

## Marketing Mix for E-commerce

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### ABSTRACT

The relevance of the analyzed issue is caused by the need to study the process of transformation of marketing in e-commerce, as the active involvement of business organizations in the field of e-business is often accompanied by problems of applying the usual marketing tools in a virtual environment. The article seeks to identify changes in the elements of the marketing mix in e-commerce in accordance with the trend of e-business and Internet technology. The leading approach to the study of this issue is the marketing model 7P, allowing structuring the changes in a complex of marketing tools with regard to trade and information services of online stores. The results of research were: to establish the determining role of technology and information support of consumers; to identify the areas of transformation of the marketing mix in e-commerce, demonstrating the significant influence of consumers on the content of 7P and personalize the supply of goods and services. The article may be useful for online stores in case of marketing strategy development, identification of the most important elements of 7P, assessment of marketing effectiveness and optimization of marketing costs.

### KEYWORDS

Customer behavior, digital economy, e-commerce, marketing mix

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## Introduction

In the real business life, professionals are faced with the necessity to change and significantly improve the traditional management methods and tools. And mainly it concerns marketing. The marketing methodology in the field of e-commerce - is a new and poorly known area. It is developing intuitively, at random and unsystematically.

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The authors analyze the theoretical and methodological work on marketing in e-business. K. Kelly (1999), D. Tapscott (1999), D. Chaffey (2007), I.D. Kotlyarov (2012) and other scientists note the trends of stable transformation of consumer behavior in the Internet environment. The process of changes in the forms and methods of business is also significant. This led to the realization that now almost no attention is paid to the conceptual foundations of the marketing component in e-commerce. This article is devoted to the study of transformation of the classic marketing mix, or the concept of “7P”, offered in 1981 by American scientists: B.H. Booms & M.J Bitner (1981) in the virtual environment of e-commerce. E-commerce, the base of which is the trade, is a unique kind of service activities and it remains virtually unexplored. These research results show strong growth in e-commerce, both on the world and the Russian markets. According to the agency's East-West Digital News data, the volume of e-commerce market in Russia reached 650 billion rubles in 2015. In ruble terms, the market grew by 16% compared to 2014, in dollar terms - fell by 28%. In 2015, the Russians made 160 million purchases on the domestic market; e-commerce is 10% more than the year before (Lopsulin, 2016). The authors set the goals and objectives, aimed at studying the key areas of transformation of the marketing mix, determining the leveling causes of some elements of the previously popular marketing complex and the changing nature of others.

The article includes a review of the main methods of research, systematization of received results, according to the elemental composition of the marketing mix, and received in the course of examining the inference problem.

### Methods

The research methodology is based on identifying causal transformations of applied marketing tools in the evolution of its basic concepts.

In the area of e-commerce the development of the marketing concept can be considered in two important aspects. The first aspect – is the development of the service component. E-commerce, as it has been mentioned earlier - is the sphere of commercial activity to provide online trading services. It is carried out in the special environment, which, on one side, has the features of the service environment, and on the other side - rejects these signs because it is virtual. Not material, technological and programmatic nature of the sales process, distanced communication (often more than hundreds or thousands kilometers) between a seller and a buyer, the inability to get to know the features of the goods in a real life - these are just some of the features inherent in the trading service in the Internet. The second aspect of the development of the marketing concept in e-commerce is due to the special role of the innovation component. In 1997 IBM identified e-business as the “transformation of key business processes using the Internet technologies”. Since then, e-business in general, and e-commerce in particular, being under the influence of various innovations have fundamentally changed not only the business processes but the entire economic environment in the new virtual space. Modern marketing is actively using the results of scientific discoveries in the field of information technology, mathematics, psychology, physics, chemistry, cybernetics, knowledge management. And it changes the practical marketing tools.

The first significant research of the service component of traditional marketing concept was published in the 70s of the 20th century. J. Rathmel (1974), P. Eiglier and E. Langeard (1976) models reflect the differences between the functional tasks of marketing in the manufacturing and non-manufacturing sectors, highlight the simultaneity of production and consumption of services, intangibility of services and the special role of the contact zone between the producer and consumer of these services. Ph. Kotler and G. Armstrong (2010) define a special role of the staff in the service sector, reflecting the new relationship in the triangular model of service marketing, including internal marketing and interactive marketing.

The concept of 7P by B.H. Booms (1981) and M.J. Bitner (1981) was the system marketing concept (1981). The classic marketing-model 4P (product, price, place, promotion) by J. McCarthy and E. Jerome (1964) has been extended by the authors to 7 P (+ process, people, physical evidence) mainly to develop the tools for improving the competitiveness of organizations in the service sector.

During the research work we have tried to combine the service and innovation as key factors of the transformation of the marketing concept and to examine in detail the concept how they affect each element of the extended marketing mix. To this end, we use the methods of observation, interviews, didactic generalizations, expert assessment, and we apply the technique of assessing the level of information support of consumers in e-commerce by four key elements of the marketing mix, which is based on the "importance - execution" model. The model is developed using the method of expert assessment (20 experts were interviewed in the field of domestic e-commerce). Ten factors are distributed over a mix of marketing tools (Table 2).

## Results and Discussions

### *Marketing mix in e-commerce. Product*

The essence of the "product" element in e-commerce corresponds partly to the essence of the traditional element concept. By creating additional opportunities for the development of electronic distribution channels, the virtual environment promotes production of commodities and consumer goods, which are to a greater or lesser extent in demand among online consumers.

Online goods and services can be divided into several types:

1. Information products, which can be demonstrated previously, such as audio and video goods.
2. Goods, the purchase of which is preceded by the gathering of a significant amount of information. These are cars, computers and household appliances. This group also includes goods with a low cost, and the customers of these goods study annotations and reviews, for example, books.
3. Goods and services delivered via the Internet channels: software, car rental services, hotel reservation services in hotels and sale of railway and air tickets, travel services.
4. Unique goods sold at electronic auctions or collectable shops.
5. Final consumption goods. When buying them the price plays a significant role (clothing, toys, household goods, etc.).
6. A separate group consists of food products.

The specifics of each product group define the complex of marketing activities. Nevertheless, it is possible to formulate the general strategies of the marketing development in e-business.

The characteristic feature of the range of electronic sellers is a possibility to develop the commodity groups of electronic products and services. These are special products that do not have a materialized form. The essential characteristics of such goods are to implement the "economic form" of information, i.e. the forms of its economic realization, exchange, assignment, use and consumption. Moreover, in e-commerce information services are an integral part of the trade services (e.g. consulting services), which is especially relevant in the electronic interaction environment - "seller-buyer", where there is a high proportion of consumer self-service processes.

A unique phenomenon of the development of e-commerce is an active distribution of goods - "virtual surrogates." In the domestic research environment this concept is examined by I.D. Kotlyarov (2012), stressing its functions and features:

- The man receives the symbol of meeting the needs instead of meeting these needs;

- The symbol of meeting the needs, as a rule, has no bindings to the real human achievements; the symbol is not able to raise the status in the real society; it does increase revenues;

- The virtual symbols are sold in the virtual environment (the Internet, mobile e-environment).

Types of goods - "virtual surrogates":

Attention goods - "products to demonstrate the attention." These products are not purchased by the consumer himself, but by his network. The consumer encourages other users to acquire (or to provide them, if they are free) them. The ability to trade of such surrogates is one of the tools to monetize social networks: these are statuses, upvotes, likes, gifts, and tokens.

Attention - services provided by specialized websites (most often by social services), they give the user an opportunity to receive tokens.

In addition, there is a wide variety of virtual information about the goods sold in the segments of entertainment, computer simulations (services of creation virtual reality with desired properties) and games (the purchase of a hero image, the purchase of weapons for the hero, and so on.).

The virtual environment promotes strengthening of conspicuous consumption phenomena, considered by T. Veblen (2011), J. Baudrillard (2001). In the context of the virtual space it is getting easier to achieve the illusion of meeting needs. We consider the level of social needs such as involvement, respect, self-fulfilling. First, the environment promotes it, and maintains the user's anonymity (operation of a fictional name, image and so forth.), distancing, and psychological security (if necessary, you can always leave the environment, for example by turning off the computer), freedom from direct persuasive factors. Second, the market is replete with a variety of information products that have value only in a virtual, often isolated environment. And the goods are in high demand among consumers.

Returning to the concept of "product" in the conventional sense, we have concluded that in e-commerce the consumer behavior is changing with respect to both traditional goods, which have a physical form, and to services. In the digital environment, while remaining "one-on-one" with the software interface or web-site, the user is isolated from direct exposure to the material environment and the direct urging emotional factors.

### **Price**

At first glance, the price of goods in e-commerce is formed according to the rules of classical price formation. The pricing strategy is based on three components: cost, customer value, and competitors. However, the experience of the world's leaders in e-commerce indicates the appearance of absolutely unique methods of flexible and personal pricing.

According to Internet Retailer, price-monitoring technology vendor Ugam recorded 9715 price changes of electronics, toys and household goods on Amazon.com during the holiday season from 24 November to 14 December (Rueter, 2014). The Amazon has established a record, surpassing the frequency-volatility of the prices of its competitors - such retail giants as Best Buy Co., Target Corp., Wal-Mart Stores Inc. and Toys 'R' Us Inc. According to the vice-president of marketing, the Amazon is able to change the price of the product up to 10 times per day, mainly for home appliances and to a lesser extent for clothing. Approximately the price of 20% of all online products is changing daily, and the price of the most running products is updated every few minutes, according to the vice-president of product and business development strategy in the price monitoring company Decide.com, which recently has been acquired by eBay Inc.

Thus, the price in e-business is highly dynamic and depends on market conditions and the pricing strategies can have an individual character for each user, and it is possible due to BigData technologies.

### **Place**

The selling development strategy in e-business is influenced by the specificity of the implemented product group. So, for information products the period of time and costs to fulfill the orders are small, for the goods in the physical performance the costs will depend on the shelf life of the product, the chosen method, the volume, the speed of delivery and the client must be informed about the conditions and the cost of delivery in advance.

The place of sale in e-commerce is a site or a marketplace in the social-network. The latter, being the primary point of the contact with the target audience, also performs the promotion functions. In today's business the place of sale may be a collective platform for a group or for many individual sellers, providing goods at fixed prices (aliexpress.com) or through an auction (ebay.com). An important feature of the place in this case is the maximum availability of sales channels for both buyers and sellers.

### **Promotion**

Promotion is distinguished by the greatest variety of tools and features in the electronic environment. The promotion activities allow consumers to be engaged in a communication process, and it can incite them to targeted actions

(approval, registration, download, purchase, recommendation). In addition, if the marketing campaign is successful, the dissemination of information about the company, the product, and the service becomes viral in nature, and it provides the coverage that can be comparable to leading media figures. The increased interest of the audience also contributes to the growth of commercial indicators (Yakhneeva & Podolyak, 2009).

Each of the promotion tools has been developed in the Network and includes diverse means:

1) Advertising includes display advertising, contextual advertising, social networks advertising, mobile advertising, and native advertising. According to the forecast of ZenithOptimedia (2015) in the next two years, the spending on Internet advertising will grow, and by 2017 its share in the total advertising investment will come closer to the share of the costs on television advertising and will be 32.3%, and the greatest growth is expected in the mobile advertising segment. With the increasing penetration of mobile Internet and the number of mobile users, the technology, marketing and advertising opportunities using smartphones and tablets are developing a lot.

2) In the personal selling the function of a seller or a consultant is gradually replaced by smart bots. E-commerce bots enable buying of different goods. Banking bots provide financial services. Watcher bots notify consumer when specific events happen (the flight is delayed, the car needs servicing).

3) Sales promotion includes social media call to action, e-mail marketing, web-conferences and webinars. The possibilities of social networks are widely used in order to increase the customer loyalty, to motivate them to participate in the actions of sales promotion, to disseminate the marketing information among their friends and acquaintances.

4) Public relations is carried out with the use of social media marketing, content marketing, referral marketing. The consumers acting "brand advocates" promote the formation of public relations, neutralize the negative opinion, and support the company's image among the target audience. According to the study of Nielsen (2015), in all age groups (generation Z, millennials, generation X, boomers, silent generation) the advertising format, causing the greatest confidence, is friends' recommendation. The electronic environment allows users to be engaged in a process of communication both with a brand, and also with all contact audiences, which attention the company is reaching.

5) The tool used to support promotion is a search engine marketing, which ensures a search engine indexing, a high position in the search results and an increase of organic traffic.

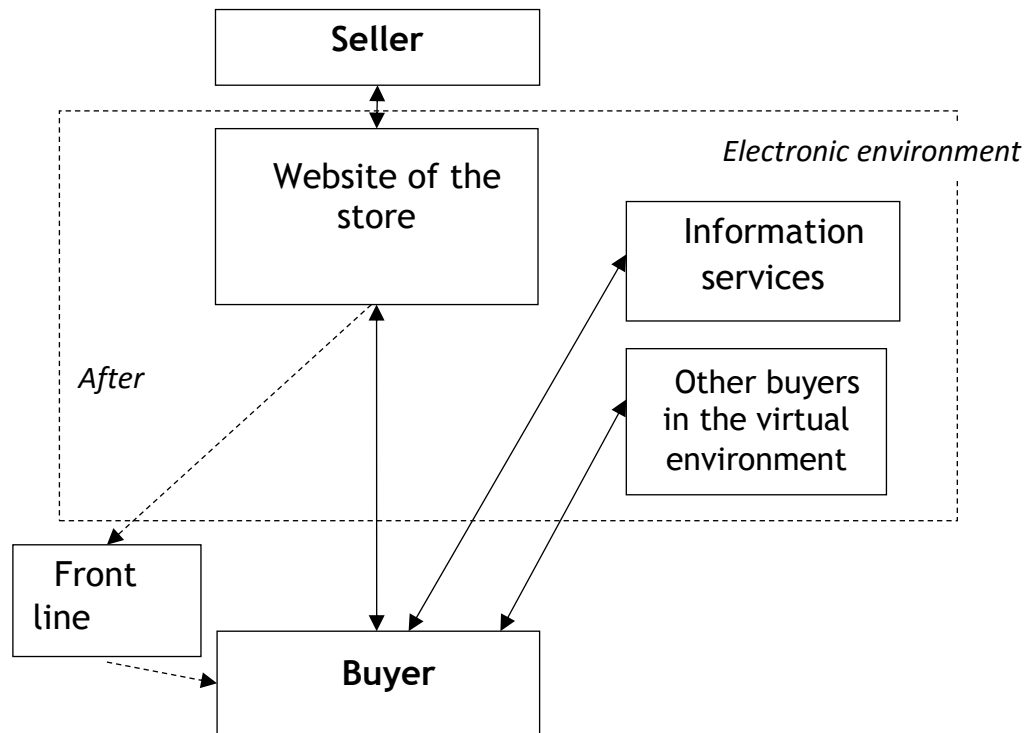
### ***People, Process, Physical Evidence***

This element is represented in the basic model mainly by personnel service organization, which operates in the contact zone. In the digital environment it is replaced by technology, which is implemented in the company's virtual representation of the interface (for example, the site of the e-shop), and by aligned service business processes. The human factor in the process of maintenance is reduced to zero. On the one hand, it may have a positive impact on the quality of service. The technology is based on algorithms, which are not characterized by excessive emotionality, fatigue and negligence, etc. On the other hand, the technology is limited in creativity; it does not have such

important human qualities that form the customer loyalty, as empathy, charisma and so on. And we should note that modern interfaces are not only intuitive, but they also include elements of artificial intelligence aimed at the formation of personalized interaction with the consumer. The degree of substitutability of a man working in the contact zone, with the technology, or the robot depends on many factors, and certainly it cannot be 100%. It is important to emphasize the special importance of people's participation as managers of business processes in e-commerce, in the "invisible" side of a virtual business.

Figure 1 shows the scheme of interaction "shop-buyer" in e-commerce.

The traditional commerce is characterized by direct interaction of the consumer with the personnel of the trade company directly in the contact zone. In addition to the personnel, the consumer's decision-making can be influenced by other consumers (this feature was marked for the first time in 1976 by professors of the University of Marseilles - P. Eiglier & E. Langeard (1976), for example, being in the store at the time of choosing the goods. The consumer assesses their appearance, behavior (expressed by the degree of satisfaction), their feedback and opinion. As it has been noted earlier, e-commerce is characterized by the absence of direct interaction of the consumer with the personnel of the trade company (at least until the time of a purchase). This communication takes place via the automated information system (AIS), via the interface of the store website or ETF (for B2B). The third parties may also affect the consumer decision to purchase goods. The degree of influence is much stronger.



**Figure 1.** The scheme of the interaction "seller-to-consumer" in e-commerce

Despite the fact that this influence seems to be indirect (because no one forces him) it often plays a decisive role. The form of such impact is information services provided directly by trade companies (ETF, e-shops), independent communities (non-profit organizations for the protection of consumer rights on the Internet, specialized portals, offering seller ratings, reports of "test purchases", groups in the social networks and etc.)

The physical evidence in e-business is divided into two components: the traditional physical and virtual. The physical environment is represented by delivery points, off-line shops and offices of the company, but the virtual environment gains a special significance in the electronic environment due to the accessibility and convenience of a purchase. To virtual environments the scientists include: a website and community pages in social networks, mobile applications.

### ***Personalization of marketing in e-commerce***

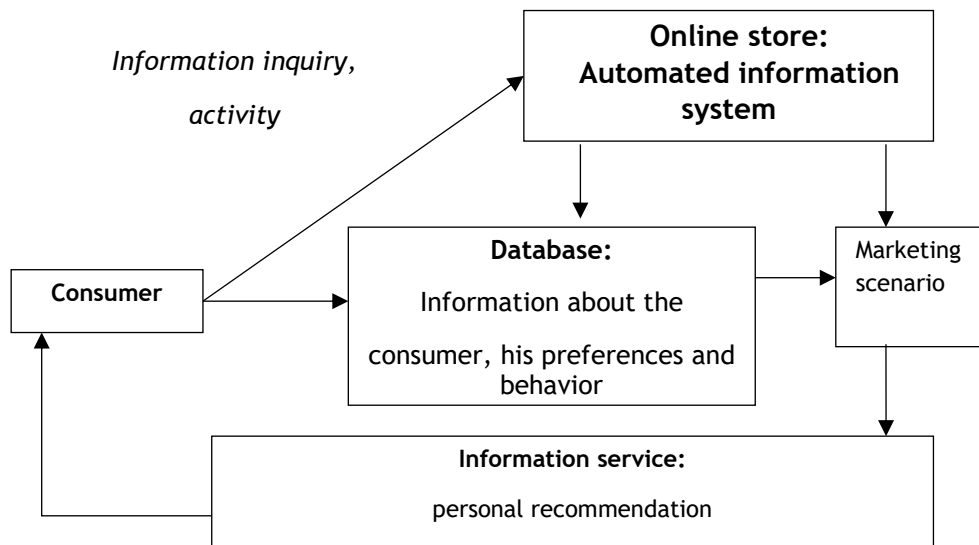
The desire to create a unique offer in terms of technological capabilities of companies and growing competition has identified a key trend in the development of marketing in e-commerce. That trend is personalization, or proposals for specific customers in accordance with the content, generate interest, activity in social networks, shopping history (Table 1).



**Table 1.** Information basis of offerings ascertainment in e-commerce

Stage	Information basis
Offerings ascertainment on the basis of information provided by the customer himself.	The customer himself fills the application form for registration in the online store. In the future, there could be surveys, questionnaires.
Formation of personal recommendations to the consumer on the analysis of his search queries	The automated collects and analyzes keywords, which the customer uses while finding the right products; it processes requests and generates suggestions for popular commodity groups, the commodities with relevant features.
Formation of proposals to expand the buyer's order on the basis of the recommended products.	The possibilities of pre-preceding stage are supported at this stage. The information about the history of orders, package contents of orders and the features of the set of products in one order of the buyer, an algorithm for determining the secondary, related products are also analyzed.
Formation of personal recommendations based on aggregate differential data from different sources.	Different data aggregate about the consumer and the consumer behavior: <ul style="list-style-type: none"> <li>- The order and purchase content;</li> <li>- The list of goods on the waiting list (wish-list);</li> <li>- The shopping time;</li> <li>- The buyer location;</li> </ul> The accumulation of data from various external sources about the consumer also takes place at this stage: the pages in social networks, preferences (likes), reviews, and so forth.

The realization algorithm of personalized offers in the online store is shown in Figure 2. The user himself sends the information about him to the online store. In addition, the automated information system of the seller accumulates data about the history of search queries, orders and other information about the user, and the features of his behavior in the database. On the basis of the special software mechanism (as a rule, know-how of the seller or the software vendor) the data is processed, and the possible type of the customer is determined in accordance with the existing classification (for example, ABC XYZ method is used in traditional commerce).



**Figure 2.** The scheme of the implementation of personalized proposals in the e-store (Agafonova, 2014)

Then the marketing scenario is assigned, corresponding to the type of the consumer and his behavior on the basis of which it is formed the information service – “personal recommendation” of the product. It is called the "advisory service" of the commercial enterprise. It may be noted that this service is based on the conceptual underpinnings of cognitive actively developing marketing in the electronic environment.

In K. Kalyanam and Sh. McIntyre (2002) work personalization is one of the elements of the e-marketing mix. The authors propose a model 4P's + P2C2S2, in which the additional elements are Personalization, Privacy, Customer Service, Community, Security, Site Design.

According to the results of this research, personalization involves the customization of the entire marketing mix, including product and pricing offer, sales channels and communication, taking into account the limitations of using the personal information about the consumer. Thereby, it is possible to allocate all items to 7P. So, Personalization and Privacy determine the capabilities and limitations in order to develop a customized offer of the online store, Customer Service and Security are the components of the process (Process), Community – is a part of Promotion, Site Design – is a part of Virtual Evidence.

It is believed that the personalized information service of the seller in the electronic environment can be a main factor to manipulate the consumer behavior. Indeed, the precisely shaped information aimed at meeting the individual needs of a particular individual can cause anxiety. The consumer doubts: “If the system is so well aware of the peculiarities of my perception and my expectations, whether it is manipulating my behavior”. These doubts can be resolved by alternative methods of research and assessment of the goods, so to speak “by hand”. Doubting the performance of advisory services, the consumer always has the opportunity to see the rating of goods, to assess the degree of

their popularity, ratings experts and buyers. Most of the main online stores are offering all kinds of services now among other in Russia.

Of course, the modern mechanisms to increase sales in retail include some elements of manipulation. The most common technologies are cross-selling, up-selling and down-selling, often interchangeable and complementary to each other (cross-selling) - is a sales technology of related products and services; up-selling (raising the amount of sale) - are receptions to purchase more expensive goods; down-selling (reduction of sales) - a buyer retention technique, in this case the buyer can refuse to purchase because of the high prices).

Online shops are using these technologies to the same extent as traditional shops. The marketplace is not interested in the appearance of doubt among consumers as the doubt causes the fear, as a result of which the company may lose a client. As it is known the cost of attracting a new customer is higher than the cost of the customer retention. It is advisable for traded companies to pay attention to the optimization of the assortment policy and the development of procurement logistics, rather than deposits significant investments in mechanisms to manipulate consumers.

The high degree of personalization of commercial offers, the degree of guessing the consumers' desires can have a negative side. I.D. Kotlyarov (2012) mentions "continuous contraction of the buyer's personal space". The development of the collection and processing information technologies, as well as the formation of a relevant proposal is based on the need to increase information about the consumer's behavior. Revealing the growing amount of information about them by the online store customers want to be assured of protection from the unauthorized access and transfer of data to third parties. In the near future, this factor will also be important in assessing the quality of every online store, and the formation of customer loyalty to the company as a whole. J.K. Lee and X. Lehto (2010) talk about "the need for people to a pay greater openness for greater serviceability".

### ***Information support of consumer decisions***

In the context of high level of entropy of the virtual environment the targeted structured information allows the consumer to make the right decision. As a rule, while analyzing the rational consumer behavior, the basis is a key constraint  $M$  – consumer income. A consumption bundle consists of available goods at this market (goods and services) -  $x = (x_1, \dots, x_n)$ . Then the space  $X$  - is a set of possible consumption bundles  $x$  with nonnegative coordinates:

$$X = \{x: x \geq 0\} \quad (1)$$

According to the theory of consumer choice, in the set  $X$  each user has his own preferences.

Preference relationships are in the form of the utility function whose values determine consumer satisfaction score at each point obtained from a given set of goods. Many consumption bundles, which can be acquired by the consumer, having income  $M$ , are called a budget set

$$B: B = \{x: px \leq M\}, \text{ where } p = (p_1, \dots, p_n) - \text{ a price vector} \quad (2)$$

Thus, the rational consumer behavior is focused on maximizing its utility function for a given budget constraint (9, 55):

$$\max u(x) = \max u(x) \quad (3)$$

In our case, the rationality of the consumer behavior is growing exponentially with an increase of the amount of information (with its guaranteed quality) on electronic markets. At the same time on the market with developed competition, you can select the types of information support for the choice of the goods by the buyer:

1. The emotional choice. Spontaneous, not deliberate. It is mostly done under time pressure and information (the deficiency can occur when the buyer does not have information about the product features, and takes place because of the extended shopping and so forth.). This choice is the most irrational; it is likely that the customer will be disappointed.

2. The logical choice. It is characterized by the balanced consumer behavior. It is done with the necessary amount of information available about this product; however, this information can be fragmented, not structured. The buyer is faced with the assessment of various features of goods, the need to collect and analyze large amounts of data.

3. The optimal choice of product. It complies with the highest degree of rational consumer behavior. The buyer has all necessary and sufficient information about the goods and their features, and the information is personalized (corresponds not only to individual needs, but potential buyers' perception).

In electronic markets, as well as traditional, the key constraint is the buyer's choice of budget constraint. However, taking into account a high importance of information about the delivery costs of goods to the customer (logistics costs), it should be considered as:

$$In = \{x: sx \leq M\}, \text{ where } c = (c_1, \dots, c_n) - \text{a vector of the total cost of goods (4)}$$

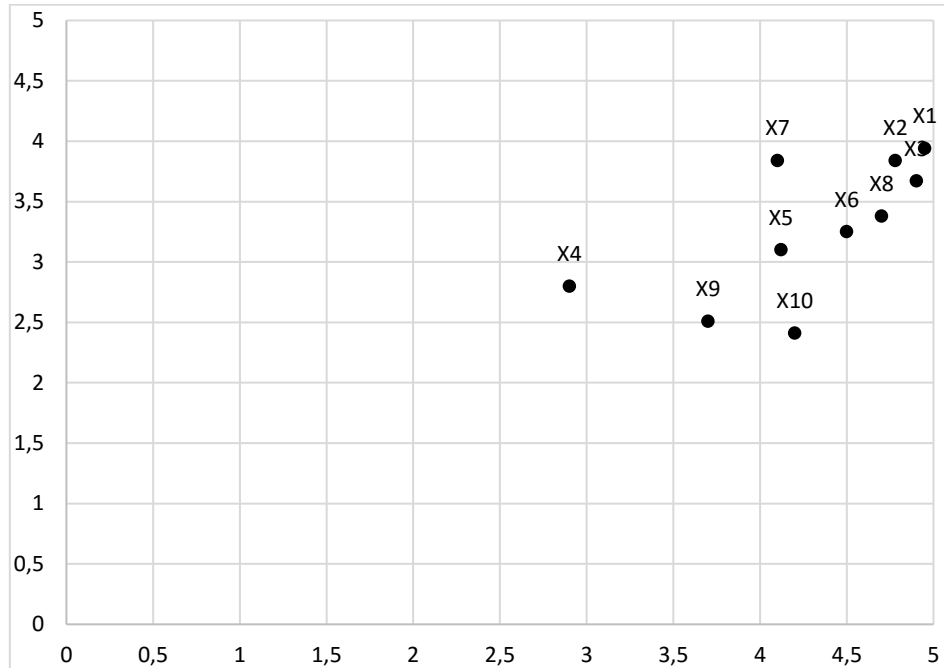
Moreover, the total value of the goods will be determined as  $C = P + L$ , where  $P$  - the price of goods,  $L$  - logistical costs of the buyer (usually delivery of the goods).

In the area of e-commerce, the optimization of consumer choice is advantageously carried out on the basis of tactical data consolidation and aggregation of information and shopping services. The integrated service allows you to create a visual picture of the data on the desired product offer for a specific buyer: a product description, advantages and disadvantages of the goods, assessment of suppliers' reliability, accurate delivery time and the costs of delivery of goods, the costs of goods with discounts; the total value of the buyer's order is calculated in advance, taking into account the additional services (packaging, shipping, customs clearance, insurance, etc.). Thus, providing customer value in e-commerce is a guarantee of customer satisfaction.

### ***Organization of information support of the marketing mix tools***

The research results of the quality of information support of consumers in e-commerce are presented in Figure 3. Comparing the quantitative assessment of the value factors of information support in order of importance and the level of performance (the assessment was carried out on Likert scale), the authors can conclude that the most unmet information needs are about products, information about updates; ratings of online stores; the comparative analysis of prices of goods by salesmen. The needs of buyers in product reviews are satisfied

sufficiently (this service is implemented by large online retailers and information aggregator-sites); information about product features.



**Figure 3.** The assessment of customer information support in e-commerce

The study also shows that if we take the direct information interaction between buyers and sellers as a basis, then today consumers believe that the most popular information services of e-shops are:

1. The product search based on specified criteria;
2. Comparing goods (a convenient form to match the features of similar products);
3. The cost calculation of commodity supply (a calculator of individual prices for goods and services);
4. Advisory services (individual offers of goods, including their precise features);
5. Product quality assessment based on feedback from customers;
6. Rankings of goods, services, producers, brands, etc.;
7. "Questions and answers" to the expert according to the categories of goods or to a store employee, to solve certain tasks (planning delivery, assembly, packaging, consolidation and so on.);
8. Free communication between regular customers (club members) of online stores, buyers.

The final characteristics of the transformation of the marketing mix elements in e-commerce, based on the results of the study (Table 2), allow identifying the basic principles of marketing in this sphere: the flexibility, availability, virtual presence, personalization.

**Table 2.** The assessment factors of information support of consumers in e-commerce in the context of the marketing mix elements

The element of the marketing mix	The factor	
	Index	Content
Product	X1	diversity of product offering on the market
	X2	characteristics, description of the product features
	X10	information about product updates
Price	X3	the comparative analysis of the prices of goods by salesmen
	X4	the temporal dynamics of commodity price changes
Place	X5	information about the methods and shipping costs
	X6	ratings of online stores
	X9	ratings of logistics intermediaries
Promotion	X7	customer reviews about products
	X8	information about sales, promotions, discounts

In order to identify the specifics of marketing mix in e-commerce, we study the peculiarities of Russian and foreign online stores based on the use of the traditional model 7P. However, the results of this study show that the model can be extended and refined. Thus, the model can be expanded by the eighth element - the performance and quality suggested by Ch.H. Lovelock & J. Wirtz (2007). In our opinion, each of the seven elements has an impact on the quality of trade and information services, and identification of such relationship is the subject of future research.

The focus of e-commerce on personalization of proposals and active use of technologies in the demonstration, sales and promotion is supported by studies of K. Kalyanam (2002) and Sh. McIntyre (2002), who expanded the content of the e-marketing mix with additional elements. However, this research shows that elements such as Customer Service, Site Design, Community are components of Process, Virtual Evidence and Promotion.

The practical significance of the study is to apply the results to the formation of the marketing strategy of the online store and to identify the most important elements of the marketing mix. The development of collecting and processing information system about the impact of marketing tools in order to determine the optimal marketing budget – is another practical opportunity for online retailers. At the same time the issues that require further study are: 1) to study the impact of the quality of information support of marketing in e-business on the level of customer satisfaction, on the one hand, the rate and degree of individualization of supply, on the other hand; 2) to assess the impact of the quality of services and information support of marketing on the level of e-business productivity; 3) to assess the impact of individual elements of the marketing mix on the final performance indicators.

## Conclusion

Summing up, the authors formulate the marketing mix especially in e-commerce by elements:

- Product includes production and end-used goods, delivered through traditional logistics channels; information products and information services delivered through Internet channels; trade and information services provided by online stores.

- Price is distinguished by a high degree of personalization, flexibility, and it depends on market conditions, the dynamic pricing policy.

- Place of sale is a set of interconnected virtual sales channels, including a website, a trading platform in the social network, a mobile application;

- Promotion includes a system of tools, including the display and paid search advertising, mobile advertising, social media marketing. The use of these tools aims to involve consumers in the process of communication and promotion to broadcast messages of the brand.

- Process represents the unity of the production and delivery of the complex commercial and information services on the basis of 100% automated business processes.

- People involves people movement from the contact zone into the invisible part of the business.

- Physical evidence is transformed into a virtual environment: a corporate website, a site or a group in a social network, a mobile application.

- Practical implementation of the marketing mix is an intelligent mechanism of personal recommendations of products, which has a direct impact on the increase in the productive performance of the commercial organization: the growth in sales and profits, consumer's encouraging commitment to a trading company. This is due to the fact that in applying the trading service recommendation, the buyer realizes that the company reacts to this request, and the response is individual (effect of personalization) and precise (quality of service).

### Disclosure statement

No potential conflict of interest was reported by the authors.

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