http://www.hippocampus.si/ISBN/978-961-6832-32-8/contents.pdf

# Marketing of Mass Customization: Emerging Markets for Modern Customer

Prof. dr Svetlana MIHIĆ
Assistant professor, svetlanamihic@gmail.com
Prof. dr Aleksandar ANDREJEVIĆ
Full professor, educons@gmail.com
MSc Milan MIHAJLOVIĆ
Assistant, mihamilan@gmail.com

#### Abstract:

Modern business environment is based on entirely new dimensions, where the spatial dimension is lost in importance and goes into the background. Mass customization enables companies from around the world via the Internet to participate in the competition and fight for every customer. The aim of this paper is to explore on-line shopping in Serbia, as well as the possibility that companies use mass customization. On the basis of these results the authors propose further steps for the implementation and development of this modern form of access to the consumer.

JEL: M21, M30, M31, M51

Key words: mass customization, marketing, on-line shopping

# **INTRODUCTION**

Mass customization derived from the model of open innovation, and today is a new trend in production and especially in the way of distribution of products. This approach today is gaining popularity due to the growing number of variants producing and increased opportunities for ecommerce. Competitiveness in the global marketplace requires companies to change the existing approaches in the production, which relied on "view seller, the approaches that will be facing the customer and his wishes.

Mass customization is the result of open innovations model and presents today a new trend of production, which composes productus/services according to customer wishes. This approach in present times is more and more popular due to increase of product variants and increased possibilities for e-commerce. Global market compentence requires from companies to change their approaches to production, which leaned on "view seller" into approaches which were conversed to the customer and its wishes. In order to retain its high competence at the market, companies make modeling of their products, which comprise individual customers wishes. This kind of business presents one of the most important industrial strategies today.

Traditional customization involves participation of consumers as co-designers in the process of creating products, not present new technologies. Tailor neck by the wishes of clients, or based

on their individual physical measures, the desired material, model, etc.. Development of IT sector has enabled the creation of such software, which support the process of creating products at the customer's wishes through the computer. With the module, customers can choose, these software composed the product the user intended. This form of mass customization called e-customization and implies that at least one of the three-dimension entities in the market, product and averages, is digital, Andreas M. Kaplan and (Micheal Haenlen 2006).

The most common examples of this approach could be seen in industry of shoes, clothes, watches, but also in industries of cars, bicycles, computers. In practice, the famous examples are companies of Dell, Nike, Adidas, Otabo Shoes, Vans Bivolino, U-Jeans, Land's End, Target, Tommy Hilfiger etc. As the best example of successful immplementation in practice, the company "Nike" could emphasised, which offers many options to customers as colour choice, personal marking, as well as various shoes designed for varius situations.

This workpaper aim is on-line purchase in Serbia development researching, emphasising customer interests to offer products designed by mass customization principle.

The research will be presented by a survey with the aim of quy factors identification considering customer motivation for on-line purchase of products designed according to customer wishes. All barriers which have to be avoided in order of new adequate conditions for this model of purchase popularization and way of retain the old and attract new customers, will be also the teme of this work. Besides, the survey contents questions important for customer preferences, i.e. selection between standard and adapted product, as well as correlation determination between customer choice of (standarized or customized) product/service and economical situation, age and education. In additon, the work determines group of products which are the most often adapted to individual specific needs and concludes the possible differences in customized groups of products/services risks considerig sex, economical situation and age.

## E markets in Serbia – emerging markets for modern customer

According to Republic Statistic Insitute of Serbia research, 33,2% household possess Internet connections, which is increase of 6,9% in relation to the year of 2007 and 14,7% to 2006. [3]. Using of Internet connections is the most in Belgrade and amounts 45,5%. In Vojvodina it amounts 34%, and in Central Serbia 27,2%. The responders mostly used Internet for: sending and receiving e-mail messages (79,9%), searching for information referring to goods and services (60,4%), service using referring to travel and accomodation (28.3%), Internet banking (10.4%). According to that research 86,3% of Internet users have never purchased/ordered goods or services on that way. Attained data show that there is still a small number of Internet connections in Serbian houshods, but trend of increasing is obvious. Internet users in Korisnici in Serbia moustly search for the goods and services, but on the other hand only 13.7% of them have bought something via Internet. Considering above mentioned, it could be conclded that Serbian market possess great non used market abilities referring to e-commerce.

Considering domestic companies in Serbia, which are connected to Internet, 68.9% of them possess Website, while this share in 2007 was 61,8%, and 52,9% for 2006. godinu. The greatest companies share of 69.8% use Website as chance of a product/service presentation, then 60.4% provide information about product characteristics and prices to prospective customers, while

55.8% offers adjusted Website to the regular visitors. However, only 19.5% of companies offer on-line service of offering i.e. booking of products and services, which arises from the fact that only 10.7% of companies enables on-line payment. In addition, research results show that 17% of companies, which possess Internet connection, were receiving orders by Internet during 2007, which was the increase of 0,2% in relation to 2006, and 8,7% in relation to 2005. The research show low awareness about Internet use importance for company business, which could be confirmed by data that even 62% of companies don't understand the way on which Internet could help in profit increase, new products/services development or working process simplification.

From above data it could be concluded that e-commerce in Serbia is still insufficiently developed, which presents market chance of companies of higher profits realizing. The basic reason of these results is noninformity of companies about business via Internet.

## Marketing of mass customization - hypotheses, results, research

Marketing of Mass customization involves complex economic exchange that is directly or indirectly, a partnership between companies, customers and non-profit organizations. In order to come to the realization of such a complex exchange, all three parties must recognize their advantage and add value to the exchange. That is achieve synergies and to make win-win situation for all participants and the exchange company. Objectives of research in this paper trying to determining the distribution of consumer choice (between standardized or individually customized) products / services and make sure there is a correlation between economic situation and age consumers with a choice between standard and customization products / services. Also, this paper identifying opportunities and threats for the development of mass market customization in Serbia. Used instrument is the questionnaire-survey made for research and the sample includes 50 subjects from territory of capital city.

#### Hypothesis:

- 1. The most common group of products /services, which are subject to customization to furniture, clothes, shoes, accessories (sunglasses, jewelry, etc..), motor vehicles and tourist services.
- 2. Most consumers still preferred products /services tailored to specific individual needs. There is a correlation between the categories of the economic situation, education and age with the category of consumer choice between standard products /services and customization.
- 3. Odds are mass customization of products /services to specific individual needs of customers, building long-term partner-relationship with the company, overcoming places time and distance. While the threat of mass customization lack of habit for this kind of purchase, difficult and hampered electronic payment distribution.

According with hypothesis and after data processing we get following results.

If you are observing the results obtained on the basis of frequencies can be concluded that from a total of 50 respondents, the majority, or 34 respondents, or 68%, preferred products and services tailored to their specific requirements individual, while 32% or 16 respondents prefer to choose standardized products. The results variable consumer choice between standard and

customized products / services, or that the correlation was not significant at any level of significance (Table 1. and 2.). The obtained results confirmed the hypothesis is that the selected categories match. It is assumed that the information now available to absolutely everyone, as such a basis that age does not coincide with the choice of consumers. Presumption of irrelevance categories of the economic situation and consumer choice may be partly explain the custom products that do not have to be expensive, and there is the possibility of adapting products and services to different income generation opportunities.

The research results obtained frequency show that most respondents opted to be co-designer of the production of furniture, clothes and accessories. Of the total 34 respondents, who would rather prefer a custom product, i.e. 32. 94.1% have opted for customization furniture confirms hypothesis that today consumers often opt for customization product / service. Results may explain the assumption that today puts emphasis on consumers as individuals, which emphasizes individual specific needs, and therefore the demand for their satisfaction, and often confused with the product or service. Further, the results show that variables economic situation and age were not associated with the Wardrobe is the following product groups for which decide 30 respondents, or 88.2%. To create a custom fashion accessories (sunglasses, watches, jewelry, etc..) Choosing the 22 respondents, i.e. 64.7% (Table 1). Assumption is that this group of products provide the highest level of satisfaction of specific individual needs. Or to co-design furniture, clothes and accessories offers the strongest individual stamp through the choice of colors, shapes, materials, etc.. Tourist services in the following categories chosen by 19 respondents, i.e. 55.8%. For food products, designed to individual requirements, choosing the 47% or 16 respondents. 15 respondents, i.e. 44.1%, chose custom catering services. Customization sports equipment and cars, motor bike and chose the 13 respondents, i.e. 38.2%. The smallest group of 12 respondents, or 35.2%, for customization techniques to their needs. Assumption is that through the technique can hardly satisfy the "emotional needs, usually satisfy the" commercial "purposes, i.e. needs a job.

TABLE 1. DISTRIBUTION OF VARIABLES FREQUENTLY CUSTOMIZATION PRODUCTS AND SERVICES

	Frequency	Frequency [%]	Total	Total[%]
clothing	30	88.2	34	100
furniture	32	94.1	34	100
sport equipment	13	38.2	34	100
car, motorcycle, bicycle	13	38.2	34	100
tourist services	19	55.8	34	100
cetering services	15	44.1	34	100
techniques	12	35.2	34	100
food products	16	47.0	34	100
accessories	22	64.7	34	100

Goal 3: Identifying opportunities and threats for the development of mass market customization

The results show (Table 2) that the majority of respondents considered the main threat to market development of products adapted to individual needs of the absence of habit (54%) for this kind of purchase, difficult electronic pay in Serbia (50%), and often deceptive and unfair offers (48%) and hampered distribution of products (46%). A smaller number of respondents considered that the development of mass culture barriers customization, while insignificant number of possible violation of the policy stands (12%) and consumer "knows what he wants" (8%). Given the political, economic and social situation in our country the past twenty years, the

results obtained are expected. Assumption is that consumers in Serbia hardly change old habits, i.e. Government distrust new trends such as mass customization. Also, respondents believe that they met the basic requirements for this type of business, such as electronic payment and efficient distribution of products.

TABLE 2. THREATS BUYING PRODUCTS OF CUSTOM INDIVIDUAL NEEDS

	Frequency	Frequency [%]	Total	Total [%]
lack of habit	27	54	50	100
difficult electronic payment	25	50	50	100
difficult distribution	23	46	50	100
possible distrume private	6	12	50	100
unfair offers and deceptive	24	48	50	100
customer "dont know what he wonts "	4	8	50	100
culture	17	34	50	100

The results show (Table 3) that the majority of respondents (66%) to overcome territorial and see time distance as a major opportunity for market development customization products /services. Then, many believe that the possibility of comparing different model from products (54%) and to adapt to individual needs (52%) also significant advantages of this form of business. While a small number (24%) as an opportunity to build long-term partner-relationship with the company's assumption that respondents want to buy products / services in remote areas which would save time, money and energy, and get the product / service that no longer meets their preferences. Under the assumption that consumers are not sufficiently confidential to the company explains the fact that only 24% of respondents see the development of partner-long-term relationship as one of the opportunities for the development of mass market customization.

TABLE 3. CHANCE S FOR THR PURCHASE OF PRODUCTS CUSTOM INDIVIDUAL NEEDS

	Frequency	Frequency[%]	Total	Total [%]
possibility of cumpering different vesions of products	27	54	50	100
customiyation to individual needs	26	52	50	100
partner-ship building long-term relationship with enterprise	12	24	50	100
overcome territorial and temporal diatance	33	66	50	100

# **Emerging markets for modern customer – new knowledge**

Results of research advantages and disadvantages of implementing the model of mass customization the domestic market primarily show that more consumers opt for custom products. Further results show that variable economic situation and age were not associated with variable consumer choice between standard and customized products / services. It is assumed that the information now available to absolutely everyone, as such a basis that age does not coincide with the choice of consumers. Custom products need not be expensive, and there is the possibility of

adapting products and services to different income generation opportunities. Further, most respondents opted to be co-designers in making furniture, clothes and accessories. Or that through the co-design of the product group provides the strongest individual stamp colors, shapes, materials, and so on. Also, most respondents considered the main threat to market development of products adapted to individual needs lack of habit for this kind of purchase, difficult electronic pay in Serbia, and often deceptive and unfair offers, and hampered distribution of products. Assumption is that consumers in Serbia hardly change old habits, i.e. distrust of the government to new trends such as mass customization. Also, respondents believe that they met the basic requirements for this type of business, such as electronic payment and efficient distribution of products. Finally, the results show that most respondents see overcome territorial and time distance as a major opportunity for market development customization products / services. Then, many believe that the possibility of comparing different variations products, and to adapt to individual needs, is also significant advantages of this form of business. It is considered that the respondents want to buy products / services in remote areas which would save time, money and energy, and get the product / service, which more than satisfies their preferences. Consumers are not sufficiently confidential to the companies, which explains the fact that only 24% of respondents see the development of partner-long-term relationship as one of the opportunities for the development of mass market customization.

The results show that one of the fundamental flaws of domestic companies poor communication with customers regarding the lack of long-term partner-relationships between companies and customers. Application of direct marketing, i.e. Marketing 1-1, could be one possible solution that would allow consumer confidence to companies on which to further build long-term-partnership, and loyalty. In order to increase market efficiency companies trying to create a unique relationship with every customer, which is possible with the application of marketing 1:1. Marketing orientation to individual buyers 1:1 in the modern business is becoming increasingly important. Development of information technology, especially computers and the Internet, enables manufacturers available with various information about customers. In this way, the manufacturer has significantly facilitated the creation of products, and the Internet has enabled the effective use of the business philosophy of individual marketing.

#### **CONCLUSION**

A customer today, as an individual, is a base of concurrent advantage, as well as way and degree of its specific needs and satisfactions. Such business requires a detailed recognition of the customer, which is only possible by the customer and company interaction and regular monitoring of their requirements. During the time, cooperation becomes stronger by loyal customers generating, who become the partners of the company at the same time. Mass customization implies that customers become partners of the companies, apropos co-designers of final product solutions, although a company with its possibilities limits the base product area. A new two-part model of business is creating; the first degree is company area, and the second customer area. Mass customization is headed by individual and in great part emotional requirements by which new values for the customer are created, actually emotional relationship of the customer and adjusted product and service. With such a business, a company decreases its business risk and makes satisfied customers, which is the source of concurrence and profit.

Researching referring to mass customization found its results in conclusions which were mostly expected. 68% of customers prefer adjusted product/service in relation to standardized. Attained results could be explained by superposition that today emphasis is put on the customer as individual. On that way individual specified need is propounded, as well as requirements for its satisfaction and often been identified with the product or service.

The adjusted products have not to be expensive for there is a possibility of products and services adjusting to the different income possibilities. Besides, most of the polled chose to be designers in furniture, wardrobe and fashion accessories production. Pursuant to that, co-designing of these product groups renders a possibility of the strongest individual stamp showing, considering colour, shape, material, etc.., and their assortment. Also, most of the polled believe that main threats for market development of the products adjusted to individual needs are: non existence of habits for such type of purchase, complicated electronic payment in Serbia, often frauds and non correct offers, as well as complicated product distribution. There is presupposition that customers in Serbia hardly change old habits and haven't trust into new trends as mass customization.

Besides, the pooled believe that base conditions for such way of business aren't accomplished, such as electronic payment and effective product distribution. Finally, research results show that the most polled see the overrun of territorial and time distances as the main chance of customized products/services market development. Then, a large number of them believe that possibilities of different variants of production comparison, as well as adjusting to individual needs, are also important advantages of this kind of business. It is evidently that pooled want to buy products/services from remote states in order to save time, money and energy and gain products/services which would better satisfy their preferences. The customers don't trust enough to the companies according to the data that only 24% of the pooled see foundation of long-term partnership relations as a chance for mass customization market development.

The results show that one of the base failures of the domestic companies is bad communication with the customers, i.e. long-term partnership relations non existence between a company and a customer. Direct marketing appliance, 1:1 marketing, could be one of the possible solutions which could enable the customer to build the trust towards companies which would be a base for further long term partnership relations foundation, as well as loyalty.

With the aim of marketing efficiency, the companies strive to create a unique relationship with each customer, which is possible through marketing 1:1 appliance. Marketing orientation towards individual customers 1:1 becomes one of the most important ways in the modern business. Information technology development, especially of computers and Internet, give possibility to producers to have access into information referring to customers. On that way, creating of products is much easier for producers. Likewise, Internet enables efficient usage of business philosophy of individual marketing.

By "one to one" marketing, instead of market participation struggle, a struggle of participation in each user budget particularly, is on.

## Acknowledgment

Researching results of advantages and disadvantages of mass customization implementation on domestic market show first of all that customers choose more adapted products. Furthermore,

the most part of polees chose to be co-designers at furniture making, clothes and fashion accessories. Besides, through co-designing of these groups of products an opportunity is provided of the strongest individual stamping by colour, form and material selection. Also, the most of polees beleive that main threats for market development of products adapted to individual needs are lack of habits for this kind of purchase, difficult electronical payment in Serbia, then often fraud and non correct offers, as well as difficult product distribution. There is a presupposition that customers in Serbia hardly change their habits, i.e. they are untrustfull towards new trends as mass customization. Also, the polees believe that base condition are not fullfilled for such kind of bussines, as electronical payment and efficient production distribution. The final, researching results show that majority of polees see overwhelming of territorial and time distances as an main opportunity for customized products/services market development. Then, a lot of them beleive that possibilities of compairing of different product variants, as well as adapting to individual needs are also important advantages of this kind of bussines. It is believed that polees want to purchase products/services from far away areas in order to save time, money and energy, and provide a product/service which satisfy their preferences more. The customers are not enough trustfull according to companies, which could be explained by data that only 24% polees see building of partnerships and long-term realtionships as one of opportunities for mass customization market development.

The results show that one of the basic faults of domestic companies is bad communication with customers, i.e. lack of long-terms partnerships between a company and a customer. By marketing approach "one to one" instead of the struggle for market participation, a struggle for participation in budget of each particular user happens. Let's hope that in the future ecustomization will overwhelm after all, providing its contribution to each citizen life quality improvement.

### REFERENCES

Brian Squire, Jeff Readman, Steve Brown, John Bessant; Mass customizatin: the key customer value? Taylor & Francis; Production Planning & Control; pp.431; No.4, June 2004.

Andreas M. Kaplan and Micheal Haenlen; Toward a Parsimoniouse Definition of Traditional and Electronic Mass Customization; Product Innovation Management; pp.178.; 2006.

Chesbrough H.W.; The era of open innovation. MIT Sloan Management Review, Vol.44, No.3, pp.35-41.; 2003; 35-41.

Chesbrough H.W. New puzzles and new findings. In Chesbrough H.W., Vanhaverbeke W. & West J. (Eds.). Open innovation: Researching a new paradigm. Oxford University Press, Oxford, pp.15-33.; 2006.

Jobber David, Fahy John; Osnovi marketinga; Drugo izdanje, Data Status; Beograd; 2006.

B.Joseph Pine II, Bart Victor and Andrew C. Boznton; Making Mass Customization Work; Hardvard Business Review; September- October, 1993.

Vanhaverbeke, W. and Cloodt, M; Open innovation in value networks. In: Chesbrough, H. W., Vanhaverbeke, W. and West, J. (Eds.). Open innovation: researching a new paradigm. Oxford: pp.258-28, 2006.

Philipp Herzog Open and Closed Innovation Different Cultures for different Strategies, GWV Fachverlage GmbH, Wiesbaden; pp.19-21; 2008,

http://www.openinnovation.eu