondary details maybe the quality of the picture, the quality of the website, etc. All of this will lead to the bigger trust because

a consumer will intuitively assume that if everything related to the shopping environment supports a good reputation, the purchasing product should be good too (Lee *et al.,* 2011; Kennedy *et al.,* 2006).

The online shopping quality and experiential online shopping motives study has identified four main dimensions of online shopping quality. Among them are web site content / functionality; customer service; privacy / security; and experiential / atmospheric qualities. Referring to the literature review, the category "ease of shopping" is used to describe the convenience dimension like the shopping quality (Al-Qeisi *et al.* 2014). All of these factors are important for a description of the image that forms the customers during their first and later shopping on a particular web site. It shows that the broader perception of convenience as a concept comes through the customer's practical experience and leads to future acceptance or rejection of the particular web site.

The convenience also related to the accessibility that in the e-commerce context, refer to the "accessibility of website" (Al-Qeisi, K. *et al.,* 2014). The accessibility of a website is responsible for both the attraction of the new consumer and for the retention of the existing one. The study by Yu and Wu (Foxall, G. R. 2002) reveals that online shopping is related to modern consumers who have a demand for shopping convenience and speed.

The assortment like the other factor can help to attract the customers (Yun *et al.,* 2007; Lee *et al.,* 2000), but indeed as a motive, it is more important in the retention of the existing ones. It is because the new customers look not for the assortment but for the particular product, and if they find it only when they look at the assortment and evaluate it, that may become the motive for future shopping. The wide range of products and mixed assortment can influence shoppers to buy more (Yun *et al.,* 2007; Lee *et al.,* 2000; Lee *et al.,* 2014). That is the main reason why its importance is more significant in the process of the retention of the existing customer. Even more, research results by Lee and Kim (Blake *et al.,* 2003) implies that minimizing uncertainty or disutility is an essential circumstance for optimizing the assortment. Information search is considered as the most important stage in the buying process (Monsuwe *et al.,* 2004). Therefore, the sufficiency of information becomes the main criterion for the available information about particular products, especially identifying distinguishable features among similar products (Al-Qeisi *et al.* 2014). The latest technologies enable consumers to find relevant information to compare products in terms of technical parameters and prices online. For instance, recent empirical investigation argues that the website attributes like technical, general content, and appearance are essential for users (Yu e*t al.,* 2007).

Therefore, the core element, in this case, the formation of a core message about the product and especially its benefit for consumers. All of these benefits also help to form the customer motives needed for online shopping.

The discussed material and findings from the previous research have shown that most authors have studied the phenomenon of the online shopping from the perspective of marketing (Parsons, 2002; Rowley, 2000; Monsuwe *et al.,* 2004; Al-Debei *et al.* 2015). Some of them discussed this

phenomenon with a purpose to find general features that may lead to the improvement of the information technologies used for shop development (Yu *et al.,* 2007; Kaufman *et al.,* 2005). The economic aspects of the shopping experience have been studied more rarely by comparing to the mentioned ones, and the economic motives that may explain the shopping behaviours have not been studied with a purpose to classify them at all.

Methods and Design of the Research

In this paper, the explorative study findings are described. The three of four types of the latent variable model were used to grant the significance of the explorative research findings. They are in application order: factor analysis, latent profile analysis, and latent class analysis (Vaitkevicius, 2013). The possibility of use of the factor analysis, the latent profile analysis, and the latent class analysis with a small number of observations is already discussed in the scientific literature (Creswell, 2007).

Participants (the object)

Internet retail companies and their perception of economic demand formation motives in online shopping were investigated. The representatives from the top 10 retail companies operating online were invited to participate. Invitations were accepted by seven head managers representing the biggest internet retail companies (70 percent of the 10 top retailers). According to their experience in the investigated field, they were considered as experts. All participants are the founders or top managers in online shops. Their experience starts from 2 years and finishes with 17 years in online shopping. Because of the chosen topic, an important criterion for choosing the experts was the turnover and profit growth in the current period represented by them. All companies participating in the research have satisfied this requirement, so it was considered that experts are able to create supply, but also perceive demand emergence motives in consumer's thinking. The case of Lithuanian online shopping was studied.

Data Source and the Method of the Research

As the experts were busy entrepreneurs, so the test was carried out in their workplace. Obtaining the interview in the workplace was more important because it was expected that this would strengthen the sense of the content for the interviewee and in a critical moment, may become a contextual stimulus to them.

For this research, the questionnaire technique selected. The correspondent survey method in the presence of the researcher has been used. It was used to keep the attention of the interviewee, giving them additional motives such as a discussion on the interesting professional issue or a broader discussion on the question if they have found it relatively more important.

During all interview content and the time was controlled. It was needed to keep the interviewee's attention on the selected topic. The discussion with the interviewee was used for an in-depth description of the content, but strictly not as a tool for attitude formation. The questions like "could you explain your attitude" was used.

In order to be prepared for such situations like the possible interviewee-initiated theme change, before the interview, the researchers have discussed the possible scenarios on how not to distract the interviewee and gently to shift due to this time unasked or unanswered questions. Thus, she managed to avoid early termination of the interview, and not to get inattentive and superficial answers.

Table 1

Specification of Variables

Variables	Number
Latent variables extracted using factor analysis	*13 (39 primary variables used)*
Initial typological models (categorical variables) based on k-mean cluster analysis extracted using primary indicators and latent variables	3
Final typological model (categorical variable) extracted from categorical variables using k-mean cluster analysis	1

For this research, the questionnaire out of 112 questions was used. The questionnaire was specially designed for this research. Out of the total questions, the 39 as primary indicators are used for the extraction of latent variables. The next 14 primary indicators, together with 13 latent variables, have been used for the development of the categorical variables (see Table 1). All other questions were designed as the demographical and contextual variables (see Table 2) that were used for the description of the interviewee characteristics and for the description of the attractiveness of online shopping.

Table 2

The Structure of Questionnaire

Variables	Number of primary questions
Demographic questions defining an expert	4
Questions defining online shopping attractiveness	17
Questions defining the motives of shopping:	
Questions of growth interferences	15
Questions describing the causes that lead to a purchase	56 (28 each for existing or new customer)
Questions of growth incentives	20 (10 each for existing or new customer)
Total number of questions describing the motives of the online shopping	*91*
Total number of questions	**112**

The questions describing the causes of the purchase decision and the growth acceleration of online shops have been asked twice, once in the context of existing clients and second for the new clients. This was used as an indicator for the identification of the supply formation strategies in different segments (see Table 2). The analysis of the answers to these questions has led to the finding that the experts did not differentiate the online shopping motives of the existing and the new client. Therefore, for later modelling were used the questions for existing clients.

Two demographic questions were on an interval scale. Other questions were on a five-point Likert scales.

The research data were processed using SPSS 20.0 and Microsoft Excel 2010. The license holders are Kaunas University of Technology, Lithuania.

Table 3

Psychometric Statistics for Developed Latent Variables

Latent variables extracted based on factor and reliability analysis		Cronbach's Alpha	Extraction Sums of Squared Loadings	KMO Measure of Sampling Adequacy
			% of Variance	
1.	2.	3.	4.	5.
Q1	The problems in the process of shopping	0.94	78.342	0.759
	Lack of immediate communication	0.90	80.949	0.500
	Lack of information	0.94	84.996	0.717
Q2	Increasing in accessibility	0.87	65.987	0.684
	Security and information	0.88	73.795	0.730
	More convenient time and information of a client about the products	0.74	64.460	0.500
Q3	Functionality	0.81	71.043	0.808
	Reputation	0.91	72.477	0.639
	Shopping quality	0.35	39.225	0.500
	Ease of shopping	0.89	82.249	0.500
	Accessibility	0.71	54.675	0.500
	Assortment	0.84	73.000	0.500
	Sufficiency of information	0.82	69.170	0.500
Categorical variables developed based on k-mean cluster analysis using latent and primary variables (see fig. 1 and fig. 3)		Q1 - Demand inclination and growth interferences model		
		Q2 - Demand emergence stimulation model		
		Q3 - Demand growth acceleration and growth incentives model		

The questionnaire developed for this research using the method of Phenomenological Hermeneutics (Creswell, 2007). Most of the questions have been written based on the insights of different authors who analysed and commented on this phenomenon. In Table 3 and Table 4, the psychometric statistics for the questionnaire is presented.

Data presented in Table 3 shows that most of the Cronbach's Alpha values exceed the threshold of 0.70 except only one the 'shopping quality' (0.35). It consists of the two primary indicators, which factor score is 0.63 (see Table 4).

Inter-Item Correlations, Extraction Sums of Squared Loadings (see Table 3), and Corrected item-total Correlation (Table 4) also are high what together with Cronbach's Alpha shows, that latent variables are very homogenous according to the extent of their common content. The relatively high homogeneity of latent assertions shows the factor score, but in the case of it, it has been observed the higher abstraction rate for some variables (when the factor score was less than 0.70) which are included into latent variables: 'Functionality' and 'Increasing inaccessibility'. Because of this quality, their presence in the latent variables has been treated as a

feature, which only partially related to the content of the latent variable.

The primary variables, which factor score exceeded 0.70, interpreted as an essential feature describing the latent variable.

The Procedures and Methods of Data Analysis

The data analysis has been made in this order:

- At first, the contextual analysis of each question has been performed. During it, the answers to the questions have been compared to the comments from the discussion with the interviewee. This made it possible to identify how much and what information contains each question.

The cognition was grounded by the best praxis of Phenomenology as a research method borrowing from it an "epoche" (Creswell, 2007) and using it for extending the Phenomenological Hermeneutic System of Interpretation (Demeterio III, 2001).

The 'Encoding the real authorial intention using the Phenomenological Hermeneutic system' logical structure for the interpretation of the findings has been used (Vaitkevicius S. 2013). The hermeneutical model of the interpretation presented in Fig. 1 and represents the process of interpretation. This process has been used for the theoretical modelling of the statement true, which was needed for the development of theoretical economic demand formation (EDF) motives full model.

Table 4

Factor Score and Corrected Item-Total Correlation of Developed Latent Variables

Latent variables		Number of primary items	Factor score			Corrected Item-Total Correlation	
			Min	*Max.*	*>0.7*	*Min*	*Max.*
Q1	The problems in the process of shopping	5	0.76	0.99	5	0.95	0.75
	Lack of immediate communication	2	0.90	0.90	2	0.81	0.81
	Lack of information	3	0.81	0.99	3	0.80	0.93
Q2	Increasing in accessibility	4	0.66	0.90	3	0.65	0.81
	Security and information	3	0.78	0.92	3	0.74	0.82
	More convenient time and information of a client about the products	2	0.80	0.80	2	0.65	0.65
Q3	Functionality	5	0.50	0.94	4	0.48	0.84
	Reputation	5	0.71	0.97	5	0.68	0.92
	Shopping quality	2	0.63	0.63	0	0.39	0.39
	Ease of shopping	2	0.91	0.91	2	0.82	0.82
	Accessibility	2	0.74	0.74	2	0.55	0.55
	Assortment	2	0.85	0.85	2	0.73	0.73
	Sufficiency of information	2	0.83	0.83	2	0.69	0.69
Q1 - Demand inclination and growth interferences model							
Q2 - Demand emergence stimulation model							
Q3 - Demand growth acceleration and growth incentives model							

The model makes a methodological background for the future interpretation of the attitude using the method of exploratory factor analysis and for the future development of latent variables that later made possible modelling of attitudes typology using classification methods like k-mean clusters.
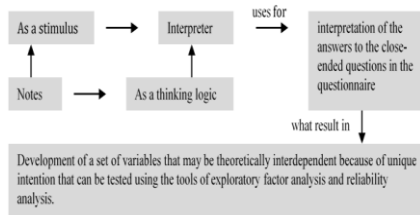

Figure 1. Encoding the Real Authorial Intention Using the Phenomenological Hermeneutic System

- Trying to reduce the number of primary items, the exploratory Factor analysis using the Alpha Factoring method and Varimax axis rotation has been performed. When theoretically meaningful structure of primary variables has been found, the obtained individual latent variables additionally has been tested using the Reliability analysis. This made it possible to assess the validity of the explored latent variable, and to measure the homogeneity of its content (see Table 3 and Table 4).

Since the latent variables were constructed based on the explorative research, therefore in order to ensure the ecological validity for result interpretation, the Phenomenological Hermeneutic analysis method has been used. Namely by the use of Phenomenological Hermeneutic analysis become possible to relate the expert attitude presented by the close-ended questions with its qualitative interpretation what eventually has led to the exploration of their true intention.

In this way, the Factor analysis made possible to identify the complex structure of included items, Reliability analysis made possible to describe the resolution of this structure, and the Phenomenological Hermeneutics made possible to describe the content uniqueness and specificity of this structure.

- Next, the typology of latent variables has been modelled using the k-mean cluster method by selecting the smallest meaningful number of groups. It was needed to develop the typology of the economic demand formation (EDF) motives in the Lithuanian e-commerce industry.

The typological modelling performed in two stages. The first was used for attribute structure consolidation at the categorical level. The k-mean cluster for this purpose has been used because of the heterogeneity of the contents of the latent variables the application of the Factor analysis at this level was impossible. The problem of the significance of the results has been resolved by transforming the latent variable values to the Z-scale. This made it possible not only to identify the possible demand formation types of online shopping but also to estimate the significance of the difference between these types (see Table 2 and Table 4).

The conventional statistical practice applied to the interpretation of the distance on the Z-scale. If the distance between the points of two clusters was equal or more than one standard deviation, it was interpreted that opinions differ significantly.

Three cluster models were developed. The first one, Demand inclination and growth interferences model (see Fig. 2), describes the factors that interfere with the demand formation. The two types of expert notions were extracted. One covers the notion of the three experts who think that the growth of online stores trade interferes with the complex effect of three latent variables: problems in the process of shopping, lack of information, and discrepancy in price and quality. The second type of the expert notion which covers the notion of the four experts are based on an attitude that the growth of online stores trade interferes the lack of immediate communication and the variables: lack of information and the problems in the process of shopping have no impact on the demand inclination.
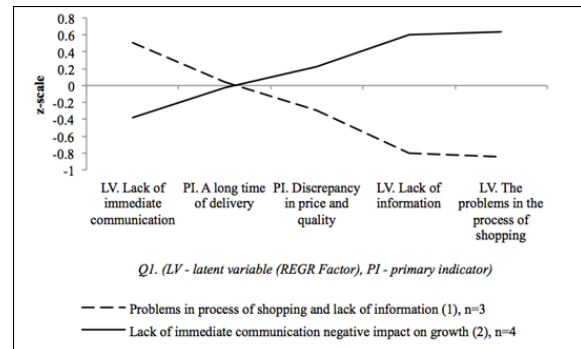

Figure 2. Demand Inclination and Growth Interferences Model

- The second Demand emergence stimulation model (see Fig. 3) experts have also diversified into two groups where first is based on four expert opinions that the accessibility, time, and information of the client about the product are critical to stimulating the demand formation. The other three experts identified the low price as a demand formation stimulation tool. Here should be noted that the low price, which is identified as an alternative for accessibility, time, and information of the client about the product, is critical for stimulation of the demand emergence. This implies that most successful online shopping leaders in Lithuania see two acceptable demand evolution scenarios: low price or accessibility and information.
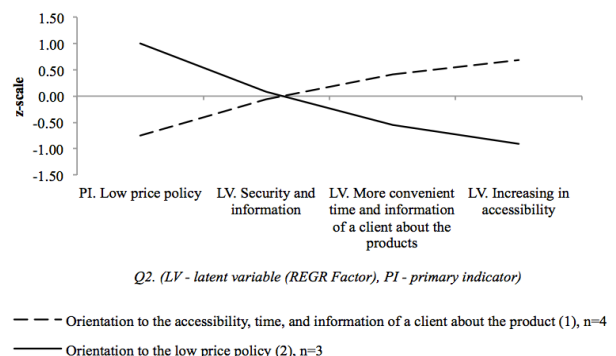

Figure 3. Model of Demand Emergence Stimulation

- The third one, the Demand growth acceleration and growth incentives model (two clusters), explored that some e-stores (n=5) are focused on the clients who look for the lower price (Price-oriented shopping) and others (n=2) offers for client Ease oriented shopping.

- Comparing the clusters depending to the demand emergence stimulation model and those that depend to the Demand growth acceleration (Figure 4) and growth incentives model were noticed that some of the experts see the price as a factor which stimulates the emergence of the demand based on the attraction of the new customers, while others see the price as a factor that accelerate the growth of the demand by exploiting the already existing customers.
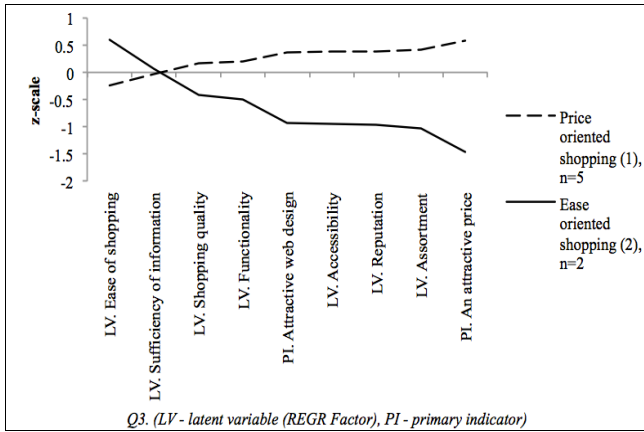

Figure 4. Demand Growth Acceleration and Growth Incentives Model

- At the last stage, the typological modelling using the Q1, Q2, and Q3 categorical variables were performed. The biggest explored and empirically possible group number was selected for this modelling. The main idea for this model to make a realistic-empirical model based on an expert evaluation, which would be the closest to the theoretical-mathematical model describing the idealistic model of the typology of the economic demand formation (EDF) motives in the online shopping industry.

As a result, five empirical types explored that meaningfully define the demand formation motives (see Table 5 and Table 6).

Ethics

All experts agreed to take part in this research freely. They have been informed that this research is scientific. As an additional motive was used, the researchers' agreement share the data that reflect their business difference and similarity in comparison to the overall findings.

Trying to protect personal positions of the experts, and not intact their companies' competitiveness, the research findings presented in a way to display as much correct typology of the experts' opinion, but would not allow identifying experts according to their or their business demographic characteristics.

Empirical findings

The research has led to the development of the Economic Demand Formation Model (EDFM), which is based on the distribution of six clusters across five key categories (see Table 5 and Table 6). Each category represents the alternative combination of the clusters based on the extracted Q1, Q2, and Q3 cluster models.

Categorical Structure of EDFM

The analysis of the survey data revealed that only five models out of possible eight have led to online shopping success in Lithuania. More than half of the experts have been using two out of five extracted models. These models are as follows: Deliberate, reasonable-price shopping model, and Fast, low-price shopping model. These models are similar to the Demand growth acceleration model, which means that they are for customer retention strategy and rely on the same factor - price-oriented shopping. The differences of these models are in the removal of interferences and in the attraction of the new customers.

In the Deliberate, reasonable-price shopping model the economic success is based on the clarity that comes from the presentation of the enough information needed for customer, and is based on the number of criteria's like the accessibility, time, and information of a client about the product which is used as an attraction motive for the new customers. The Fast, low-price shopping model from the previous differ by the use of immediate communication, and it remains on the low-price policy keeping it the main factor possible effectively attract the customers.

Table 5

Economic Demand Formation Model (EDFM)

Latent variables	Deliberate, reasonable-price shopping model, n=2	Clear and easy, lower-price shopping model, n=1	Fast, easy shopping model, n=1	Fast and informed, reasonable-price shopping model, n=1	Fast, low-price shopping model, n=2
	1	*2*	*3*	*4*	*5*
Q1. Demand inclination model - interferences of growth	Problems in process of shopping and lack of information, negative impact on growth (1), n=3	Problems in process of shopping and lack of information, negative impact on growth (1), n=3	Lack of immediate communication negative impact on growth (2), n=4	Lack of immediate communication negative impact on growth (2), n=4	Lack of immediate communication negative impact on growth (2), n=4
Q2. The model of demand emergence stimulation	Orientation to the accessibility, time, and information of a client about the product (1), n=4	Orientation to the low price policy (2), n=3	Orientation to the accessibility, time, and information of a client about the product (1), n=4	Orientation to the accessibility, time, and information of a client about the product (1), n=4	Orientation to the low price policy (2), n=3
Q3. Demand growth acceleration model - growth incentives	Price oriented shopping (1), n=5	Ease oriented shopping (2), n=2	Ease oriented shopping (2), n=2	Price oriented shopping (1), n=5	Price oriented shopping (1), n=5

Comparing of the other three models allowed to see that two of them: Fast, easy shopping model, and Fast and informed, reasonable-price shopping model are a more similar one to each other compared to the third one (Clear and easy, lower-price shopping model). The fast, easy shopping model, and Fast and informed, reasonable-price shopping model are similar to the removal of interferences and by the selected attraction of the new customer strategy. Both of them are oriented into the reduction of slowness that comes from the lack of immediate communication and results in demand incline, and both of them as a strategy for the attraction of new customers use the factors of accessibility, time, and information about a client. The Clear and easy, lower-price shopping model is similar by the removal of interferences to the Deliberate, reasonable-price shopping model; by the attraction of the new customers' strategy to the Fast, low-price shopping model; and by the retention strategy of existing customers to the Fast, easy shopping model. This model absolutely differs or is opposite to the Fast and informed, reasonable-price shopping model.

Hermeneutic system. This made it possible to connect the knowledge that comes from both the qualitative and quantitative part of the survey. Table 6 presents the result of this work and outlines the Typology of the economic demand formation (EDF) motives. The typology makes it possible to identify the meantime classification patterns of economic motives in terms of the applied strategy for interferences removal, the strategy for the attraction of the new customers, and the strategy for retention of existing customers.

The methods selected for this study allowed not only exploring the existing patterns but also enabled to explore that was not found across the researched population. The categories identifying these three patterns are presented in Table 7 and shows the patterns of economic motives that have not been found used as a key success factor for company success achievement between the Top sellers in the Lithuanian online shopping industry. This can mean that these models have not been enough economic and ideologically attractive for sellers as a way to develop business and strive for profit.

Table 6

Typology of the Economic Demand Formation (EDF) Motives, Final Model

Result	Model of economic motives				
	Deliberate, reasonable-price shopping model, n=2	Clear and easy, lower-price shopping model, n=1	Fast, easy shopping model, n=1	Fast and informed, reasonable-price shopping model, n=1	Fast, low-price shopping model, n=2
	1	2	3	4	5
The strategy for interferences removal (Demand inclination model)	Reduction the lack of clearness and fairness	Reduction the lack of clearness and fairness	Immediate communication	Immediate communication	Immediate communication
The strategy for attraction of the new customers' (Model of demand emergence stimulation)	Accessibility and information	Low price	Accessibility and information	Accessibility and information	Low price
The strategy for retention of existing customers (Demand growth acceleration model)	Price	Ease	Ease	Price	Price

(The leftmost stub column under the header span is labelled *Economic motives*.)

An Optimization of Categorical Structure for EDFM

In the Categorical structure of EDFM presented, findings were encoded using the Phenomenological

Table 7

Typology of the Economic Demand Formation (EDF) Motives, Unexplored Categories

Result	Model of economic motives		
	Clear and easy shopping model, n=0	Clear, lower-price shopping model, n=0	Cheap and simple shopping model, n=0
	1	2	3
The strategy for interferences removal (Demand inclination model)	Reduction the lack of clearness and fairness	Reduction the lack of clearness and fairness	Immediate communication
The strategy for attraction of the new customers' (Model of demand emergence stimulation)	Accessibility and information	Low price	Low price
The strategy for retention of existing customers (Demand growth acceleration model)	Ease	Price	Ease

(The leftmost stub column under the header span is labelled *Economic motives*.)

The study revealed the complete model of customer's economic motives perceived by managers and online-retail business developers and enabled identification of those that were exceptionally important for online-retail business development and success in the Lithuanian market.

Conclusions

For this explorative research, the qualitative methodology has been developed and verified. It was designed for the qualitative analysis of quantitative data and enabled the qualitative interpretation of the result on the level of behaviour pattern. It enabled the possibility to develop the typology of the economic demand formation

(EDF) motives. The typology is valid and represents the complete number of possible alternatives.

In total, the eight qualitative online shopping types representing the eight economic motives have been explored. They are: Deliberate, reasonable-price shopping model; Clear and easy, lower-price shopping model; Fast, easy shopping model; Fast and informed, reasonable-price shopping model; Fast, low-price shopping model; Clear and easy shopping model; Clear, lower-price shopping model; Cheap and simple shopping model.

In the study of the online shopping market, only five out of the possible eight economic motives have led to success. They are as following: Deliberate, reasonable-price shopping model; clear and easy, lower-price shopping model; fast, easy shopping model; fast and informed, reasonable-price shopping model; fast, low-price shopping model.

In the future, the findings of this study can be used for in-depth study and a wider classification of economic motives that emerge in online shopping.

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