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TRADE PERSPECTIVES 2018

Contemporary aspects and role of international trade

PERSPEKTIVE TRGOVINE 2018.

Suvremeni aspekti i uloga međunarodne trgovine

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FOREWORD

This publication is a result of the international scientific conference “Trade Perspectives 2018” held at the Faculty of Economics and Business, University of Zagreb, Croatia. The conference has been taking place annually since 2010, and every year the focus is placed on the selected relevant topic from the area of trade. Therefore, this year, the conference is underlining the research of dynamics of the changes in international trade, together with its role in the development of the modern economy.

The topic of international trade is especially current due to the present strained relations among world’s greatest economies, whereas the implications of these relations concern all other countries. International trade represents a backbone of globalization that, in a way, influences all segments of life and business in any country. Adequately supported with development policies and appropriate infrastructure, international trading, as a rule, leads to economic growth, but also enables the establishment of certain flexibility of economy and quick adjustment in case of eventual economic shocks. Creation of agreeable conditions in business and liberalization of trading flows are key steps in stimulating economic growth. Supporting the development of international trade is as equally important for the country as for the private sector and represents a segment in which it is possible to achieve good results only by working together.

In line with that, the papers presented at the “Trade Perspectives 2018” conference were divided into four categories. Seven papers in the first category study the problematics of trade internationalization, while eight papers in the second group analyse the challenges of internationalization. It is without question that transporting technologies, i.e. the entire logistics, are crucial for the delivery of goods to the final consumer. Five papers in the “Transport and logistics” category deal with the ongoing issues in the area. In the last years, trade has been significantly changing under the influence of informatization and orienting more and more consumers towards buying via the Internet whose importance is constantly growing. The problematics of e-commerce is the topic of the five papers from the fourth group.

The organization of “Trade Perspectives 2018” conference and the issuing of this Publication have been supported by the Faculty of Economics and Business, University of Zagreb, the Croatian Chamber of Economy and the Ministry of Science and Education of the Republic of Croatia.

We would like to thank them for their financial and organizational support!

Zagreb, 28 November 2018

Editors

Tomislav Baković, PhD

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PREDGOVOR

Ova publikacija nastala je kao rezultat međunarodne znanstvene Konferencije “Perspektive trgovine 2018” koja se održala na Ekonomskom fakultetu Sveučilišta u Zagrebu, Hrvatska. Konferencija se kontinuirano održava jednom godišnje od 2010. godine, a svake godine fokus stavlja na izabranu relevantnu temu iz područja trgovine. Tako ovogodišnja Konferencija naglasak stavlja na istraživanje dinamike promjena u međunarodnoj trgovini zajedno s njezinom ulogom u razvoju modernog gospodarstva.

Tema međunarodne trgovine posebno je aktualna i zbog trenutnih zaoštrenih odnosa među najvećim svjetskim gospodarstvima pri čemu se implikacije tih odnosa tiču i svih ostalih država. Međunarodna trgovina predstavlja okosnicu procesa globalizacije koji na neki način utječe na sve segmente života i poslovanja u bilo kojoj državi. Adekvatno podupirana razvojnim politikama i odgovarajućom infrastrukturom, međunarodna trgovina u pravilu vodi ekonomskom rastu, ali omogućuje i uspostavu dovoljne fleksibilnosti gospodarstva kao i brzu prilagodbu u slučaju eventualnih ekonomskih šokova. Kreiranje povoljnijih uvjeta poslovanja te liberalizacija trgovinskih tokova ključan su korak u stimuliranju gospodarskog rasta. Podupiranje razvoja međunarodne trgovine od jednake je važnosti za državu kao i za privatni sektor te predstavlja segment u kojemu je tek zajedničkim radom moguće ostvariti prave rezultate.

Sukladno tome, radovi na Konferenciji Perspektive trgovine 2018 podijeljeni su u četiri kategorije. Sedam radova u prvoj kategoriji proučava problematiku internacionalizacije trgovine dok osam radova iz druge skupine analizira izazove internacionalizacije. Neupitno je kako su transportne tehnologije, odnosno cjelokupna logistika, ključni za dostavu robe krajnjem korisniku. Pet radova u kategoriji ‘Transport i logistika’ bavi se aktualnim problemima navedenog područja. Posljednjih godina trgovina se bitno mijenja pod utjecajem informatizacije te orijentiranja sve većeg broja potrošača kupnji putem Interneta, a čija važnost raste iz dana u dan. Problematiku e-trgovine proučava pet radova svrstanih u četvrtu skupinu.

Organizaciju Konferencije “Perspektive trgovine 2018” te izdavanje ovog Zbornika podržali su Ekonomski fakultet Sveučilišta u Zagrebu, Hrvatska gospodarska komora i Ministarstvo znanosti i obrazovanja Republike Hrvatske.

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Zagreb, 28. studenog 2018.

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TRADE INTERNATIONALIZATION

COOPERATION CRITERIA: HOW RETAIL MANAGERS EVALUATE RELATIONSHIPS IN MARKETING CHANNEL

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Abstract

Empirical research in Serbian marketing channels on the participants' satisfaction has shown that retailers' managers are somewhat more critical than the average. They assessed the activities of other participants in marketing channels by evaluating three sets of criteria (21 dimensions): a) Product and price criteria b) Criteria relating to sales and logistics and c) Criteria of cooperation. The survey found that "smaller" retailers are less satisfied with their relations with other business partners than "bigger" retailers. Also, "smaller" retailers are more in line with their ratings than their larger competitors. The growing negotiating power of large chains leads to a reduction in their purchasing prices, but on the other hand, it initiates manufacturers to raise prices for small retailers to make up for the difference. Retailers consider the price criteria are extremely important, whether it be on the purchasing price or payment deadlines, while very low evaluate readiness for joint action (price cuts). Out of logistical criteria, retailers attach great importance to the delivery deadlines, the continuity of delivery, and especially the willingness of the supplier to resolve complaints and returns of goods. Retailers in Serbia, according to the results of this survey, are not considering as significant, joint planning activity with suppliers or IT support by partners.

Key words: Retail, Relationships, Marketing Channel, Cooperation

1. INTRODUCTION AND LITERATURE REVIEW

Relationships in marketing channels are very complex and influenced with numerous changes in modern economy. For example, traditionally, retailers as the intermediaries in the marketing channels charged gross margin as difference between buying and selling price and used it to cover operating cost and make some profit. In modern marketing channels, retailers actively generate requirements to the suppliers for some additional charges as the pre-condition to place their product in oversupplied shelves. Sometimes, retailers charge for some better place on the shelves, sometimes for some secondary positions, sometimes for more facings (slotting fees) and sometimes, even

for standard placing (listing fee). Promotional activities in retail stores are more and more developed. Consequently, new sources of income for retailers appear to increase in importance, hence being identified in literature as the “back margin”, as different fees that retailer charge suppliers, besides traditional gross margin, called also, front margin (Colla and Dupuis, 2002).

Changes are present in the other segments of relationship between suppliers and retailers. One of the most important areas, are terms of payment. A deferred payment period allows retailers to get into the possession of goods and to place them on the market even before they have settled all of their obligations to the supplier. Retailers look for different ways to manage their cash cycle. They use deferred payment to the supplier but also quick debt collection from their customers so to hire as little as possible of their own funds to finance the business cycle. Sometimes retailers manage even to get out of the cycle “extract” certain funds to finance other business obligations. Optimizing its cash cycle, retailers are striving to better manage stocks, accelerate billing from their customers, or extend payment terms to their suppliers (Ivanišević, 2009).

Retailers in the Republic of Serbia are very dependent on this source of financing. In his doctoral dissertation, Pešić found that in the period from 2009 to 2012, the largest Serbian FMCG retailers, on average, financed their businesses partially from 26.89 to 49.50 days, which represented a negative difference between the average payment to the supplier and collection from own customers. Retailers in Serbia are no exception. This is evidenced by the study by the PWC consulting firm that found that in Europe, the food retail sector still finances the business cycle at the supplier's expense (PWC, 2014).

One of the frequently tested interdependencies is the relationship between customer satisfaction and loyalty. More recently, customer loyalty, as a mixture of behavioural and component-based components, changes with the retention component, which is a completely behavioural phenomenon (Hennig-Thurau, Klee, 1997). The strength of the corporate brand is largely related to customer satisfaction, and it is a logical expectation that a satisfied customer in the store (who is also satisfied with the brand of purchased products) repeats purchases with the same retailer. Numerous research has shown a link between the corporate brand and customer loyalty (Romaniuk and Sharp, 1999).

Corporate branding is a good basis for long-term relationships with satisfied customers, and it can also be assumed to support relationship with business partners. Wholesalers and retailers expect a well-known brand of manufacturers to act according to the thermodynamics law and, as a warmer body transfers a portion of its heat to a cooler body, and a well-known brand on the store shelves, transfers a portion of its reputation to the image of the retail store (Jacoby, Mazursky, 1984). There is also a reverse influence. Retailers are making great efforts to build the image and confidence of customers in their stores. That's why they are very cautious about the unknown brands that will be able to get their image in the famous shops, but they could endanger and damage the image of a retailer if they could be of poor quality. The reputation issue becomes a

criterion of importance for the development of relationships that must be thoroughly evaluated.

For some time in the literature, it is stated that customers have a “natural preference” to give up choices and connect with a seller in the long run (Sheth and Parvatiyar, 1995) because they perceive that they achieve greater effectiveness and efficiency. Hamel and Prahalad pointed out that core competence must be in focus in order to improve permanently and be faster than competitors (Hamel and Prahalad, 1996) paving the way to increase of outsourcing concept. However, this increased dependence on business partners.

The expected effect of focus on core competences is the decline in operating costs due to productivity growth and the focus of resources on what the enterprise is doing best (Swaminathan and Moorman, 2009). Specialists provide greater efficiency, and based on their specific capacities, the advantages of aggregated demand and internal flexibility (Lorenz, 1988). This approach to business significantly changes the habits in marketing channels. The lowest transaction costs are no longer enough to be purchased from some suppliers. Paradoxically, even the minimum purchase price does not guarantee the lowest transaction costs given the ever more complex and long-lasting negotiations that increase the cost of contracting, making the current low purchase prices irrelevant (Gulati, 1999). Looking for partners in the long run, raise the importance of satisfaction with their partners. It is, also, the reason why the researches of satisfaction in the marketing channel become more and more important.

2. METHODOLOGY OF FIELD RESEARCH

2.1. Survey

The choice of the survey method is one of the key decisions during the survey. The classic survey method involves a printed questionnaire (PAPI - Paper and Pencil Interview). As alternative forms of interviewing, the literature often lists CATI (Computer Aided Telephone Interview) and CAPI (Computer Aided Personal Interview). The first CAPI survey, using laptops that suggest a question to the interviewer and allowing direct input of the response to the application while the interviewer is face to face with the respondent, occurred in 1987 in the Netherlands (Caeyers, et.al., 2010). In the aforementioned study, under the umbrella of the World Bank, it was determined by empirical evidence that computer-aided surveying reduces errors in data entry and represents a superior survey technique. However, several reasons were important to choose traditional PAPI method: managers who usually do not have time to fill, to wait or to give interview in one place; existence of psychological barrier against devices (recording); and also in some cases, there was desire of respondents to take survey, think about it and send it back to interviewer.

Survey form consisted of general data about company and respondent, and three batteries of statements. The first battery (7 statements) relates to products that are traded and prices. These elements form so-called “product package” (Lovreta and Petković,

2010) and could be considered as the core elements of marketing mix. The second battery (7) are statements on selling activities, logistics and general aspects of cooperation. The third group of statements (8) is customized to the type of respondent and in this case those are retail companies. This part of survey deals with shopper marketing activities and different barriers to cooperation (liquidity, etc.). Besides these, in this article used questions, survey form had separate sections dealing with trends in marketing channels, sources of conflict and some special questions like private label and category management.

2.2. Sample

In this research, a two-stratified stratified sample was used. In the first step, business entities of a particular type were generated (wholesalers, retailers or manufacturers). In the second step, the planned correction of the sample was completed by including the criteria for the size of the company. When conducting the survey, it is taken into account that there is a sufficient number of “small” and “large” economic entities in the sample. All those who by law fall into large and medium-sized enterprises are classified into “big” enterprises. These two groups of companies are connected to the suggestion of participants in group discussions (focus groups), and also to get a sufficient number of companies for valid statistical processing. In fact, focus group participants suggested that members of these two subgroups behave in an identical way. The other group includes all other small and micro-entities.

It was planned to interview at least 70 respondents in each group. This goal was achieved in partnership and active support of the Serbian Chamber of Commerce. So, the structure of surveyed sample of companies is as follows:

- A total of 76 wholesalers were surveyed, accounting for 32.1% of the total number of surveyed companies in the sample. In the structure of surveyed wholesalers, “small” entities dominate with a total of 78.1%, while large entities account for 21.9%. Similar to the retail sector, “small” wholesalers are significantly more numerous than large and medium-sized wholesalers together, which is also the largest group of companies in Serbia. However, it should be noted that their importance decreases from year to year.
- A total of 87 retailers were surveyed, accounting for 36.7% of the total number of surveyed businesses. In the structure of surveyed retailers, the “small” entities are again dominant with a total of 72.8%, while large entities account for 27.2%. Such a structure is logical, since “small” entities are far easier to be established and it is natural for many retailers to serve small market segments. However, it is very important that the answers from the leading companies in our market are obtained.
- A total of 74 producers were surveyed, accounting for 31.2% of the total number of surveyed companies. In the structure of the surveyed producers, there are slightly more “small” entities that participate with a total of 56.8%, while the

“large” entities are 43.2%. In the case of producers, the participation of “large” entities is significantly higher than for retailers and wholesalers in this sample, as well as in the structure of the whole sector.

2.3. Methods of data analysis

In this analysis, specific method of satisfaction index development was deployed. Index is constructed as a complex indicator, calculated on the base of principal component analysis, applied on 22 above listed variables. Extracted principal components were ranked and method of weighting was used, in order to give right importance to each new component. In that way, new synthetic variables were constructed, so that can explain major part of the variance. In the same time, during this weighting process, impact of minor variables was decreased, corresponding to their small contribution to the explanation of total variance. In this case, new components that mainly contribute to the satisfaction in marketing channels were pointed out, while variables with small contribution to understanding of this satisfaction were minimized. Thus, it can be said that so constructed indices show achieved level of satisfaction in marketing channels based on the “purified” structure of principal components. The values of the indices are on the scale from 1 to 10, where 10 denotes maximum level of the satisfaction.

Furthermore, the satisfaction index is complex and composed of several sub-indices. In the following table, the satisfaction index is shown as a hierarchically decomposed index. The most complex is the composite level of satisfaction that aggregates the views of all market participants. In the next iteration, special indices are calculated showing how satisfied the producers, wholesalers and retailers, each of them, with the other two sides in marketing channels. In this paper, only the satisfaction indices of the retail managers were presented. In the final step, each group is divided into “smaller” and “big” companies, so that again their relationship to the other two sides in the marketing channels can be observed.

Descriptive statistics was used in the process of analysis and explanation of the indices that were calculated. Many differences could be better understood using responses on single question, and also comparing average marks given by managers.

3. RESULTS OF THE STUDY

3.1. General index of satisfaction

Following the procedure described before, composite index of satisfaction in Serbian marketing channels was developed. In the table that follows, only the results related to the managers of retail enterprises are presented.

Table 1. Satisfaction index – Managers of retail companies

“smaller” Retailers vs. “smaller” Manufacturers	5.32	→	“smaller” Retailers vs. Manufacturers	5.37	→	Retailers vs. Manufacturers	5.59
“smaller” Retailers vs. “bigger” Manufacturers	5.42						
“smaller” Retailers vs. “smaller” Wholesalers	5.53		“smaller” Retailers vs. Wholesalers	5.46	↘		
“smaller” Retailers vs. “bigger” Wholesalers	5.39						
“bigger” Retailers vs. “smaller” Manufacturers	5.95		“bigger” Retailers vs. Manufacturers	5.80	↗	Retailers vs. Wholesalers	5.51
“bigger” Retailers vs. “bigger” Manufacturers	5.65						
“bigger” Retailers vs. “smaller” Wholesalers	5.35		“bigger” Retailers vs. Wholesalers	5.55	→		
“bigger” Retailers vs. “bigger” Wholesalers	5.75						
						COMPOSITE SATISFACTION INDEX	5.67

Source: Petković et al., 2017, p. 37.

Since the sample of respondents in this study was planned and balanced in three strata with approximately equal number of respondents (enterprises), it is possible to use simple arithmetic meanings of basic satisfaction indexes and create different variants of more complex indexes. At this point, it is interesting to calculate the index showing satisfaction of retail managers with their cooperation with “smaller” wholesalers at the level of 5.44, which represents a rather low level of satisfaction. Large retail chains are least satisfied with their cooperation with “smaller” wholesalers (5.35), which is already shown in the summary table of the satisfaction index. However, further analysis of the indices would require more space, to explain in detail percenteges of variance explained and communalities that were used for the indeces konstruktion.

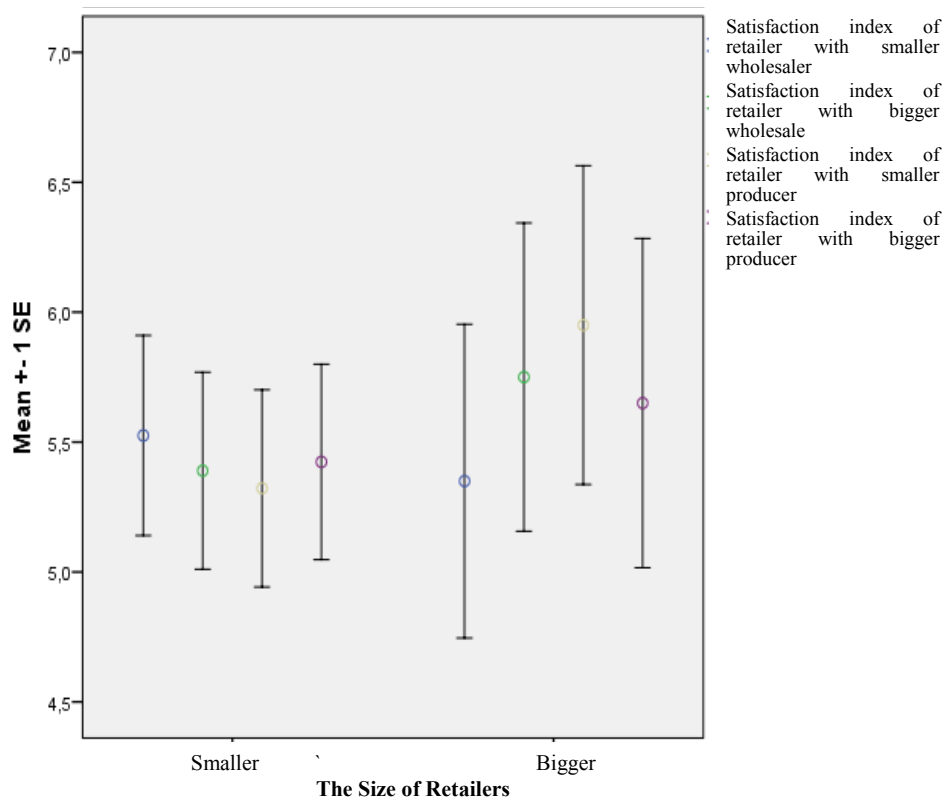
3.2. *Small and big members of the marketing channel*

In the following chart, retail satisfaction indices are shown describing their cooperation with “smaller” and “larger” wholesalers and producers. In the first (left) part of the chart are the estimates of managers of “smaller” retailers, and in the second (right) part of the chart there are estimates of managers of “larger” retailers.

The central point on the vertical lines represents the satisfaction index value on a scale from 1 to 10. This central value is reduced and increased by the standard error of the sample. The displayed ranges indicate the accuracy with which the sample of

the selected enterprises represents the total population of the observed enterprises in the Serbian economy. Charts of this type facilitate the comparison of different groups of companies and better understanding of the respondents' compliance with the average ratings.

Figure 1. Satisfaction Indices: Means and standard errors of sample



Source: Petković et al., 2017, p. 40.

From the figure 1 it can be noted that “smaller” retailers are less satisfied with their relationships with other business partners. Also, “smaller” retailers are more in line with their ratings than their larger competitors.

This phenomenon can be attributed to the so-called “waterbed effect” that illustrates the movement in one part of the market under pressure from the force in the other part of the market. In particular, the growing negotiating power of the major chains that leads to a reduction in their purchasing prices induces manufacturers to raise prices for small retailers to make up for the difference. Small retailers thus come in an even more inferior position and become even more non-competitive and vulnerable in the market. In particular, according to research results in Germany, the negotiating power of large retailers is growing with the introduction of products under their own brand, as well as

the orientation towards customers who buy everything in one place (one stop shop) and are less sensitive to the (manufacturing) brand (Haucap et al., 2013).

3.3. Components of satisfaction in Serbian marketing channels

According to the results of this research, retailers greatly attach importance to price factors, whether it is a purchase price, terms of payment and other price factors. In this group, they least value the readiness for joint actions, which means in other words, the willingness of the supplier to bear part of the price reduction, although this aspect is by no means assessed as minor.

Out of logistical criteria, retailers attach great importance to the delivery deadlines, the continuity of delivery, and especially the readiness of the supplier to resolve complaints and to allow the return of non-sold goods. Such responses indicate that retailers still deal with elementary operational problems. That kind of attitude leaves a little room for solving strategic issues. This is also evident from the answers to the other groups of questions.

Retailers in Serbia, according to the results of this research, do not attach great importance to joint planning with suppliers as well as IT support from partners. Such attitudes point attention to a lack of long-term orientation, indicate an insufficient sophistication and the need to take chance to use such a great opportunity for the further development of the retail sector.

In the continuation of this paper, the individual analysis of each survey question that took part in the construction of the satisfaction index is following. Satisfaction indices, as shown, measure the satisfaction at different levels of the marketing channel. From the outset, it is useful to know that each questionnaire contained the answer to the question whether it was filled by a “smaller” or “larger” business entity. In addition to the average responses, this allowed to recognize the difference in responses from companies of different sizes and consequently, different negotiating power on the market.

In order to get direct insight and basic understanding of the index values calculated, some descriptive statistics will be presented. This statistics will be explained in four groups, differentiated by the size of companies.

3.4. Satisfaction with different stakeholders

The first table present average marks given by the retail managers concerning the relationship with small wholesalers. It is worth of mentioning here, that the small wholesalers and also manufacturers is one group, while big wholesalers and manufacturers group is made of cumulated medium sized and big entities, according to the accounting standards. The reason is the explanation extracted through the focus groups, when respondents explained that these two groups behave in the same manner, so that there is no reason to observe them separately.

Table 2. Retail managers satisfaction with small wholesalers

Marks on the scale 1-5	Average	Std. Deviation^a	Analyzed N^a
1. Buying price	3,72	0,802	73
2. Additional charges and fees (rebates, bonuses, cash discounts, listing fee...)	3,51	0,948	73
3. Terms of payment	3,73	0,956	73
4. Joined price reductions with partner	3,26	1,134	73
5. International quality standards acquired (ISO, HACCAP, Global Gap etc.)	3,64	1,123	73
6. Joined product quality control	3,06	1,246	73
7. Exclusivity/special treatment by the partner in certain category	3,21	1,208	73
8. Coordinated planning of marketing with partner	2,76	1,107	73
9. Professionalism in operative work, fairness, good business practices and history of cooperation with partner	3,89	1,021	73
10. Partner's capacity (financial strength, ability of management and employees, warehouse, fleet, development potential ...)	3,43	0,906	73
11. Reputation of the partner (corporate brand)	3,43	1,087	73
12. Treatment of logistics and operating costs (who covers costs)	3,47	1,050	73
13. Exchange of market information, data on the sale of products and categories, constant insight into inventory, insight into CRM data ...	3,16	1,220	73
14. IT support provided by the partner (EDI, ERP, centralized data base, RFID, GPRS, eDistribution,...)	2,69	1,104	73
15. Partner's support and contribution in costs of promotion	3,09	1,175	73
16. Loyalty cards/clubs and reward programs	2,42	1,223	73
17. Education provided by partner about product/service characteristics and innovations	2,85	1,044	73
18. Liquidity of the partner	3,70	1,004	73
19. Delivery deadlines and compliance with deadlines by manufacturers / wholesalers / dealers / distributors	3,90	0,930	73
20. Quality and attractiveness of the offer, the strength of the branded products and market share of partners (and / or brand) in a certain category	3,50	0,909	73
21. Acceptance of complaints and the possibility of returning goods to the manufacturer / wholesaler / distributor; service policy	3,93	1,058	73
22. Partners' continuation of delivery	3,93	0,822	73
a. For each variable, value of the variable Missing replaced with variable Average.			

Source: Petković et al., 2017, p. 156.

Small wholesalers have solid average marks on some very important variables like buying price and possibility to return some delivered goods because of complaints. However, they have earned very low average marks on loyalty cards contribution, IT support as well as coordinated planning.

The following table shows data on the average rating of “major” wholesalers given by retailers. The highest number of ratings gravitate to grade 4 and indicates a completely acceptable level of satisfaction. The lowest ratings were made in terms of credit cards and loyalty programs (2.68), and this value is distinguished from all others because it expresses a very low level of satisfaction. An extremely low rating indicates a very low level of readiness of major distributors to participate in loyalty programs for retailers. Bearing in mind how many retailers in the second decade of the 21st pay attention to the activities of the loyalty program, considering it as a key marketing activity, it is clear that such a low estimate also points to one of the key areas of misunderstanding of retailers with wholesalers, and potentially with other suppliers. This estimate was kept in an even lower level when it comes to cooperation with “smaller” wholesalers (2.42), but this could have been expected from the weaker partners. In this case, it’s almost possible to talk about disappointing expectations.

Table 3. Retail managers satisfaction with big wholesalers

Marks on the scale 1-5	Average	Std. Deviation^a	Analyzed N^a
1. Buying price	3,94	0,935	74
2. Additional charges and fees (rebates, bonuses, cash discounts, listing fee...)	3,79	1,058	74
3. Terms of payment	3,95	0,935	74
4. Joined price reductions with partner	3,39	1,164	74
5. International quality standards acquired (ISO, HACCAP, Global Gap etc.)	4,00	0,993	74
6. Joined product quality control	3,35	1,393	74
7. Exclusivity/special treatment by the partner in certain category	3,30	1,275	74
8. Coordinated planning of marketing with partner	3,13	1,281	74
9. Professionalism in operative work, fairness, good business practices and history of cooperation with partner	3,99	1,104	74
10. Partner's capacity (financial strength, ability of management and employees, warehouse, fleet, development potential ...)	4,07	0,865	74
11. Reputation of the partner (corporate brand)	4,07	1,025	74
12. Treatment of logistics and operating costs (who covers costs)	3,73	1,037	74
13. Exchange of market information, data on the sale of products and categories, constant insight into inventory, insight into CRM data ...	3,51	1,237	74
14. IT support provided by the partner (EDI, ERP, centralized data base, RFID, GPRS, eDistribution,...)	3,17	1,324	74

Table 3 - continued

Marks on the scale 1-5	Average	Std. Deviation^a	Analyzed N^a
<i>15. Partner's support and contribution in costs of promotion</i>	3,25	1,258	74
<i>16. Loyalty cards/clubs and reward programs</i>	2,68	1,329	74
<i>17. Education provided by partner about product/service characteristics and innovations</i>	3,41	1,200	74
<i>18. Liquidity of the partner</i>	3,99	1,014	74
<i>19. Delivery deadlines and compliance with deadlines by manufacturers / wholesalers / dealers / distributors</i>	4,00	0,860	74
<i>20. Quality and attractiveness of the offer, the strength of the branded products and market share of partners (and / or brand) in a certain category</i>	4,09	0,830	74
<i>21. Acceptance of complaints and the possibility of returning goods to the manufacturer / wholesaler / distributor; service policy</i>	3,88	1,097	74
<i>22. Partners' continuation of delivery</i>	4,00	0,794	74
<i>a. For each variable, value of the variable Missing replaced with variable Average.</i>			

Source: Petković et al, 2017, p. 161.

The highest level of satisfaction in cooperation with “major” distributors is caused by three criteria: quality and attractiveness of the offer and brand strength (4.09), followed by reputation (4.07) and partner capacity (4.07). Retailers are impressed and motivated to work with suppliers of higher financial strength and suppliers that offer a range of strong commodity brands that are easier to sell. Often, the reputation of a wholesaler is dependent on the reputation of the brands it distributes and where the big manufacturer imposes its standards of professionalism and quality that go down the channel of marketing and all this affects the higher level of satisfaction of the marketers.

However, average ratings do not always reveal enough about individual business relationships in marketing channels. The aforementioned lowest estimate of co-operation in the area of loyalty program (2.68) is accompanied by a high variability of the response indicated by the highest recorded standard deviation. Since these differences have not been seen as having a difference in relations with “smaller” or “larger” wholesalers, it is obvious that in both groups of wholesalers there are significant differences in relation to loyalty programs. In contrast, a low standard deviation indicates that there is a strong consensus in giving higher rating ratings to “larger” distributors in terms of partner capacity.

Analyzing satisfaction index of retailers with their suppliers at the beginning of this study, it was shown in the summary table of all indices of satisfaction, pointed to the fact that retailers are somewhat happier in relationships with producers (index = 5.59)

than relations with wholesalers (5.51). Nevertheless, both these satisfaction indices are below the average satisfaction level in the marketing channels of Serbia (5.67).

After wholesalers, it is even more interesting to research how Serbian retailers are satisfied with manufacturers. From the results that are not presented in this paper, it was calculated that “smaller” retailers showed lower level of satisfaction with manufacturers (index = 5,37) and wholesalers (5,46) than grown retailers.. “Bigger” retailers generated higher index of satisfaction with manufacturers (5,80), as well as with the wholesalers (5,55).

Looking at the previous paragraph from a different perspective, it has also been seen that retailers are more satisfied with the “larger” wholesalers (5.57) than the “smaller” wholesalers (5.44). When it comes to manufacturers as vendors, the situation is reversed. Retailers are more satisfied with the services of “smaller” producers (5.63) than with cooperation with “bigger” producers (5.53). It can be speculated that the conditioning of bigger producers is more difficult than the conditioning of small producers that largely depend on retailers and places on their shelves. Consequently, this suggests that relations between retailers and manufacturers have not yet evolved towards the development of long-term relationships, and that these processes, according to the results from the previous point, have made quicker progress in relations with the growing distributors.

A look at the average marks given by retailers to “smaller” producers indicates a low level of satisfaction by the fact that there are no questions to which the average mark reached a value of 4. The highest score of 3.97 relates to compliance with the delivery deadlines and 3.96 on the acceptance of complaints. Both these marks, as well as a relatively higher purchase price mark (3.83) point to a rigid attitude of retailers towards “smaller” producers (or a non-cooperative attitude of “smaller” producers that meet only the necessary requirements for retailers). These answers can not be seen as indications of the development of long-term partnership relationships.

Table 4. Retail managers satisfaction with small manufacturers

Marks on the scale 1-5	Average	Std. Deviation ^a	Analyzed N ^a
1. Buying price	3,83	0,884	70
2. Additional charges and fees (rebates, bonuses, cash discounts, listing fee...)	3,55	1,021	70
3. Terms of payment	3,65	1,032	70
4. Joined price reductions with partner	3,19	1,178	70
5. International quality standards acquired (ISO, HACCAP, Global Gap etc.)	3,63	0,963	70
6. Joined product quality control	3,12	1,268	70
7. Exclusivity/special treatment by the partner in certain category	3,38	1,161	70
8. Coordinated planning of marketing with partner	3,03	1,179	70
9. Professionalism in operative work, fairness, good business practices and history of cooperation with partner	3,88	1,057	70

Table 4 - continued

Marks on the scale 1-5	Average	Std. Deviation^a	Analyzed N^a
<i>10. Partner's capacity (financial strength, ability of management and employees, warehouse, fleet, development potential ...)</i>	3,54	0,970	70
<i>11. Reputation of the partner (corporate brand)</i>	3,54	1,042	70
<i>12. Treatment of logistics and operating costs (who covers costs)</i>	3,42	1,091	70
<i>13. Exchange of market information, data on the sale of products and categories, constant insight into inventory, insight into CRM data ...</i>	3,06	1,128	70
<i>14. IT support provided by the partner (EDI, ERP, centralized data base, RFID, GPRS, eDistribution,...)</i>	2,61	1,053	70
<i>15. Partner's support and contribution in costs of promotion</i>	3,06	1,226	70
<i>16. Loyalty cards/clubs and reward programs</i>	2,61	1,301	70
<i>17. Education provided by partner about product/service characteristics and innovations</i>	3,14	1,214	70
<i>18. Liquidity of the partner</i>	3,77	0,898	70
<i>19. Delivery deadlines and compliance with deadlines by manufacturers / wholesalers / dealers / distributors</i>	3,97	0,868	70
<i>20. Quality and attractiveness of the offer, the strength of the branded products and market share of partners (and / or brand) in a certain category</i>	3,58	0,886	70
<i>21. Acceptance of complaints and the possibility of returning goods to the manufacturer / wholesaler / distributor; service policy</i>	3,96	0,984	70
<i>22. Partners' continuation of delivery</i>	3,87	0,915	70
<i>a. For each variable, value of the variable Missing replaced with variable Average.</i>			

Source: Petković et al, 2017, p. 166.

The highest level of disagreement can be seen in the standard deviation of the answer to the sixth question that relates to the joint quality control of products, which indicates that there are partners among “smaller” producers who develop this practice with their retail colleagues. The biggest agreement of retailers is in giving a solid mark to “smaller” producers in terms of purchasing prices. The most missing answers (as much as 10) were noted on the question of satisfaction with the possession of international standards by suppliers. The incitement of retailers to answer this question points to the uncertainty or the lack of this practice in the Serbian economy.

Finally, it is important to analyze how retailers are satisfied with big manufacturers. The absolute lowest mark is the related criteria of cooperation related to loyalty programs and cards. Loyalty programs in this period of development of the Serbian economy are becoming for the retailers an increasingly important marketing tool. It is obvious that they are looking for and not finding good interlocutors on this subject when it comes to “bigger” producers.

Table 5. Retail managers satisfaction with big manufacturers

Marks on the scale 1-5	Average	Std. Deviation^a	Analyzed N^a
1. Buying price	4,09	0,922	71
2. Additional charges and fees (rebates, bonuses, cash discounts, listing fee...)	3,82	1,041	71
3. Terms of payment	3,86	0,975	71
4. Joined price reductions with partner	3,33	1,164	71
5. International quality standards acquired (ISO, HACCAP, Global Gap etc.)	4,06	0,924	71
6. Joined product quality control	3,33	1,418	71
7. Exclusivity/special treatment by the partner in certain category	3,60	1,196	71
8. Coordinated planning of marketing with partner	3,18	1,320	71
9. Professionalism in operative work, fairness, good business practices and history of cooperation with partner	4,00	1,042	71
10. Partner's capacity (financial strength, ability of management and employees, warehouse, fleet, development potential ...)	4,06	0,924	71
11. Reputation of the partner (corporate brand)	4,18	0,990	71
12. Treatment of logistics and operating costs (who covers costs)	3,68	1,102	71
13. Exchange of market information, data on the sale of products and categories, constant insight into inventory, insight into CRM data ...	3,54	1,211	71
14. IT support provided by the partner (EDI, ERP, centralized data base, RFID, GPRS, eDistribution,...)	3,14	1,286	71
15. Partner's support and contribution in costs of promotion	3,15	1,245	71
16. Loyalty cards/clubs and reward programs	2,80	1,396	71
17. Education provided by partner about product/service characteristics and innovations	3,55	1,187	71
18. Liquidity of the partner	4,12	0,964	71
19. Delivery deadlines and compliance with deadlines by manufacturers / wholesalers / dealers / distributors	3,96	0,901	71
20. Quality and attractiveness of the offer, the strength of the branded products and market share of partners (and / or brand) in a certain category	4,17	0,845	71
21. Acceptance of complaints and the possibility of returning goods to the manufacturer / wholesaler / distributor; service policy	3,99	1,076	71
22. Partners' continuation of delivery	4,09	0,824	71
a. For each variable, value of the variable Missing replaced with variable Average.			

Source: Petković et al, 2017, p. 171.

One group of criteria has relatively low marks, lower than 3.2: support in promotional activities, support in the IT domain and coordinated planning. All these activities require, on the one hand, investment (money, time, investment in equipment) and, on the other hand, raising the level of attachment of the manufacturer for a particular retailer. Moreover, investing in a relationship with one retailer almost as a rule causes similar demands from other big retailers. The hypothesis may be that retailers require that “bigger” producers define themselves as a key partner. Manufacturers avoid this and thus cause additional nervousness and frustration in the marketing channels. In addition, these responses are characterized by high dispersion, which suggests different retailer experiences.

Nevertheless, despite the discontent, retailers greatly appreciate the “bigger” producers, as can be seen from their high marks, given the criteria of partner reputation and the quality and attractiveness of their offer and brands. Big manufacturers are often the owners of brands that retailers “must” have on their shelves if they do not want consumers by-pass them. These marks, to a certain extent, balance the previously expressed dissatisfaction. However, the higher number of responses with relatively low ratings, which includes assessments of cooperation in the field of common quality control and producers’ participation in joint action reductions, maintain an average marks at a relatively low level.

Another element in this table attracts attention, which is the largest number of missing answers to the question of having global quality standards by “bigger” manufacturers. The average score is solid (4.06), but the share of missing answers is unexpectedly high (11.3%). It is indicative that retailers are not sure what to answer to the question of having quality standards by “bigger” manufacturers.

4. CONCLUSION

Modern marketing channels are changing: short term transactions are being replaced with the long term relationships. This move towards stable and long lasting connections between partners calls for more attention on the quality of relationship. The consequence is emergence of many initiatives to measure satisfaction of business partners and particularly customers. This paper examined the quality of relationships in Serbian marketing channels. The research performed under the auspices of Serbian ministry in charge for trade, involved manufacturers, wholesalers and retailers.

For the sake of this research, special index of satisfaction was constructed, based on principal component analysis. On the scale from the 1 to 10, the average satisfaction in Serbian marketing channels is graded with the moderate 5,67. This average index was decomposed and in this paper, focus was on the satisfaction of retailers with manufacturers (5,59) and wholesalers (5,51). Such moderate level of satisfaction imply that there are number of spots of misunderstanding. Further decomposition of this index revealed that retailers are more satisfied with bigger wholesalers and smaller manufacturers. First group enables better service and the other group better prices.

Speaking of individual criteria, it is easy to extract some neuralgic points of co-operation. Retailers point out to all partners that they lack readiness to participate in

their price promotions, as well as to support their loyalty programs. Both activities are actually an attempt by retailers to charge suppliers with the so-called back margin and in that way transfer the total or at least part of the marketing costs to them. From long-term criteria of cooperation, poor marks have been given, especially to smaller partners, in terms of readiness for coordinated preparation of marketing plans and the provision of appropriate IT support. All partners are perceived to be confused, or even to avoiding a response to the adoption of contemporary international quality standards, which indicates that business people do not have much knowledge about this issue.

Instrument implemented in the analysis of the satisfaction level in Serbian marketing channels appeared to be useful, precise and informative. It offers relatively complex insight in the network of relationships and helps to understand situation among different groups of partners. This kind of research need continuity and possibly, in some next study, first estimate of relationship movement among marketing channel members might be spotted.

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IMPORTANCE AND IMPACT OF NATIONAL CULTURE FOR INTERNATIONAL TRADE

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Abstract

National culture can be seen as one of the most important factors influencing international trade. Product placement needs to be adjusted to the local cultural context in order for it to be successful, and there are many cases of organizations failing internationally due to the lack of cultural consideration. However, there has been a significant number of changes affecting international trade over the past couple of decades. Two main trends are the growth and development of former third world countries and technological changes affecting international markets. The goal of this paper is to provide a literature review on the changes in international trade and the possible implications of these changes on the relationship between national culture and international trade. In order to do so we explain the rationale of the culture convergence theory as well as provide some arguments for national culture still being an important factor in international trade.

Key words: national culture, international trade, trends in international trade

1. INTRODUCTION

It can be said that today's highly integrated and interconnected international markets have never been more competitive. The number of companies participating in international trade is increasing every day, with more companies than ever coming from developing countries. In this context, it is no longer possible to talk about the prevalence of highly developed industrialized countries in international trade. In addition to the United States, Japan and the European Union, BRICS countries take on an increasingly important place in international trade.

The above-mentioned macro-level changes lead to major challenges for international corporations. In order for them to grow and survive on the market, they must take into account a growing number of factors they did not have to think about before. Nevertheless, the success of each business and its product or service is still highly dependent on its adaptation to the local context. Companies competing in international markets must take care of the principal prerequisites for business success. The first is the

efficient utilization of their own resources to achieve the benefits of economies of scale, while the second is adapting their products to local needs and tastes.

Drucker (2012) has stated that culture “eats the strategy for breakfast”. When this is paraphrased in international trade, it can be said that culture is variable that every business needs to adjust to, if it wants to succeed on a market, whether by customizing products or services, by promoting them, or by placing placement on the market. Based on all of the above, and taking into account the significant changes that have taken place in international markets over the last couple of decades, one can argue that there is an unanswered question regarding culture. That question is: Are the specifics of the national culture within which the company competes still important for the success of its products and services?

The aim of this paper is to provide a literature review on the importance and impact of national culture on international trade. For this purpose, we will conceptually explain the occurrence and development of the concept of national culture, as well as the ways of expressing and measuring national culture through value dimensions. We will also elaborate on the changes and trends in international trade that have occurred over the past twenty years, as well as explain the specifics of the relationship between national culture and international trade.

2. NATIONAL CULTURE

The concept of national culture is often mentioned in everyday life. It is usually viewed as a stereotype of values and norms that are considered to prevail in a nation. Cultural differences in history have often been the cause of many disagreements, even wars between neighbouring countries. National culture can also be seen as an invisible membrane within which complex and specific interpersonal relationships are defined together with expected behaviours. Many authors have argued that differences in national culture through history have led to the development of state institutions and ways of regulating the rule of law system (Tabellini, 2010).

A number of authors have studied the influence of national culture on many important national and organizational levels. Kaasa et al. (2013) analysed the impact of national culture on state-level innovation in European Union countries, and before them, Shane (1994) also studied differences in innovation between Western and East Asian countries. Some authors have studied the influence of national culture on the development of countries, GDP per capita and Gini's index (Tabellini, 2010). A large number of scientists have also dealt with the influence of national culture on various organizational outcomes, such as the formation of organizational culture or the implementation of quality management practices.

Newman and Nollen (1996) explain that management often uses “one size fits all” approach, which is not necessarily good since the values, attitudes, behaviours and efficiencies vary among national cultures. They believe that differences in national cultures lead to differences in management practices and that, consequently, corporations must adapt their business practices to the national culture of the country in which they

do business to achieve better business results. Nelson and Gopalan (2003) state that for decades, cultural researchers have been observing the role of national cultures in shaping individuals before they enter into an organization. It can therefore be stated that national culture greatly affects perceptions, cognitive processes, values, attitudes and beliefs of individuals.

In economic research, national culture has often been studied as an exogenous, one-dimensional variable, which is given within an economic model. The influence of national culture on various outcomes has usually been only roughly described without the detailed analysis of the complexity of the very phenomenon of the national culture itself and the specificity of its influence on all social processes. This has changed with the work of Geert Hofstede (1984).

2.1. Definition and development of the concept of national culture

Rugman and Verbeke (2004) define culture as the accumulated knowledge that people use to interpret experiences and generate social behavior. National culture refers to how members of a culture generally behave independently of the environment. It is a complex, multi-level construct, the core is its values, and outwardly it is manifested through practices, symbols and artifacts (Hofstede, 2011).

The very concept of national culture appeared for the first time in sociology. Kluckhohn (1962) wrote that there should be universal categories of culture. This is linked to the fact that culture is nothing but an answer to the same issues important for human biology and survival in different contexts. He says that all cultures ultimately have a limited number of answers to the question that at some point puzzled different people in different cultures.

Hall (1976) defined national culture according to the way in which individuals within these cultures communicate. He explained that there are high and low context cultures. Within high context cultures, messages are transmitted through physical context and understanding within the person to whom the message is sent, while the smaller part of the message is explicit. In low-context cultures, the whole message is clear and implicitly coded to be easily understood without taking into account the specificity and context. However, none of these studies has linked the specificities of culture with the economy.

Kluckhohn and Strodtbeck (1961) described the value orientations of a country as culture. They state that there are a number of value orientations in a particular society that concern, first of all, the assessment of human nature, i.e. the values that make an individual good, bad or neutral. Another important value orientation is the relationship of an individual to the surrounding environment, in terms of adapting an individual to the environment, the goal of achieving harmony with the environment or managing the environment. The third important value orientation concerns the attitude of individuals within a society towards time, then towards activities, and ultimately to interpersonal relationships in terms of hierarchy and emphasis on collectivism or some other important social qualities.

Inkeles and Levison (1969) were among the first to analyse culture at the national level. They have defined and used the term “national character” as three standard analytical classes of culture that define the relation to authority, the perception of themselves in the context of femininity and masculinity, and the primary dilemmas or conflicts and the ways in which individuals deal with them. It can be said that with this work the basis of value dimensions of national culture were created as the most commonly used method of measuring and observing culture today.

Hofstede’s model of value-dimensions of national culture was developed based on the theory of Inkeles and Levison. When defining the dimension of national culture, Hofstede focused on the correlations between average values at the state level, using extremely matched samples of respondents that were very similar in all aspects except nationality. Hofstede (1984), in his research of IBM’s employees cultural values around the world came to the conclusion that all of them encounter similar problems in their everyday business, but they solve them in completely different ways. The ways of dealing with these issues were linked to the various value dimensions of national culture. A number of anthropologists have written about this phenomenon, but he was the first to empirically verify the existence of national culture value dimensions.

2.2. Dimensions of national culture

Hofstede (1984) defined four clear dimensions of the national culture present at IBM employees who were later tested and validated in a number of other scientific papers. Dimensions and their definitions are as follows:

1. Individualism - Collectivism

The preference for a weak social framework within which individuals are expected to care for themselves is defined as individualism. On the other hand, collectivism is a preference for a more solid social framework within which individuals can the members of their group to take care of them in exchange for loyalty to the group.

2. Power distance

This dimension measures how less powerful members of society accept unequal distribution of power and expect that power to be distributed unequally. In societies that are characterized by high power distance, individuals will accept a hierarchy within which everyone has a proscribed social role and do not ask for further clarification. In low power distance countries people are trying to equalize power distribution and seek justification for inequality of the distribution of power.

3. Uncertainty avoidance

A dimension that indicates the level to which members of society feel uncomfortable in situations characterized by insecurity. Societies that have a high level of uncertainty avoidance are usually intolerant to new ideas and unusual behaviours, unlike societies that have a low level of uncertainty avoidance.

4. Masculinity - femininity

This dimension is characterized by success preferences, assertiveness and material awards, and recognitions for success in terms of masculinity. Nations with a high level of masculinity are generally more competitive. On the other hand, societies that prefer co-operation, modesty, care for all members of society and solving problems by reaching a consensus have a higher level of femininity.

Over time, the interest in studying the value dimension of national culture has increased, and two more dimensions have been added to the model. Following the study of East Asian cultures called “Chinese Culture Connection” in 1988, the model was added to the dimension of the long-term orientation of society, also called the Confucian dynamism. This dimension is defined in a way that companies who have a low level of orientation towards the future most often have doubts about social changes and keep their traditions and norms, while companies with a higher level of orientation towards the future support savings and investing in education as a way to prepare for change.

The last dimension in the Hofstede model was added in co-operation with Bulgarian scientist Minkov and it is called indulgence vs. restraint (Minkov and Hofstede, 2011). A society that is more willing to meet the needs of individuals will have a higher level of compliance with basic human needs and greater enjoyment of life as well as higher levels of leisure and will therefore be labelled as more indulgent. Societies that are restrained are more prone to neglect individual needs and have strict social norms.

Each country in the world has a specific configuration of a national culture dimension that will favorably or negatively affect the various social and organizational outcomes. Ronen and Shenkar (2013) classify national cultures into nine supra-national clusters: Nordic, German, Anglo-Saxon, Latino, Latin American, Arab, Far-Eastern and independent, and they consider that differences should be observed on a supranational and not national level.

There is also a number of critics that think national cultures are more complex than their value dimensions show. Taras et al. (2010) argue that many other dimensions shape the culture of a nation much more than values, among them socioeconomic and demographic factors. The ground for this argument is the rise of global connectivity, cross-border mobility, internationalization of education systems, and the fact that national boundaries are often not followed by ethnic ones. Gelfand et al. (2006) feel that norms make up for the visible part national culture and have a much greater impact on the behaviour of individuals than their values. Nevertheless, the Hofstede’s model of national culture dimensions still remains the most widespread way of observing national culture.

3. TRENDS IN INTERNATIONAL TRADE

Culture has always been an important determinant of international trade. Cultural differences have affected the differences in product advertising and placement on international markets. This is particularly true for the products and services of multinational corporations that have always had to take care of local cultural specifics.

However, international trade has experienced many changes over the past twenty years. First of all, we witnessed an unprecedented economic growth and development of the emerging markets. This primarily applies to BRICS countries, Brazil, Russia, India, China and South Africa, which are characterized by a large pool of human resources as well as a considerable amount of natural resources and raw materials used for industrialization and modernization.

Political changes in the industrialized countries of the West have also affected the changes in international trade. The growth of populism and anti-establishment movements has led to a change in the political arenas around the world. This is primarily apparent in the rise of isolationism and protectionist economic policies, led by the United States.

In addition to the above-mentioned geo-political changes, there has been a significant technological development, and information technology plays a much more important role in international markets than ever before. The development of platform economy and brand new business models in retail and wholesale as well as the diminishing importance of national borders have raised the question to what extent are national states relevant anymore, and to what extent are we witnessing a globalization of values and norms on world markets. In addition, the question that remains unanswered is whether national culture is still an important factor in international trade and whether international corporations still need to take care of cultural specificities.

3.1. Geopolitical and macroeconomic changes

Over the last couple of years, there have been a number of negative changes for international exchange in terms of increasing tariffs, and the long-term impact of these trends is still difficult to estimate. Despite the perception of the increase in constraints, if we compare the movements of average customs tariffs and border constraints over the past two decades, it is evident that their significant fall (WTO, 2018) has actually occurred. Given that lower tariffs and the openness of the economy allows greater choice of goods and services to consumers at lower prices and the fact that local producers in competition with foreign producers are generally more efficient, it is expected that these trends will not continue in the future.

UNCTAD (2018) states that international trade is currently in a transitional phase. After a strong recovery following the financial crisis, there has been a gradual increase in international trade, which shrunk in the period from 2015 to 2018. This decline in international trade growth rates can be explained by two factors, the first of which is the fall in commodity prices and dollar appreciation, while the second factor is the decline in demand, with particular emphasis on East Asia and other emerging economies. The WTO (2018) expects that international exchange will grow at a rate of 4.4% in 2018, what is the highest growth since 2011.

Nevertheless, the threats to restrictive trade policies announced by the United States and the expected consequent reactions of their major trading partners, notably the European Union and China could greatly hinder positive changes. Despite all this,

it is expected that the level of international exchange will continue to grow over the next period, primarily under the influence of emerging economies such as China and India.

The importance of emerging economies for international trade is manifested in several ways. First of all, the growth of their production capacities coupled with the abundance of human and natural resources has led to an increase in the size and value of the total international trade and at the same time led to the development of a whole range of new innovative companies (UNCTAD, 2018). Taking that into account it can be stated that growing economies, which were seen as sources of natural resources and cheap labour for international companies from developed countries, have now become the bearers of change in international trade.

The key geopolitical changes are manifested primarily in relocating an increasing number of economic activities to developing countries. WTO (2018) states that international trade growth rates are almost twice as large for fast-growing countries than developing countries with 5.7% versus 3.5%. When Asia is analysed separately, international trade growth is reported in the amount of 6.7% per annum. These trends could in the long run lead to significant redistribution of wealth and capital to the benefit of the fast-growing economies.

3.2. Impact of technology on international trade

Technology has never played a greater role in international markets. Apart from the fact that consumer electronics and other high-tech goods are gaining an increasing share in international trade, technological advances have greatly facilitated the international trade itself. With the development of e-commerce and platform economics, we are witnessing the emergence of large commercial conglomerates that do not have brick and mortar stores in the traditional sense. In this context, it is worth mentioning companies such as Amazon, or Ali-Baba. These companies have completely changed the international trade paradigm and have become a virtual showcase for thousands of small manufacturers, helping offer their products worldwide with much lower overhead costs.

A number of authors believe that technology development has a positive impact on international integration, firstly by removing the specifics of particular markets and states on the international market (Tellis et al., 2009). Products and services on international markets have never been more widely available, while their prices are more transparent due to the much faster and cheaper two-way communication with customers. One of the factors directly linked to the transfer of technology, and indirectly with international trade is also a very high level of FDI in the world (WTO, 2018). High level of foreign investment leads to easier technology transfer, a process through which commercial technologies are being diffused. Technological transfers lead to the development of infrastructure and a higher level of international cooperation in the field of scientific research, education, employability and transport (Pietrobelli, 2017).

In short, it can be concluded that international trade is currently at record levels. Macroeconomic trends in the global economy are positive, but the same can not be said for geopolitical changes that could, to a greater extent, negatively affect the growth of

international trade. On the other hand, high level of technological development, accelerated convergence of emerging economies and a relatively high level of direct foreign investment together with the effects of overflow of technology lead to a multiplicative increase in supply in global markets and significant changes in the sense that companies from developing countries and fast-growing economies such as India or China are taking the technological lead over emerging western competitors. In the context of all this, we can ask the question what will be the future role of traditional variables influencing international trade, such as national culture.

4. IMPORTANCE OF NATIONAL CULTURE IN INTERNATIONAL TRADE

There are two dominant theoretical views of the influence of culture on international trade. According to the theory of convergence, cultural differences between countries are increasingly diminishing due to a series of factors, which consequently reduce the importance of national culture in international trade. Max Weber, among the first, explained that capitalism, rationalism and bureaucracy are in conflict with traditional cultures and under certain circumstances can overpower them (Ross, 2017).

The key argument of convergence theory is that due to the complexity of modern markets and technologies, companies need to use similar practices to be efficient and effective resulting in their isomorphism, which is also translated to the users of products and services of the company. (Taras et al., 2010) indicate that greater cross-border mobility and the internationalization of education systems also greatly affect the convergence of national cultures and reduce their impact on international trade and other important aspects of the economy. Inglehart and Baker (2000) give partial support to this theory by claiming that all societies through time become increasingly individualized and less prone to hierarchy. This phenomenon can partly be attributed to the greater level of economic development in individual countries, which consequently makes old value patterns and norms of behaviour redundant due to the fact that individuals have economic independence to “bounce” out of the box of common behaviour. A number of other authors also state that human behaviour will have a much greater impact on socioeconomic and demographic factors that are under much stronger influence of economic trends, making in that context the impact of national culture on international trade irrelevant.

Inglehart and Baker (2000), however, claim that despite of the significant changes such as high level of cross-border mobility and a large amount of common shared experiences among individuals from different parts of the world, the nation-state remains a key unit of sharing the experience of the group of people. The educational and cultural institutions of nation states still shape the values of all members of a society.

The convergence thesis contradicts the view of a number of scientists who consider that differences in socio-economic factors and cultural heritage can not disappear overnight and can greatly affect the transfer of knowledge and experience related to a product or service and its acceptability within a particular national culture (Hofst-

ede, 2011; Ingelhart and Baker, 2000). Chua and Ng (2017) state that national culture has a significant effect on individuals, although individual differences and specifics of particular situations may lead to certain individuals not being under the influence of culture, which opens the door to future research that could consider the specifics of the influence of national cultures.

When the focus of analysis is shifted from conceptual papers that theoretically explain what impact national culture can have on international trade, a number of interesting conclusions can be drawn. Munoz-Sepulveda and Rodriguez (2015) state that it can be expected that differences in the dimensions of national culture will affect the general approach of international trade in a country, both by individuals and by companies.

Kristjánisdóttir et al. (2017) analysed the relationship between the overall international exchange and the value of cultural dimensions, taking into account the size of the economy and the internal market of each country. They came to the conclusion that there is a significant influence of national culture on international exchange with a special emphasis on the dimension of masculinity - femininity. Countries with a higher level of masculinity are more prone to importing and consuming imported goods. It is interesting that for other dimensions of national culture there is no statistically significant influence on international trade. Based on the above it can be concluded that an analysis of the impact of the national culture dimension on trade should be accessed through specific and precisely defined causal links that may not be noticeable at the macro level.

Several other authors have come to similar conclusions regarding the influence of masculinity on international trade (De Jong et al., 2006; Gerogieva et al., 2012). Nevertheless, it can be concluded that, despite a solid theoretical basis that conceptually defines the way in which certain dimensions of national culture affect international trade, there are still no clearly defined causal links between national culture and international trade, although the importance of national culture for international trade has been recognized and proven in the literature.

5. CONCLUSION

International trade has been growing steadily since the financial crisis in 2008. Despite the decline in international trade growth rates since 2015, we can still talk about one of the longest periods of growth in modern history. While in the past periods the growth of international trade has been tied almost exclusively to the growth of developed and highly industrialized countries, such as the EU member states, as well as the United States and Japan, today, the emerging markets and fast growing economies are playing an increasingly important role at the international market.

This period of unprecedented growth was also marked by significant technological changes. The development of the platform economy and a significant increase in the share of e - commerce have greatly contributed to an increase in international trade. More and more companies from fast-growing economies and developing countries are playing an important role in this change as well.

A number of authors have asked the question whether these changes have reduced the importance of traditional factors that are considered to affect international trade. These factors are the size of an economy, the level of economic development as well as the political and legal system in a country. National culture, as a determinant of dominant values in a society is can be especially emphasized as one of the traditional factors affecting international trade since it affects how a product or a service will be accepted in a market, as well as the specifics and decisions important for their placement on the market (Kristjánsdóttir et al., 2017).

Advocates of convergence theory believe that changes in international markets, in terms of easier movement of people and capital, the rise in international trade and technology exchange, and the internationalization of education systems has led to a decrease in cultural differences between countries. Some authors also point out that socioeconomic and demographic factors in personal wealth and age affect the behaviour of consumers more than national culture.

Nevertheless, a series of recent data shows that there is a statistically significant impact of national culture on international trade and that countries with certain configurations of national culture dimension have greater involvement in international trade, taking into account other national specificities such as the development of the economy and the political legal system (Munoz-Sepuvleda and Rodriguez, 2015; Kristjánsdóttir et al., 2017).

The question for future research can be not only if national culture influences international trade, but to what extent and how it affects it. Most of the work on this topic so far analysed the relationship between national culture and international trade at a macro level. One of the proposals for future research is to try to precisely define and analyse the specific links between individual characteristics of national culture and the attitudes and involvement of individuals and organizations in a country in international trade. Besides that, the analysis of the influence of national culture can be expanded by observing norms and practices that are dominant in a culture, and not just its values (Gelfand et al., 2006). Also, it is important to conduct more longitudinal research that could take into account the assumption that national culture, although stable through time, can potentially change, and therefore influence international trade in a different way. The last recommendation of this paper is to test the assumptions about the uniformity of national culture, because in the context of a comprehensive analysis it is not good to neglect the potential internal cultural differences in individual countries.

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SOCIO-CULTURAL ASPECTS OF TRADE INTERNATIONALIZATION

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Abstract

At the beginning of the new millennium, trade, especially retailing, has got an epithet of an “exciting”, complex, and vital sector of the economy, both on developed and emerging markets. Deep changes that have taken place in trade give it a new place in the world economy. As a result of globalization and integration of the world market, as well as changes in international trade flows, internationalization of retail and trade in general occurs. These processes increase the international activity of the world’s leading trade chains. On the other hand, for trading companies that spread their business beyond the borders of the national market, it is very important to know determinants or factors of internationalization. In the past twenty years, theoretical and practical research has seen these factors as a set of economic, political, social, and cultural factors, which affect the choice of the specific market in which companies will operate in the coming period. The aim of this paper is to examine socio-cultural factors of trade internationalization. These factors will be analyzed in terms of their impact on trade internationalization, as well as the impact of internationalization on them. The basic hypothesis to be tested is that socio-cultural factors affect various activities of international trade chains. In order to test the hypothesis, empirical research on socio-cultural factors of trade internationalization on the Serbian market will be conducted.

Key words: trade, retail, internationalization, factors, socio-cultural factors

1. INTRODUCTION

The variability of business conditions is characteristic of developed market economies. Such a business environment has crystallized numerous trade development flows or tendencies. Fiercer competition is noticeable, both in terms of the number and size of trade companies, as well as in terms of the modality of business formats that compete with each other. This is especially due to the opening up of national markets, as well as to the increasingly internationalized business activities of trading companies. These facts indicate that the internationalization of trade and retail is one of the key courses of developed market economies. Due to the already mentioned intense competition, and saturation on the parent markets, trading companies decide to extend their business to

other countries. However, business internationalization is not an easy task, nor a simple one. Before that, the company has to answer numerous and varied questions. The choice of the country in which the company will do business is preceded by detailed assessment of market attractiveness, which includes the examination of political and economic risks, business efficiency, urban population, trade sector development, etc. Then, a strategy, or a model of business expansion on the foreign market is selected, which is largely conditioned by different factors.

Bearing in mind abundant research on internationalization and its factors, as well as current operations of international trade chains, the research subject in this paper are the factors of trade internationalization, with a special focus on socio-cultural factors. The aim is to test the starting hypothesis about the impact of these factors on the process of internationalization of trading companies. For this purpose, empirical research will be conducted, based on the Serbian market example, which has become interesting for international trade chains in recent years.

2. THEORETICAL ASPECT OF THE IMPORTANCE OF TRADE INTERNATIONALIZATION PROCESSES AND FACTORS

Global business is becoming a reality for an increasing number of companies in developed market economies. Home markets enter a mature development phase, characterized by a high degree of saturation and intense competition. These markets face rising foreign competition in conditions of slow or even zero growth of demand. Under these circumstances, manufacturing and trading companies are looking for exit on foreign markets, where they continue their growth and development (Lovreta et al., 2017). Internationalization of retail and trade in general is a direct consequence of world market globalization and integration. International economic integration, such as the single EU market, the North American market (initiated by the free trade agreement between Canada and the US in 1986), the Southeast Asian market (ASEAN), the globalization of the Japanese market, the opening up of Eastern Europe and developing countries market, encourages internationalization of retail.

Although attention is always focused on large companies, trading companies of all sizes begin their international expansion. A large number of relatively small trading companies today follow the strategy of retail internationalization (Ćuzović and Sokolov Mladenović, 2012a).

Authors dealing with trade and trade management agree that a trade company focuses on internationalization when it achieves a critical size on the home market, and because of legal restrictions (protection of competition) it can no longer grow on it. Therefore, due to the high degree of home market saturation, large retail chains invest abroad, thus finding new sources to generate profit. However, there are also different opinions. Alexander and Doherty (2009: 4) point out that “internationalization for many trading companies is no longer the logical consequence of the limited possibilities of home market growth, but the chance to expand their operations on the global market, where their product range and services will be valued by a broader circle of customers”.

Most companies would prefer to stay on the home market if the size of this market was sufficient. Managers would not have to learn other languages and laws, deal with unstable currencies, face political uncertainties, or redesign their products to meet the needs and expectations of different customers. Business would be easier and safer. However, there are certain factors and motives due to which an increasing number of companies are internationalizing their business. At the same time, there are potential risks, which could lead to a collapse on the foreign market. The following paragraphs will consider some of the main motives and risks associated with the international expansion of trading companies.

2.1. Theoretical aspect of the motives behind trade internationalization

Business internationalization is becoming very important for many trading companies. Events and flows, both on home markets and internationally, condition internationalization of operations. Internationalization is becoming inevitable for trading companies. Those who fail to expand from the home market to foreign countries are at risk of remaining at business margins (Feldmann, 2016).

The motives behind trade internationalization varied in different periods of time. The US Professor Stanley Hollander gave the most comprehensive analysis of international retail activities at the beginning of the second half of the last century (Alexander and Doherty, 2009). His analysis predominantly deals with macroeconomic factors of trade internationalization, such as: a) establishing foreign trade balance, b) balanced development of production and trade, and c) influence of political factors on international business expansion. In addition, the following motives are the key ones to the process of international expansion of traders (Alexander, 1990; Tatoglu et al., 2003):

- Non-commercial motives that include various humanitarian, social, or ethical motives. These motives stimulate activities of knowledge transfer in the field of logistics to underdeveloped countries such as certain African countries;
- Commercial motives are based on a desire to make profit, although it does not have to be the case. History has seen an example of American retailers who tried to maintain a network in some developing countries so that they can easily get to manufacturers through them;
- Legal motives are a reaction to legal restrictions on the home market. These are anti-monopoly measures aimed at preventing growth and gaining a dominant position. Internationalization of American traders in 1970s and European traders in 1990s was largely due to these factors;
- Market potential is a motive to get the most of the foreign market, i.e. to take up a position untaken by then. Usually this motive comes in combination with the saturation of the home market.

Contemporary literature offers two basic concepts to explain the motives and factors of internationalization: a) a reactive-proactive concept, and b) a push-pull concept (Čuzović and Sokolov Mladenović, 2013).

Market-oriented companies should, by definition, be proactively oriented companies looking for new growth opportunities, instead of responding to market challenges and hazards that business brings with it. In this sense, motives behind business internationalization, i.e. behind the transfer of business activities to foreign markets, referring to the company's strategic orientation, are particularly important. Reactive-proactive motives explain how management acts in the process of planning company's future activities.

Reactive behavior implies that management responds to some environmental challenges. In doing so, these challenges usually involve some limitations in doing business or in further growth, while sudden chances are rarely classified in this group of factors. The company management usually responds to the lack of further growth opportunities, saturation of the home market, unfavorable laws, etc. In doing so, it is on managers themselves to interpret all these limitations. In this regard, authors debate on the notion of market saturation. Market saturation can hardly be accurately determined because the marketing area to a great extent moves the borders of saturation. Managers, however, in accordance with their preferences and abilities, more or less subjectively assess the right moment for their company activity to be transferred to a new market.

Proactive behavior involves recognizing opportunities in the environment and exploiting these opportunities even before the saturation of the home market. Such companies often become global, as is the case with "McDonald's" (fast food) or "Woolworth" (mixed stores). It is characteristic for them to recognize a particular need on different markets and to use the opportunity to be the first to meet this need in a wider market area (Alexander and Doherty, 2009).

Recent empirical research points to an increasing number of companies that are not "forced" to internationalize business, but do it as part of a plan to improve business activity. Great significance is given to accepting the marketing concept in doing business, which was not the case before. It is logical that retailers launching a new business format, such as a hypermarket, or a specialized lifestyle (contemporary) store format, look for opportunities to introduce their innovation on as many national markets before anyone else copies them. Similarly, innovative manufacturing companies try to offer the new product as soon as possible to the global market without waiting for many imitators to "skim off profit" from other markets (Alexander and Doherty, 2009).

Different motives of business internationalization are spurred by the dangers that exist on the home market (push factors), or the opportunities that exist on foreign markets (pull factors). Different sources identify great number of push factors in trading business, which are compared with the corresponding pull factors. The most important push and pull factors, in political, economic, social, and cultural terms, are given in Table 1.

Table 1. Push and pull factors

	Push factors	Pull factors
Political impact	<ul style="list-style-type: none"> • Unstable political environment • Restrictive legislation • Anti-business culture • Restriction on consumer loans 	<ul style="list-style-type: none"> • Stable political environment • Liberal legislation • Business-oriented culture • Rise in consumer loans
Economic impact	<ul style="list-style-type: none"> • Poor economic conditions • Low growth potential • High operating costs • Mature market • Small home market 	<ul style="list-style-type: none"> • Good economic conditions • High growth potential • Low operating costs • Developing market • Possibility of investing in property • Large market • Favorable exchange rate • Low stock prices
Social impact	<ul style="list-style-type: none"> • Negative social environment • Unfavorable demographic trends • Stagnation and decline of population 	<ul style="list-style-type: none"> • Positive social environment • Positive demographic trends • Population growth
Cultural impact	<ul style="list-style-type: none"> • Unknown cultural milieu • Heterogeneous cultural environment (small and hostile segments) 	<ul style="list-style-type: none"> • Known reference points in the cultural milieu • Attractive composition of cultural values • Innovative business culture • Fostering corporate culture • Homogenous cultural environment
Competitive structure	<ul style="list-style-type: none"> • Hostile competitive environment • High level of concentration • Market saturation • Unfavorable operating conditions 	<ul style="list-style-type: none"> • Market niches • Capacity in possession • Expansion capability through copying • Favorable operating conditions

Adapted by: Borusiak, B., 2018, pp. 29-37.; Treadgold, 1990; Alexander, 1990; Hutchnson et al., 2007; Ćuzović and Sokolov Mladenović, 2012b.

It should be noted in particular that previously observed motives and factors of trade internationalization are not uniform and common for all companies. Also, companies are always encouraged by a great number of motives, regardless of whether they act as pull factors from a foreign market or push factors from the home market. In any case, companies are always guided by their own interests, and business internalization is always based on the desire to increase profits or revenues.

2.2. Socio-cultural factors of trade internationalization

Social factors, as motives underlying trade internationalization, represent a synthesis of the influence of economic and cultural factors on one society. Although the socio-cultural environment is the sum of all these variables, they require separate ob-

servation. In fact, economic factors play an important role in determining the social environment, but this does not mean that countries at the same or similar level of economic development have the same level of social development. Each country is a separate entity in terms of the effect of social factors, and, for this reason, international trade companies have to watch them because they determine their future business policy.

Social factors essentially determine market consumption. According to sociologists, people as consumers are stimulated and motivated by groups to which they belong or strive for individual needs and desires. This is especially so because the majority (about 70%) of the world population today live in the so-called collective cultures that are under the strong influence of social groups, in contrast to the smaller part of the world population living in the so-called individual cultures (Maričić, 2009).

In order to explain the need for a specific trading company product, social factors need to be understood. The influence of social factors on consumer behavior evolved and changed alongside social and economic development and increasing living standards. This suggests that, in the course of human society development, consumer behavior has been under the dominant influence of different social factors, primarily because man is a social being and cannot be viewed separately from the society in which he lives.

Bearing in mind the above, trade companies operating on different foreign markets must bear in mind the high degree of interdependence between themselves and social factors (Eckman et al., 2015). If companies forget about the influence of social factors or possible social problems, it will have a negative effect on their operations. One example is the entry of foreign trade companies onto the British market at the end of the 19th and the beginning of the 20th century, when consumer cooperatives developed. This business format appeared in order to protect consumers from bad and perishable goods, but also to protect the then working class from dishonest traders. In view of these events, many foreign trade chains entered the British market by accepting consumer cooperatives. Another example of the emergence of social problems in a society is the abuse of labor by trade chains. In order to prevent this, many countries developed legal regulations in order to prescribe working hours in sales facilities, but also to protect the workforce.

It can be noted that trade depends on social factors, but also affects them. It seeks to know the needs of consumers on one market and to balance these needs and their own capacities. In developed economies, where foreign trade companies operate, hypermarkets and supermarkets strive to meet all consumer groups, which leads to longer working time or work at weekends. What is more, trading companies adapt their product range to consumer requirements in a particular area, and new business formats are introduced, such as "do-it-yourself", super-stores, discount stores, etc. In this case, trade responds to social factors. At the same time, it can, as already pointed out, influence social factors. For example, sales facilities on the periphery of the city affect the increased mobility of consumers. Consumers respond to these changes and significantly change their purchase patterns, focusing more on weekly and monthly purchases.

Therefore, when entering an international market, trading companies should look at all the indicators that show the social picture of the consumer environment.

This primarily relates to social factors that determine the consumer behavior and their shopping tendency in one society, such as material welfare, household characteristics, lifestyle, free-time activities, ethical principles, belonging to relevant and reference groups, and the like. Knowing these factors will make it easier for the company to select a market and create a “package” for that market.

Among other factors, cultural factors that exist in one country are also important for trade internationalization (Pioch and Gerhard, 2014). In this regard, it is impossible to understand the trading system of a country without understanding its culture, since it determines what people buy and the purpose of using certain products. In that sense, it is necessary to make a distinction between countries in terms of their culture. So, there is a difference between the so-called multicultural countries such as India, China, the United States, Canada, etc., where there are several cultures, and (Sternquist, 2011). Different cultures have a different effect on consumption patterns in one country, which is very important from the perspective of business development in international trading companies.

The influence of cultural factors on trade internationalization reflects on all its aspects and activities. Since an international trading company seeks to meet the needs and demands of consumers, it cannot ignore the cultural factors that affect their behavior. Consumer market decisions are greatly influenced by consumer lifestyle, and this depends directly on the culture of the society to which the consumer belongs.

The relationship between culture and trade internationalization is two-way and interactive (Sokolov Mladenović et al., 2017). Trade internationalization is under an important influence of all culture segments in a society, such as: 1) material elements, which depend on economic and technological conditions in one country, 2) social institutions, in terms of belonging to different reference groups that create consumption patterns in one country 3) a belief system that is different from country to country; 4) aesthetics, which greatly influences what people buy; and 5) the language that influences the creation of advertising messages by companies. These cultural dimensions greatly affect consumption structure and system in individual countries, consumer behavior, the process of thinking and the value system, the communication process, which in turn affects the business policy of an international trading company. Just like culture and its dimensions have an impact on trade internationalization, trade internationalization can also have a great effect on culture. Specifically, under the influence of many foreign trade companies, consumers from less developed countries over time have changed the conditions, quality, and lifestyle by purchasing better and modern products in the trading companies' assortment. An illustrative example is the effect of trade internationalization on change in consumers shopping habits in former socialist countries. Over time, they reoriented to weekly and monthly purchases, instead of daily shopping.

However, for trade internationalization, it is much more important to see in which strategic decision-making areas the cultural impact comes to light. Theory and practice in the field of trade internationalization claim that cultural impact comes to light in the following areas: when choosing a market, when selecting a strategy for entering the foreign market, and when designing marketing mix instruments (Rakita, 2004).

When choosing a market, cultural factors can in many cases be a limitation. Thus, trading companies selling electrical equipment cannot be connected to those markets where less than 1% of households have electricity. Likewise, trading companies that sell fashion clothing cannot count on Arab markets, given their unwritten dress code.

When choosing a market entry strategy, culture has a great impact because it largely defines business conditions in each country. Various entry strategies, which will be specifically discussed, bring transfer of culture from one country to another, and it is very important to see how individual countries and their cultures accept that. Cultural factors on the target market are especially evident in the strategy of direct investment abroad and the opening of companies' own sales facilities.

When designing marketing mix instruments, cultural impact is reflected in all marketing activities. With products, the impact of culture is apparent in the degree of product range adjustment to various international standards and requirements of the local market. Promotional and distribution activities are greatly influenced by available material and technical infrastructure assumptions in individual countries, such as the availability of media, fairs and exhibitions, transport systems, warehouses, etc. The price policy must also considerably consider material assumptions, standards, and living conditions in a particular country.

Based on the above, as a significant tool in the evaluation of cultural factors on a market, the so-called Hofstede's model of cultural dimensions can be used. Geert Hofstede is a researcher from the Netherlands, who developed one of the most widely used theories of cultural differences. He developed a paradigm based on the study of the cultural impact on the behavior of individuals. What makes his work unique is that he developed the model after testing the values and beliefs of 116,000 employees in IBM in 40 countries around the world. Later, he expanded his research to ten other countries. His model includes four dimensions of culture: individualism, uncertainty avoidance, power distance, and masculinity vs. femininity (Hofstede, 1992). This classification has its application in international management, and also in the field of trade internationalization.

3. RESEARCH METHODOLOGY

3.1. Research sample and hypotheses

In order to assess socio-cultural factors, empirical research is conducted using survey method that involves 300 respondents on the territory of Southeast Serbia. The survey is conducted at the point of sale of FMCG products, i.e. in retail chains, between April and June 2018. The aim is to get to a representative sample of respondents, bearing in mind that, in recent years, the purchase of the mentioned product category is also made online. The research is conducted in order to test the following hypotheses:

H1: Socio-cultural characteristics of consumers affect buying in international trade chains.

H2: The impact of particular socio-cultural factors on the purchase in international trade chains is different.

Data processing is done using Microsoft Office Excel and SPSS 22.

The questionnaire is divided into two parts: general and specific questions. In the first part, the questions are related to gender, age, marital status, level of education, sector in which the respondent is employed, and average monthly income. The respondents are employed persons. The answer to these questions is important for assessing the socio-demographic characteristics of consumers affecting the selection and purchase of products in international trade chains. The second part of the questionnaire refers to specific questions that include the views and opinions of respondents about buying in international trade chains. Table 2 shows the characteristics of the survey sample:

Table 2. Structure and characteristics of the research sample

	%
Gender	
Male	41
Female	59
Age	
18-24	25
25-34	15
35-44	17
45-54	31
55-64	9
>65	3
Marital status	
Single	41
Married	45
Divorced	9
Widowed	5
Level of education	
University	34
College	19
Secondary	39
Primary	8
Sector in which respondent is employed	
Public	49
Private	51
Income	
Up to 300e	52
300-500e	28
501-1000e	16
More than 1000e	4

Source: Research by authors

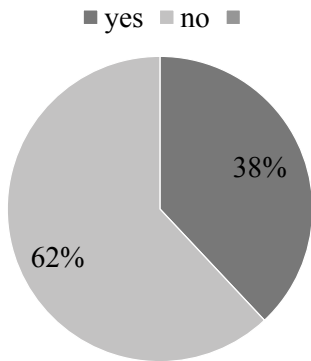
Based on the data presented in Table 2, it can be noticed that, from the point of view of the gender structure, the female population (59%) has a higher share in the

sample. From the aspect of age structure, respondents aged 45 to 54 years (31%) have the highest share in the sample. In terms of marital status, 45% of respondents are married, while from the aspect of education level, those with completed secondary school (39%) are dominant. A large number of respondents are employed in the private sector (51%) and those with a salary of up to 300 euros (52%) are dominant.

3.2. Research results and discussion

Researching the views of respondents on international trade chains gave the results presented in Figure 1, 2, and 3.

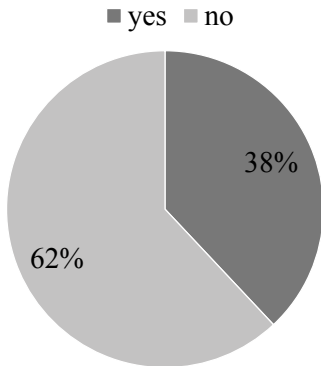
Figure 1. Place of purchase



Source: Calculation by authors

Figure 1 shows that most respondents (56%) make combined purchase (both in domestic and foreign trade chains), 32% buy in domestic, while only 12% buy in international trade chains.

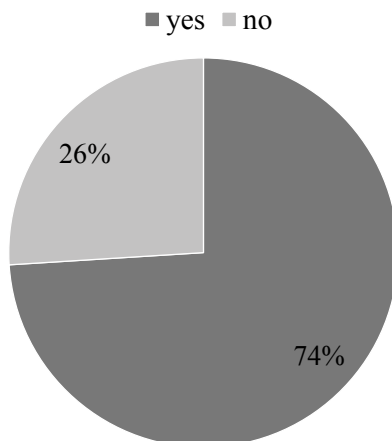
Figure 2. Change in buying habits



Source: Calculation by authors

Figure 2 shows that 38% of respondents changed their buying habits with the arrival of international trade chains, while most (62%) did not change this habit.

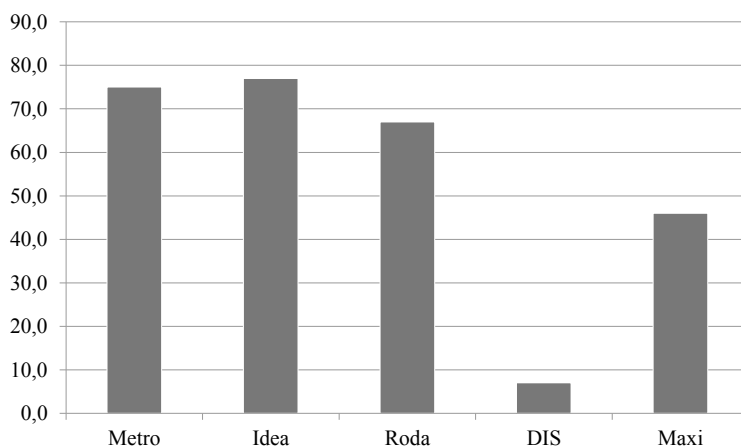
Figure 3. Novelties in the business of international trade chains



Source: Calculation by authors

Figure 3 shows that 74% of respondents consider that international trade chains introduce novelties into business, while 26% consider the opposite. Figure 4 shows how respondents perceive existing trade chains (both domestic or foreign).

Figure 4. Perceptions of respondents about existing trade chains (% of respondents who perceive trade chains as foreign)



Source: Calculation by authors

The figure shows that Idea and Metro (by 77% and 75% of respondents) are rated as foreign trade chains, Roda by 68%, Maxi 45%, and DIS (as a domestic trade chain) was by a certain number of respondents (7 %) rated as a foreign trade chain.

Descriptive statistics gives results that describe the satisfaction of the respondents with the quality of products, services, and prices (from the lowest grade of 1 to the highest grade of 5, using the Likert scale in the survey questionnaire). These results are shown in Table 3.

Table 3. Descriptive statistics for certain dimensions of operations of international trade chains

		Satisfaction with product quality	Satisfaction with service quality	Satisfaction with prices
N	Valid	300	300	100
	Missing	0	0	200
Mean		3.67	3.69	3.06
Median		4	4	3
Mode		4	4	3
Std. Deviation		0.777	0.87	1.003
Minimum		1	1	1
Maximum		5	5	5

Source: Calculation by authors

Based on the results of arithmetic mean and standard deviation, one can notice that the quality of services has the highest values ($M = 3.69$), with the lowest standard deviation ($SD = 0.87$), which means that there is the highest degree of agreement among respondents. The lowest value is obtained with price ($M = 3.06$), with the highest value of standard deviation ($SD = 1.003$), which means that there is the highest degree of disagreement among respondents. In other words, the results show that respondents in the random sample are most satisfied with the quality of services.

The research question opened in the paper is whether and to what extent socio-cultural factors influence business internationalization of retail chains. In further research, this impact will be tested from the point of view of changes in shopping habits (by the arrival of international trade chains) under the influence of gender, age, educational structure, income, etc. or different issues that were the research subject and to which respondents gave answers.

By applying correlation and regression analysis (dependent variable is a change in buying habits), the results presented in Tables 4 and 5 have been obtained.

Table 4. Correlation analysis

		Change in habits	Gender	Age	Marital status	Level of education	Income
Pearson Correlation	Change in habits	1.000	-.108	.062	-.060	.328	-.322
	Gender	-.108	1.000	.072	.226	-.008	-.104
	Age	.062	.072	1.000	.673	.348	.119
	Marital status	-.060	.226	.673	1.000	.156	.154
	Level of education	.328	-.008	.348	.156	1.000	-.481
	Income	-.322	-.104	.119	.154	-.481	1.000
Sig. (1-tailed)	Change in habits		.031	.143	.149	.000	.000
	Gender	.031		.106	.000	.446	.036
	Age	.143	.106		.000	.000	.019
	Marital status	.149	.000	.000		.003	.004
	Level of education	.000	.446	.000	.003		.000
	Income	.000	.036	.019	.004	.000	

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

Table 5. Regression analysis (dependent variable is a change in buying habits)

Model B		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		Std. Error	Beta			
1	(Constant)	1.829	.146		12.544	.000
	Gender	-.116	.055	-.118	-2.106	.036
	Age	.030	.027	.090	1.139	.256
	Marital status	-.053	.045	-.088	-1.174	.242
	Level of education	.095	.034	.195	2.819	.005
	Income	-.132	.037	-.237	-3.596	.000

Source: Calculation by authors

Table 4 shows significant correlation between changes in buying habits (due to the arrival of international trade chains) and level of education, on the one hand, and changes in shopping habits and income, on the other. In the first case, correlation is positive, and in the second negative, which means that income reduction increases the possibility that consumers will change their shopping habits. Negative correlation exists between changes in shopping habits and gender structure. With other variables tested (age, marital status), there is no significant correlation between them and the dependent variable, which is confirmed by the results of regression analysis (Table 5). The regression model shows the influence of different variables on changes in shopping hab-

its, with the same statistical significance of all independent variables (Sig. <0.05). Since gender, level of education, and income are independent variables that have statistical significance in this regression model, it can be concluded that they have an impact on the changing buying habits as dependent variable. Other variables do not have a statistically significant impact on changing shopping habits. In this way, the first and second hypotheses established in the research have been proven, i.e. that socio-cultural factors influence trade internationalization, with their influence different.

The conducted research and the obtained results have certain theoretical and practical contribution in analyzing the socio-cultural factors of trade internationalization, with a special focus on the Serbian market. Also, conducted research can be a good indicator to international trade chains when entering the Serbian market. However, this research has some limitations. First, the size of the sample, and therefore the number of observations, is relatively small. Second, the research concerned only the region of Southeast Serbia. Third, the obtained research results and confirmation of the hypotheses refer only to the observed research sample. Fourth, only employed consumers are surveyed. The limitations defined can be the subject of further research.

4. CONCLUSION

Trade internationalization, in particular retail, has been a popular research subject at the end of the last and the beginning of this century. Besides the increased research interest, internationalization becomes the imperative of trade and retail chains. This brings with it a number of questions and dilemmas, one of which is the influence of various factors on business internationalization of trading companies. In this context, it is possible to talk about different political, economic, socio-cultural, and technological factors. The research subject in this paper are socio-cultural factors of trade internationalization. The theoretical part of the paper presents various aspects covering these factors. The practical part of the paper presents the research results, using the survey methodology that included 300 respondents on the territory of Southeast Serbia. The analysis shows that a small number of respondents changed shopping habits after the arrival of international trade chains, that novelties are introduced into business, and that consumers in the vast majority of cases perceive the existing international trading chains as foreign. By applying the regression analysis, it is concluded that the changes in shopping habits are under the biggest impact of gender, marital status, and income. Other variables tested do not show statistical significance. In this way, the hypotheses set in the research are confirmed. In addition, this research can serve international trade chains when assessing socio-cultural factors on the Serbian market. At the same time, this research has some limitations, which can be the subject of further research.

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SUSTAINABILITY OF THE TRADE FLOWS: THE CASE OF BULGARIA

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Abstract

The main aim of the research is to examine the Bulgarian trade flows sustainability. Vector Error Correction Model (VECM) on a monthly data sample from the January 2009 to December 2016 illustrated co-integrating relationship between Bulgarian exports and imports. Granger causality test indicated bidirectional causality between the considered variables while the most of the adjustment was found to be governed by exports. Following univariate approach Bulgarian net export is found to exhibit ARIMA(3,0,0) process with drift. The paper brings robust estimates of Bulgarian trade flows sustainability.

Key words: Vector Error Correction Model, Imports, Exports, Bulgaria

1. INTRODUCTION

Bulgaria belongs to the group of the European post-transition countries that experienced trade and financial liberalization and eventually joined European Union (EU). Zhelev and Tzanov (2012) analysed Bulgaria's export competitiveness for the period 2002-2009 and found low value-added in exporting products, low competitiveness of the Bulgaria's exports and no technological catch-up from the integration within the EU. Bulgaria is famous for its wine and Otuzbirov et al. (2017) found that wine volumes in recent years have shown a preference for domestic entities. Popovici and Calin (2017) reported a complementary relationship between FDI and international trade openness. The low competitiveness of the Bulgaria's exports and persistent deficit in international trade raise the question of sustainability of the Bulgaria's international trade flows.

The remainder of this paper is organized as follows: Section 2 briefly summarizes existing literature related to the topic under consideration and states the research hypothesis. Section 3 presents research data and methodology, while Section 4 empirical analysis. The final section provides an overview of the main findings of the research.

2. BRIEF RELATED LITERATURE OVERVIEW

This paper follows the theoretical foundation of Husted (1992) directed towards examining intertemporal budget constraints of the country. Husted (1992) examined

the case of US and pointed out the importance of long run relationship between exports and imports. The existence of co-integration between exports and imports was examined for a different countries using various model specification. Aristovnik (2006) examined the sustainability of current account in the seventeen transition economies and found that the current account deficits of transition economies in excess of 5 percent of GDP represent external sustainability problems pointing out the need for foreign direct investments to maintain the sustainability of current account. Cuestas (2013) analysed of the sustainability of the current accounts of a group of central and eastern European countries and reported no evidence of a potential debt default in this group of countries.

Akdoğan (2014) employed linear and nonlinear unit root tests to examine current accounts of 29 countries and found threshold adjustment in the current accounts of countries with relatively higher average current account deficit. Chen (2014) considered nonlinearity stemming from structural breaks, sign nonlinearity and size nonlinearity and found no asymmetry in the response of the current account imbalance to deviations from its long-run nonlinear trend for ten European countries. Following VECM approach, Franc and Peulić (2017) examined the case of Slovenia and found bidirectional causality between exports and imports and exports was found to govern more of the adjustment when disequilibrium in the long- run relationship occurred indicated that import to export pattern dominated in Slovenian economy. Bošnjak et al. (2018) employed panel **co-integration** approach and examined the case of Croatia vis-a-vis other EU member countries. The results revealed unsustainable trade flow pattern with unidirectional causality running from imports to exports. Andre et al. (2018) found the sustainable current accounts in G7 and South Africa group of countries. Following the presented literature, the research hypothesis of the paper states that International trade of Bulgaria is sustainable.

3. RESEARCH DATA AND METHODOLOGY

The research is based on the monthly data sample on imports and export of goods and services from the January 2009 to December 2016 retrieved from the National statistical institute of Republic of Bulgaria. Descriptive statistics for the observed series is provided in Table 1.

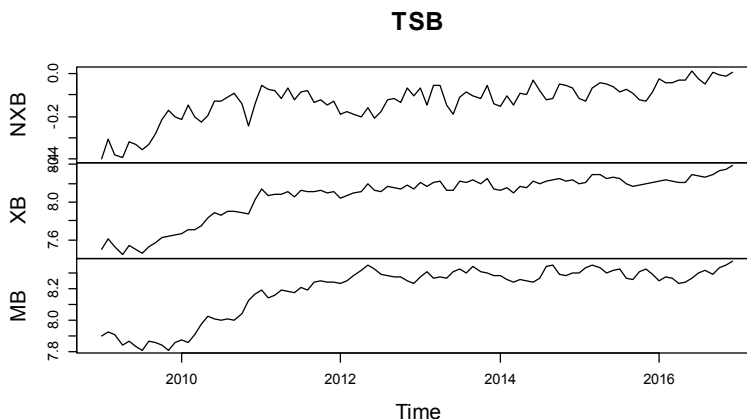
Table 1. Descriptive statistics for the considered variables

	NX	log(EXP)	log(IMP)
Min.	-0.39953	7.443	7.807
1st Qu.	-0.16363	8.035	8.158
Median	-0.11615	8.143	8.259
Mean	-0.12926	8.062	8.191
3rd Qu.	-0.06799	8.218	8.302
Max.	-0.01512	8.386	8.377

Source: own research

The descriptive statistics in Table I illustrates the negative maximum net export values amounting -0.015 while average values are negative. The development of the observed series is provided in Figure 1.

Figure 1. The net exports, exports and imports of Bulgaria



Source: own research

As illustrated in Figure 1, Bulgaria experienced the negative net exports performance during the whole of the considered time span. Firstly and following standard unit root tests (ADF, PP, KPSS) the stationarity diagnostic for the observed series is provided. Based on the results from unit root tests, various specification of the linear co-integration is tested namely, Engle and Granger (1987) and Johansen (1995) co-integration test. After obtaining the results from tests of co-integration, using Granger (1969) causality test the causality direction is examined. Eventually, following Johansen (1988, 1991) and Johansen and Juselius (1990) vector error correction model (VECM) is estimated and tested. The dynamic properties of the estimated system is presented using variance decomposition and impulse response function. The forecast error of each variable is divided into the proportions attributable to shocks in each variable in the system including its own and can be considered as an out-of-sample causality tests (Kling & Bessler, 1985). When the variable is fully forecasted from its own lagged values, all of its forecast error variance will be explained by its own shocks (Sims, 1982). Impulse response function shows the effects of shocks on the adjustment pattern of the variables.

VECM specification for the two time series integrated to the same order is given by the equation (1):

$$\Delta x_t = A'X_{t-1}(\beta) + u_t \quad (1)$$

Where:

x_t - p - dimensional $I(1)$ co-integrated time series with co-integrating vector, β , A - coefficient matrix $k \times p$ | $k = p + 2$.

$(X_{t-1}(\beta))$ - regressor and a $k \times 1$ matrix is given by the equation (2) :

$$X_{t-1}(\beta) = [1 \quad w_{t-1}(\beta) \quad \Delta x_{t-1} \quad \cdots \quad \Delta x_{t-1}]' \tag{2}$$

The term $w_{t-1}(\beta) = \beta' x_{t-1}$ is error-correction term that needs to be stationary. The u_t - vector martingale difference sequence with finite covariance matrix as presented in equation (3):

$$\Sigma = E(u_t u_t') \tag{3}$$

Furthermore, the paper follows Box and Jenkins (1976) approach and observe Bulgaria's net export series (NX) given in the equation (4):

$$NX_t = \log(\text{EXP})_t - \log(\text{IMP})_t \tag{4}$$

Where and present exports and imports series, respectively.

4. EMPIRICAL RESULTS AND DISCUSSIONS

Following the data and methodology illustrated in the previous section of this paper, the standard unit root tests results are given in Table 2.

Table 2. Standard unit root tests results

Variable and test	Levels		First difference	
	Constant	Constant and trend	Constant	Constant and trend
ADF test	t-stat.			
	-1.452653	-1.572295	-8.184717	-8.207240
	-1.988587	-2.313864	-12.11427	-12.09815
	-3.276078	-4.581904	-10.36338	-4.059734
PP test	Adj. t-stat.			
	-1.430933	-1.540855	-8.583099	-8.552864
	-2.080604	-2.206636	-12.11326	-12.24673
	-3.055514	-4.400940	-18.98850	-20.36865
KPSS test	LM-stat.			
	0.951715	0.278798	0.159772	0.085028
	1.020697	0.266590	0.249540	0.089335
	0.937185	0.147613	0.323988	0.500000

Source: Authors.

Following the results in Table 2, Unit root tests results unambiguously indicate exports and imports series integrated of order one while net exports series is found to be stationary. Since the exports and imports series are integrated of order one, following Johansen (1995) the existence of co-integration is tested and results are summarized in Table 3.

Table 3. Johansen co-integration tests

Hypothesized No. of CE(s)	Eigenvalue	Trace Statistic	0.05 Critical Value	Prob.
None	0.173869	23.28429	15.49471	0.0028
At most 1	0.057639	5.521100	3.841466	0.0188
Hypothesized No. of CE(s)	Eigenvalue	Max-Eigen Statistic	0.05 Critical Value	Prob.
None	0.173869	17.76319	14.26460	0.0134
At most 1	0.057639	5.521100	3.841466	0.0188

Source: Authors.

The results in Table 1 show that Johansen (1995) co-integration test easily rejected the null hypothesis of no co-integration between exports and imports of Bulgaria. Additionally, Engle and Granger (1987) co-integration test is employed and results are provided in Table 4.

Table 4. Engle - Granger co-integration test results

Dependent	tau-statistic	Prob.	z-statistic	Prob.
	-4.309506	0.0041	-29.73836	0.0038
	-4.514575	0.0022	-31.18367	0.0026

Source: Authors.

Consistently with the results in Table 3, the results in Table 4 reject the null hypothesis of no co-integration and confirm the existence of co-integration between exports and imports in case of Bulgaria. To determine the direction of causality between the considered variable Granger (1969) causality test is used and results are presented in Table 5.

Table 5. Pairwise Granger Causality Tests

Null Hypothesis:	Obs	F-Statistic	Prob.
Exports does not Granger Cause imports	93	5.84957	0.0011
Imports does not Granger Cause exports		5.81359	0.0011

Source: Authors.

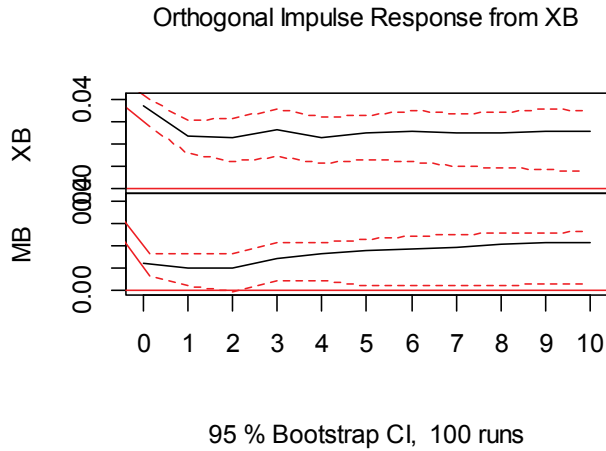
The Granger causality test results in Table 5 indicate bidirectional causality between the variable under consideration. Following the co-integration tests results, VECM is specified and estimates are summarized in Table 6.

Table 6. VECM relationship estimates for the international trade flows of Bulgaria

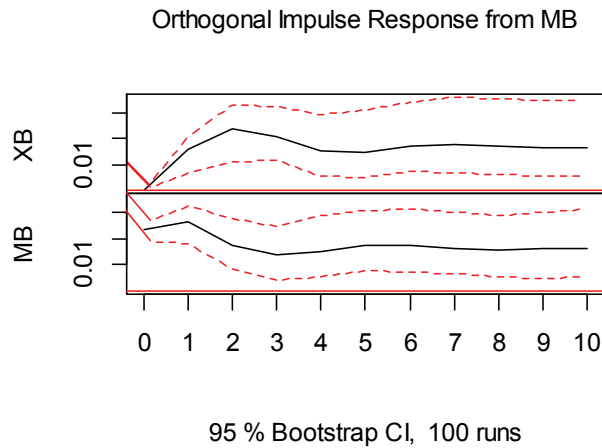
Variables	$\Delta \log(\text{EXP})_t$	$\Delta \log(\text{iMP})_t$	
Intercept	-0.1307** (0.0639)	0.1139** (0.0460)	
Trend	0.0002 (0.0003)	-0.0005** (0.0002)	
w_{t-1}	-0.2322** (0.0952)	0.1520** (0.0685)	
$\Delta \log(\text{EXP})_{t-1}$	-0.3588*** (0.1259)	-0.2571*** (0.0905)	
$\Delta \log(\text{EXP})_{t-2}$	-0.1768 (0.1197)	-0.0809 (0.0860)	
$\Delta \log(\text{EXP})_{t-3}$	0.0485 (0.1084)	0.0079 (0.0780)	
$\Delta \log(\text{iMP})_{t-1}$	0.4156** (0.1586)	0.2753** (0.1140)	
$\Delta \log(\text{iMP})_{t-2}$	0.3964** (0.1552)	-0.1535 (0.1116)	
$\Delta \log(\text{iMP})_{t-3}$	0.2657(0.1694)	0.0523 (0.1218)	
AIC: -1255.201	BIC: -1207.287	SSR: 0.1935115	
Co-integrating vector: (1, -1.052521)			
Diagnostic tests			
$\Delta \log(\text{EXP})_t$		$\Delta \log(\text{iMP})_t$	
Breusch-Godfrey Serial Correlation LM Test statistic: 0.011714	p-value: 0.9884	Breusch-Godfrey Serial Correlation LM Test statistic: 0.179486	p-value: 0.8360
Heteroskedasticity Test (ARCH) statistic: 0.007343	p-value: 0.9319	Heteroskedasticity Test (ARCH) statistic: 1.526622	p-value: 0.2199
Jarque- Berta Test statistic: 0.489166	p-value: 0.783031	Jarque- Berta Test statistic: 2.722114	p-value: 0.256390

Source: Authors. Notes: Estimations are performed using the Maximum Likelihood (ML) estimator; standard errors are in brackets; ***, **, denote significance at the: 1% and 5% significance level, respectively.

The diagnostic tests of the model estimated in Table 6 show no model misspecification. The results in Table 4 indicate the existence of long-run equilibrium between exports and imports in case of Bulgaria. However, the state of equilibrium in the Bulgarian case shows the higher imports over exports and therefore the persistent and unsustainable deficit of international trade in Bulgaria. The most of the adjustment between the considered variables is governed by exports. Hence, when disequilibrium occurs it will be adjusted within five months. The adjustment coefficient in the imports equation is positive and therefore export equation is accepted. Impulse response function is provided in in Figures 2 and Figure 3.

Figure 2. Orthogonal impulse response from exports (XB)

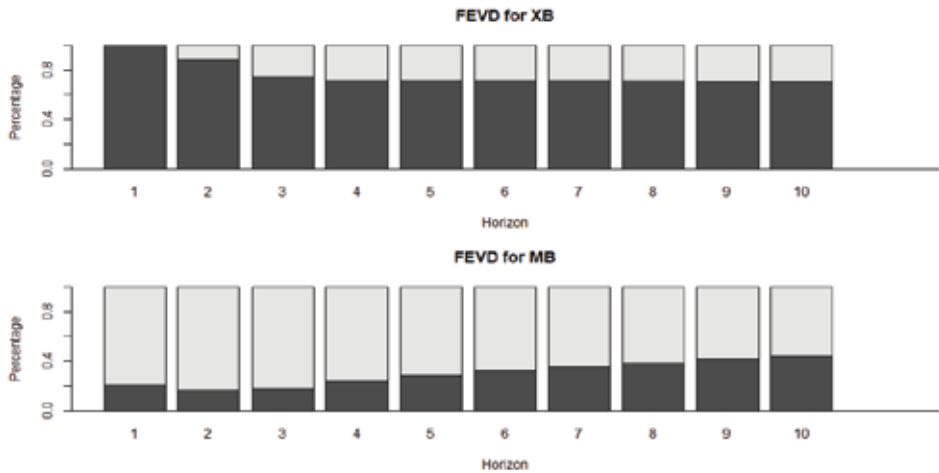
Source: own research

Figure 3. Orthogonal impulse response from imports (MB)

Source: own research

Impulse response function in Figure 2 and Figure 3 illustrates one standard deviation shock. The response is presented for the period of ten quarters. Following the Figure 2 and Figure 3, only positive impact is found in the exports equation, meaning that changes in imports result in positive reactions in exports. In the imports equation, positive impact of shocks in exports are recorded as well. Forecast error variance decomposition is illustrated in Figure 4.

Figure 4. Forecast error variance decomposition for (FEVD) for exports (XB) and imports (MB)



Source: Authors.

Forecast error variance decomposition in Figure 4 for the imports equation shows more sizable effects of exports on imports variation than other way around. Furthermore, the dynamics of net export series of Bulgaria is observed. Following unit root tests results in Table 1 the net exports series in case of Bulgaria is found to be stationary. Therefore, following Box and Jenkins (1976) approach ARMA model specifications are estimated and tested. Following the Akaike Information Criterion (AIC) AR(3) model is found to be the best fitted model to explain dynamics of net exports in Bulgarian case. Estimated AR(3) model is summarized in Table 7.

Table 7. AR(3) estimates for the net exports of Bulgaria

Variable	Coefficient	Std. Error	t-Statistic	Prob.
C	-0.081296	0.036167	-2.247783	0.0270
AR(1)	0.634219	0.079532	7.974385	0.0000
AR(3)	0.232449	0.075341	3.085282	0.0027
R-squared	0.763961	Mean dependent var		-0.121689
Adjusted R-squared	0.758715	S.D. dependent var		0.081254
S.E. of regression	0.039913	Akaike info criterion		-3.572518
Sum squared resid	0.143372	Schwarz criterion		-3.490821
Log likelihood	169.1221	Hannan-Quinn criter.		-3.539531
F-statistic	145.6462	Durbin-Watson stat		1.992260
Prob(F-statistic)	0.000000			
Inverted AR Roots	.91	-.14+.48i	-.14+.48i	
Diagnostic tests				
Breusch-Godfrey Serial Correlation LM Test statistic: 1.472231		p-value: 0.2350		
Heteroskedasticity Test (ARCH) statistic: 0.000739		p-value: 0.9784		
Jarque- Berta Test statistic: 1.064023		p-value: 0.587422		

Source: Authors.

The results in Table 7 indicate no misspecification of the estimated model for the Bulgaria's net exports. Conclusively, the results indicate persistent and unsustainable international trade deficit in case of Bulgaria. The persistent trade deficit is a serious macroeconomic issue by itself. In addition, if the deficit was financed with foreign debt the situation might be even more severe. However, the role of foreign debt needs to be examined by further research.

5. CONCLUSION

There are several conclusions that can be drawn out of the research presented in this paper. Firstly, the research results in this paper does not support the hypothesis of sustainability of international trade flows in case of Bulgaria. The long run relationship between exports and imports that resulted in international trade deficit was found and confirmed. The relationship is stable in a long run indicating equilibrium state and persistent deficit in international trade of Bulgaria. When disequilibrium occurred the adjustment towards long run relationship was governed by exports and adjusted within five months.

The issue of persistent deficit in international trade that violates intertemporal budget constraints as found in case of Bulgaria is a severe issue for any country. The results raise the question of financing of the international trade deficit in Case of Bulgaria and point out the need for measures to increase the competitiveness of the Bulgaria's economy.

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SUSTAINABILITY IN INTERNATIONAL FOOD RETAILING: THE CASE OF WESTERN BALKANS

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Abstract

Sustainability in international food retailing represents one of the imperatives of trade activity and modern commercial business. The subject of this paper is the analysis of how significant the implementation of sustainable technologies in retailing is in the Western Balkans (WB) and what their impact is on the customer satisfaction. The aim of this paper is to define and propose models that will contribute to sustainable development in food retailing, by analysing and defining the most important indicators of sustainability in WB retail sector. The theoretical research pointed to the importance of sustainability in the retail sector, with particular reference to the implementation of international food safety standards: HACCP, ISO22000, etc. The empirical research was conducted on a sample of 30 retail managers and 91 customers to test whether sustainability indicators such as composition and origin of raw materials, energy consumption, carbon footprint, water consumption, waste reduction, reverse logistics, eco-friendly packaging, affect the level of satisfaction of ecologically conscious consumers and represent an advantage of a retail chain in building long-term relationships with consumers (CRM), and thereby increase sales. The obtained results indicate a statistically significant impact of these indicators and can serve as a guideline for retailers on global market to gain knowledge about the indicators that should be developed and optimized for the purpose of market-justified sustainability. The guidelines for future research are listed in the paper.

Key words: Retailing, Sustainability, Food Retailing, Customer Satisfaction, Supply Chains, Western Balkans

1. INTRODUCTION

Increased environmental awareness, care for environment, health and safety of customers lead to an increase in demand for eco-products or sustainable products. Some research (Kopić et al., 2008) conducted on the global market show that world demand for eco-food products grows at an annual rate of as much as 20%, while it is estimated that retail sales of eco-products annually exceeds 100 billion US dollars (US\$), with the trend that 93% of global customers expect on the market exclusively those products that respect social and environmental issues.

This trend is particularly evident in developed market economies and EU countries where quality evolved over time from elementary quality features such as durability, functionality and usefulness, through the process of servicing, guarantees and claims to the ultimate sustainable consumption and eco-quality (Marsden, Smith, 2005). This means that today, in addition to functional characteristics, customers are increasingly oriented towards purchasing products for sustainable reasons. Value for customers is not only functional and structural components of quality, nor the quality of service, supply or delivery, but the value of product extends to the area of eco-quality and resource sustainability for future generations (Dobson, 2007).

In the traditional approach to product creation, standard product attributes such as price, performance characteristics and safety are taken into account. Given the current great competition, a product can survive on the market if it has, besides traditional characteristics, eco-friendly features such as being healthier, eco, organic, etc. (Krstić, Vučić, 2004). In order to achieve ecological product performance, it is necessary to ensure sustainable development of the environment and to minimize emissions of harmful gases, liquids and other pollutants into the environment, take into account the composition of raw materials, reverse logistics, the production of biodegradable packaging, water consumption, electricity, etc.

This problem is especially in the focus of retailer management, because it is directly reflected in the size of retailer's turnover. The crucial question is whether customers recognize sustainable products and whether such products increase the frequency of purchases and final consumption. In developed market economies, the studies confirm these assumptions and show that customers prefer eco-friendly behaviour and increasingly choose eco-products for their consumer baskets (Lee et al. 2012).

In that regard, *the subject of this paper* is the analysis of sustainability of the retail sector in the Western Balkans region. *The aim of the paper* is to develop a model that demonstrates the degree to which sustainability indicators actually affect customer satisfaction and contribute to the profitability of retailers. Theoretical research should emphasize the importance of sustainability in the retail sector, with particular reference to the application of international food safety standards. Empirical research was conducted on a sample of 30 retailer managers to test whether sustainability indicators affect the level of satisfaction of environmentally aware customers and represent the advantage of the retail chain in building long-term relationships with customers.

The paper comprises five sections. After the introduction, the *Review of Literature* presents the most important theoretical perspectives on how significant the concept of sustainability is in food retailing, it identifies international food safety standards and analyses the most important sustainability indicators in the retail sector. The third section presents the *Methodology* with the research hypotheses, the method used in the research, the sample, procedure and methods of testing the set hypotheses. The section named *Results* presents the results of the conducted tests, while the section *Discussion* proposes a model that will contribute to the sustainable development of food retail. The final section summarizes the conclusions of the most important results and provides suggestions for future research.

2. LITERATURE REVIEW

Sustainable consumption is one of the imperatives of modern business. Non-renewable resources are becoming more scarce, and it is likely that future generations will not be able to use them in the existing scope and form. Therefore, an increasing number of academic studies has been devoted to the issues of sustainability in production, placement and consumption.

An ecological or sustainable product is produced through a system of renewable energy sources, ecological farming and production, without the use of chemicals, pesticides, additives, emulsifiers, artificial components, raw materials and fertilizers (Charter, 2001). Sustainable product is considered any new product whose immediate use and consumption does not disturb nor pollute the environment (e.g. electric cars, solar panels, etc.). The negative impact of products on the environment and the health of consumers arises from their production (chemicals, GMO, additives, emulsifiers E102, E103, E104, etc.), use (fuel consumption, electricity consumption, CO₂ emissions) and disposal (packaging, heavy metals, production systems) (Cheng, Yang, Sheu, 2014). In other words, ecological products have a less pronounced negative effect on human health and the environment compared to other products that serve the same purpose (Uščumlić and Lukić, 2012).

Sustainability is a major issue in the retail sector, especially in the global market, due to different regulations, methods and ways to use resources, etc. Research (Wiese, 2015) shows that the retail sector has to take care of the products it sells, which implies that it is necessary to know the product, on the one hand (composition, substances, method of production and packaging, etc.) and behave in an environmentally responsible way, on the other hand (method of transport, disposal of packaging and waste, consumption of electricity and water, etc.). In this context, retail sector sustainability relates to the respect of environmental attributes that represent improved factors of production, distribution, production of packaging and waste management, referring to the manner of production and composition of products, product functioning, product durability, distribution, use of products and disposal at the end of product lifetime (Ćurčić, 2003).

The degree to which product is friendly to the natural environment should be considered as twofold, from complete and renewable friendliness, to complete unfriendliness. Completely eco-friendly products are purely material products obtained from nature, which in no way negatively affect the local, regional, national and global distribution of resources and the natural environment. Such products are sustainable because they are produced on the basis of renewable resources (the principle of balance between exploitation and renewal) and as such allow at least the same level of use to future generations. On the other hand, complete unfriendliness means that the process of production, packaging and use of a product threatens the natural environment, health and safety of the immediate consumer and its environment. In reality, today's products are far from being completely eco-friendly and most of them are moderately or completely eco-unfriendly products.

Sustainability on a global market can be achieved through legal regulation and standardization on the one hand, i.e. by raising eco-awareness among producers, traders

and consumers, on the other hand. Research has shown that the implementation of the concept of sustainable production is at lower levels in the Western Balkans (WB) region than in the countries with a developed market economy. However, it has been shown that the implementation of the concept of sustainable development and the emergence of eco-products have influenced the raising of consumers' awareness of the importance of protecting the natural environment in order to improve the overall economic, social and ecological perspective (Lukić, 2012). Certainly, the accession of all WB countries to the EU will bring numerous market opportunities and standardization of eco-quality.

In the global market, sustainability is ensured by laws and standards. At EU level, eco-quality is regulated by a whole set of legal acts, directives and regulations that are integrated into the EU's initiatives named the Integrated Product Policy (IPP) and Environmental Product Policy (EPP). The development of eco-products and eco-quality in the United States market is encouraged and regulated through the Environmental New Product Development (ENPD) (Pujari, 2006). In order to respond to the stated needs for renewable resources and environmental protection, the International Organization for Standardization (ISO) has developed a whole set of standards that regulate this area by standards ISO14000 and ISO22000.

International standard of quality control and food safety – HACCP (ISO22000) is the most important for the retail sector. HACCP is a system for identifying, evaluating and controlling food safety hazards (Dillon M., Griffith, 2001). Since 2006, export of food products to the European Union market is not allowed without HACCP certification. In addition to the aforementioned standard, the food production and sale sector in the EU market is also governed by the Directives, such as: a) Directive EU 93/43 on the hygiene of foodstuffs, b) Directive EU 79/112 on labelling, presentation and advertising of foodstuffs, c) Directive EU 88/338 on flavourings and source materials for use in foodstuffs, d) Directive EU 89/109 on materials and articles intended to come into contact with foodstuffs, etc.

Given the aforementioned aspects, the standard and EU directives, and taking into account the above-mentioned theoretical considerations, the most important indicators that need to be controlled in the process of achieving sustainability of the food retail sector are related to the composition and origin of raw materials, energy and water consumption, reduction of carbon emissions, waste reduction, reverse logistics and ecological (biodegradable) packaging.

Composition and origin of raw materials implies the process of production without the use of chemicals, sweeteners, emulsifiers, additives, preservatives, and other substances and raw materials potentially harmful to health. *Energy and water consumption* refers to savings in the use of energy, water, resources and other materials, in order to enable identical levels of consumption to future generations. *Carbon emissions* is especially important in the transport and distribution of products, and it should comply with the legislation in order to clearly undertake measures for suppressing environmental incidents. *Reduction of waste* means undertaking all possible measures that limit the pollution of the natural environment in the form of packaging waste. *Reverse logistics* refers to the management of systems for the recovery, collection, recycling and

processing of used packaging and other types of waste, unused products, expired products, etc. Finally, *an ecological or biodegradable package* implies adequate selection and knowledge of the environmental status of packaging, packaging material and packaging waste.

3. METHODOLOGY

Research objective and hypotheses

Given the defined theoretical significance of sustainability and indicators of sustainability in the food processing sector, the main goal of the research is to define a model that shows the degree to which the retail sector sustainability indicators, such as: composition and origin of raw materials, energy and water consumption, reduction of carbon emissions, waste reduction, reverse logistics and ecological packaging, affect customer satisfaction and contribute to the profitability of retailers. The goal of the research is operationalized through the following hypotheses:

- H_1 – Sustainability indicators: composition and origin of raw materials, energy and water consumption, reduction of carbon emissions, waste reduction, reverse logistics and ecological packaging statistically significantly affect the volume of retailer's turnover and profitability?
- H_2 – Sustainability indicators: composition and origin of raw materials, energy and water consumption, reduction of carbon emissions, waste reduction, reverse logistics and ecological packaging statistically significantly affect the customer satisfaction in the selection of food products?

Variables

Several variables have been included in the research, on the basis of which the hypothesis would be confirmed or rejected: a) independent grouping variable is customers and retail store managers in selected WB countries (Croatia, Serbia, BiH and Montenegro), b) independent variables of the interval measurement type: composition and origin of raw materials, energy and water consumption, reduction of carbon emissions, waste reduction, reverse logistics and ecological packaging, and c) dependent variable: customer satisfaction and retailer's profitability.

Sample

The sample consists of two strata, which included retail store managers and customers. The research involved 30 retail stores managers operating on the WB market and 91 final consumers evenly distributed across selected countries. The research covered the following retailers: Delhaize Maxi, Idea, Tempo, Konzum, Metro, Spar, Bingo, Voli Trade, etc. Table 1 shows the representativeness of customers in the sample.

Table 1. Sample structure

Country	Number	Percent
Croatia	22	24.1%
Serbia	24	26.4%
Montenegro	21	23.1%
Bosnia and Herzegovina	24	26.4%
Total	91	100%

Source: Author’s calculation

Measurement procedure and instruments

The assessment of independent variables or indicators that influence the concept of food retail sustainability was examined by a questionnaire containing 6 Likert-type basic items and 18 sub-items. Respondents are divided into two strata: retailer managers and customers. The task was to express their agreement with the statements on a five-step scale: a) *for managers* - on scale of 1 to 5, how these indicators affect the size of retailer’s turnover and profitability, i.e. b) *for customers* - on scale of 1 to 5, how these indicators affect your satisfaction with the purchase and selection of food products.

Data Analysis

The data collected in the survey were processed with the SPSS20 statistical package. The obtained dimensions and responses of respondents are described by descriptive statistics. Average values, as well as deviations for each indicator, are presented. A multiple regression analysis was used to test hypotheses.

4. RESULTS

Descriptive statistics described the extent to which the respondents from the first strata – retailer managers, agree with the statement that sustainability indicators contribute to a larger volume of retailer’s turnover, a better business result, and therefore profitability. Rank 1 expresses the lowest, while rank 5 expresses the highest level of agreement. Descriptive indicators are provided in Table 2.

Table 2. Ranking results for the stratum of managers

No.	Indicator	Min.	Max.	Mean	St. deviation
1	Composition and origin of raw materials	2.00	5.00	4.8	1.93753
2	Energy and water consumption	1.33	4.33	3.8	.87976
3	Reduction of carbon emissions	1.00	3.67	3.7	.96598
4	Waste reduction	1.27	4.67	4.0	1.14281
5	Reverse logistics	1.33	4.67	4.6	1.37482
6	Ecological packaging	1.67	4.33	4.3	.897852

Source: Author’s calculation

As we can see, managers expressed the highest level of agreement for Composition and origin of raw materials used for making a product ($M=4.8$) as the most significant sustainability indicator for the realized business income (turnover) of a retailer. Reverse logistics ($M=4.6$) as well as Ecological packaging ($M=4.3$) have the inevitable impact on the size of sales. Managers think that these indicators are recognized by customers as the basis of the sustainability concept and they respond to such indicators by increased level of purchases and greater loyalty towards the selected product and retailer. Respondents attached less significance to the indicator - Waste reduction ($M=4.0$), while Energy and water consumption ($M=3.8$) and Reduction of carbon emissions ($M=3.7$) have the lowest ranks.

A multiple regression analysis was applied for testing the first research hypothesis H_1 , which, on the basis of independent variables, attempts to predict the dependent, criterion variable, which in this case is the size of retailer's turnover and profitability. The Enter method was used, which includes all the indicators in the analysis, so that all indicators start with the same initial value. Their contribution is presented in the following table (Table 3.)

Table 3. Individual contribution of the indicator to the explanation of the criterion variable

Model	Unstandardized coefficients		Standardized coefficients	T	Significance
	B	Std. error	Beta		
1 (constant)	4.532	1.583		4.542	.000
Composition and origin of raw materials	1.867**	.450	.351	2.795	.000
Energy and water consumption	.337	.589	.022	.0238	.057
Reduction of carbon emissions	.287	.531	.251	.9853	.084
Waste reduction	.227*	.698	.123	.0328	.005
Reverse logistics	.514**	.248	.247	1.572	.000
Ecological packaging	.402**	.281	.174	1.418	.001

Source: Author's calculation

* Significant at the level of 5%, ** significant at the level of 1%

The obtained results indicate that the regression model is statistically significant ($F = 4.215$, $p < 0.01$). In other words, this implies that a set of analysed sustainability indicators statistically significantly predicts the size of retailer's turnover, and therefore their profitability in the WB market. It describes 63.7% of the variance of the criteria. Having observed contributions of individual indicators, it can be seen that indicators Composition and origin of raw materials ($p = 0.000$), Reverse logistics ($p = 0.000$), Ecological packaging ($p = 0.001$) and Waste reduction ($p = 0.005$), statistically significantly determine the criterion variable. This means that with their increase, the size of turnover and profitability of retailers increases as well. According to managers, food products customers respond to eco-quality and sustainability labels, which indicates the need for a clearer emphasis on the composition and origin of raw materials on the product itself, the labelling of organic packaging, as well as informing the public about

ways to return a product, reduce waste, etc. On the other hand, indicators Reduction of carbon emissions and Energy and water consumption did not make a statistically significant contribution and, according to managers' opinion, do not have a decisive influence on the volume of turnover.

As four of the six offered indicators are statistically significant for profitability and size of turnover (purchase frequency) of retailers in the WB region, according to the manager's opinion, the first research hypothesis H_1 is accepted and it can be concluded that, overall, sustainability indicators, such as Composition and origin of raw materials, Energy and water consumption, Reduction of carbon emissions, Waste reduction, Reverse logistics and Ecological packaging statistically significantly affect the size of the turnover and profitability of retailers.

When testing the respondents in the second stratum - customers in the WB market, a multiple regression analysis was also applied. Descriptive statistics is presented in Table 4.

Table 4. Ranking results for stratum of customers

No.	Indicator	Min.	Max.	Mean	St. deviation
1	Composition and origin of raw materials	2.67	5.00	4.9	1.7521
2	Energy and water consumption	1.00	4.00	3.2	.78792
3	Reduction of carbon emissions	1.33	3.67	3.3	.84215
4	Waste reduction	1.27	4.33	4.1	1.21579
5	Reverse logistics	1.67	4.67	4.0	1.17542
6	Ecological packaging	2.67	5.00	4.7	.819752

Source: Author's calculation

As in the case of retailer managers, customers attach the highest significance to Composition and origin of raw materials ($M=4.9$), which is crucial for their satisfaction in the selection and purchase of food products. Indicators Ecological packaging ($M=4.7$), Waste reduction ($M=4.1$) and Reverse logistics (4.0) are also emphasized. A multiple regression analysis was applied to examine the impact and correlation between the mentioned indicator group and customer satisfaction. The obtained results indicate that the regression model is statistically significant ($F = 15, 964$; $p<0.01$), i.e. a set of examined indicators statistically significantly predicts customer satisfaction. Individual contributions are illustrated in Table 5.

Table 5. Individual contribution of the indicators to the explanation of the criterion variable

Model	Unstandardized coefficients		Standardized coefficients	T	Significance
	B	Std. error	Beta		
1 (constant)	3.428	1.374		3.624	.000
Composition and origin of raw materials	0.932**	.584	.452	3.541	.000
Energy and water consumption	.228	.478	.042	.0742	.074
Reduction of carbon emissions	.367	.284	.249	.8954	.091
Waste reduction	.571**	.782	.143	.04529	.001
Reverse logistics	.415*	.359	.278	1.557	.005
Ecological packaging	.8944**	.373	.187	1.358	.001

Source: Author's calculation

* Significant at the level of 5%, ** significant at the level of 1%

As the table shows, the greatest contribution ($p=0.000$) is expressed by indicator Composition and origin of raw materials. This indicator predicts the criterion variable (customer satisfaction) in the positive direction in the entire WB market. It can be concluded that customers positively respond to the clearly displayed composition and origin of raw materials in the selection of food products and that this indicator is considered the most important sustainability indicator. Eco-products can be environmentally friendly only if they are produced from renewable resources, natural raw materials and natural substances, without additives, emulsifiers, artificial fertilizers, pesticides, etc. Ecological packaging ($P=0.001$), waste reduction ($p=0.001$) and efficient reverse logistics ($p=0.005$) also have a significant contribution to the explanation of the criterion variable.

Based on the conducted testing, it can be concluded that observed sustainability indicators: composition and origin of raw materials, energy and water consumption, reduction of carbon emissions, waste reduction, reverse logistics and ecological packaging statistically significantly affect customer satisfaction in the selection of food products, and therefore the second research hypothesis H_2 is accepted.

5. DISCUSSION

The assessment of the significance of these sustainability indicators has been analysed from the point of view of retailer management and customers themselves. The reason for this two-sided analysis is the fact that the indicators are justified only if they contribute to customer satisfaction and at the same time do not pose a threat to the company's survival on the market, but rather stimulate sales growth and positively reflect on profitability. The WB market was analysed due to the diversity of countries in terms of economic development, thus achieving the objectivity of the obtained results. Based on the presented tables and the stated coefficients, it is possible to implement the following model of the influence of the sustainability indicators on the profitability of retailers (1) and customer satisfaction in the selection of food products (2):

$$y = 4.53 + 1.87x_1 + 0.34x_2 + 0.29x_3 + 0.23x_4 + 0.51x_5 + 0.4x_6 \quad (1)$$

$$y = 3.43 + 0.93x_1 + 0.23x_2 + 0.37x_3 + 0.57x_4 + 0.42x_5 + 0.89x_6 \quad (2)$$

In the above equations, y represents the dependent variable (profitability/customer satisfaction), while the variables x are independent variables, such as: x_1 - composition and origin of raw materials, x_2 - energy and water consumption, x_3 - reduction of carbon emissions, x_4 waste reduction, x_5 - reverse logistics and x_6 - ecological packaging.

These equations show that customer satisfaction in the selection of food products as well as the size of retailer's turnover on the WB market can be predicted based on most indicators included in the analysis. Acting upon the presented models is the guideline for retailer management showing them which sustainability indicators have the greatest impact on customer satisfaction and at the same time achieve better business results. Composition and origin of raw materials ($B_1=1.87$; $B_2=0.93$), Ecological packaging ($B_1=0.4$; $B_2=0.93$), Reverse logistics ($B_1=0.51$; $B_2=0.42$) and Waste reduction ($B_1=0.23$; $B_2=0.57$) are also emphasized. Such results are confirmed by numerous studies conducted on the global market (Wiese, 2015; Lee et al., 2012; Lukić, 2012; Kopic et al, 2008; Dobson, 2007). Therefore, in order to improve the overall concept of sustainability in the WB market, retailer managers should optimize, develop and promote these indicators as the most important sustainability indicators with the ultimate goal of achieving greater customer satisfaction and thereby greater loyalty.

In the observed region, this means taking the next steps: 1) producers and retailers must clearly and unambiguously indicate to customers the origin of all raw materials used for producing food products; 2) producers should prioritize the production of primary and secondary packaging made of recycled materials or biodegradable materials and renewable sources, but when it comes to secondary packaging, even retailers should develop biodegradable packaging forms; 3) by their joint action, producers and retailers need to improve the disposal system of unused products or products that have expired and minimize the cost of reverse logistics; 4) all businesses entities need to work together to promote the disposal of packaging waste, parts of products and used products, with special emphasis on non-degradable packaging (e.g., plastics: bags, boxes, etc., glass: bottles, jars, etc.), 5) general binding compliance with international standards HACCP, ISO22000 and legislation.

6. CONCLUSION

A need for researching the sustainability concept in the Western Balkans food product sector has arisen as a consequence of the fact that it is a segment of the service process that is increasingly emerging as a key competitive advantage. The aim of the research was to determine the significance of the sustainability indicators for customer satisfaction and, at the same time, the profitability of retailers. The application of multiple regression analysis confirmed the hypothesis on the statistically significant influence of the analysed indicators, which served as the basis for defining the model of the food product sustainability concept. From the perspective of the managers and customers in the WB market, Composition and origin of raw materials of food products, Ecological

packaging, Reverse logistics and Waste reduction were observed as the most important indicators. Somewhat less significance is attached to Energy and water consumption and Reduction of carbon emissions.

Defined models can have practical relevance in the retail sector, as they can provide a greater degree of satisfaction in customers who prefer ecological (sustainable) products, a sustainable way of doing business, and compliance with eco-standards. All of this directly affects the profitability and increase in sales size of retailers, manufacturers and distribution centres, and simultaneously raises quality of service in terms of more efficient satisfaction of the needs, wishes and interests of customers who prefer the consumption of sustainable food products.

The limitations of the conducted research are reflected in a small sample of respondents, as well as the fact that several WB countries were analysed, only one (retail) sector and six basic indicators. Therefore, as a guide for future research, a larger sample of respondents should be included, perform comparison with the EU/non-EU countries and analyse the particular significance and impact of individual factors within the observed indicators.

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THE IMPORTANCE OF NEGOTIATION ON THE EXPORT COMPETITIVENESS OF CROATIAN RENT-A-CAR SECTOR¹

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Abstract

This study examines business and international negotiation which reflect on export competitiveness of selected parts of Croatian service sector. The object of research is service sector with special emphasis on Croatian rent-a-car business. Croatian tourism activity expanded a lot year after year. The expansion of Croatian tourism provided key opportunities for tourism depending business like rent-a-car services that operate in Croatia. This study provides answers on what clients appreciate/want and how to negotiate effectively within car rental services in Croatia. The methodology is based on the primary research of a group of 154 clients of selected rent-a-car company located on the airport of Krk in year 2018. The main aim of the study is to identify the optimal verbal, non-verbal communication and negotiation techniques to achieve higher level of (export) competitiveness. The results of the study could be very useful for representatives, management and employees of Croatian and EU rent-a-car sector.

Key words: Competitiveness, export, service sector, rent-a-car sector

1. INTRODUCTION

Negotiation represents a communication process that strives to resolve the interests of two reasonable negotiating parties. For successful negotiation, it is necessary to have excellent knowledge of the matter to negotiate in order to reach an agreement that would satisfy both parties. This paper thesis deals with all aspects of negotiation that are crucial to the overall business process. The focus is on the success of business operations in which the most important characteristic is the well-known communication skills (Tomašević Lišanin, 2010.)

One of the aspects of effective business negotiation and communication is negotiation setting.

¹ Research has been fully supported by the University of Rijeka under the project number 16.02.2.2.01 and 13.02.1.3.13.

Mayfield et al. (1998) argue that in many cases location favors one side over the other, and the host company has many advantages, e.g. relating to greater control over the negotiation. For rent-a-car companies, all of business activities are done in service provider office which can lead in greater negotiation advantage. Moreover, the issue of time could be one of the important factors of successful negotiation. High time pressure resulted in more and larger concessions, concessions that were also more consistent with negotiator preferences, than offers made under low time pressure (Stuhlmacher, A. and Champagne, 2000). If employee in car rental services is aware of this factor, efficient negotiation is likely to be achieved.

Selling personnel in car rental companies should be aware of negotiation issues which can occur during selling procedure. The study showed that the greater the number of issues under negotiation, the worse negotiators felt about the outcome, the reason being that the greater the number of issues, the better possible outcomes were envisioned by negotiators. This also meant that greater numbers of outcomes were not realised, and negotiators consequently felt dissatisfied (Naquin, 2003). Car rental companies in Croatia are often part of international negotiation. Tourists/Businessmen from EU and other countries often use services of Croatian car-rental companies. Therefore, increased awareness of cross-cultural differences could be advantage in verbal and nonverbal communication with foreign clients. Different types of behaviors and their perceived ethicality has also interested several scholars (Volkema and Leme Fleury, (2002); Volekma (1997); Volkema (1998); Zarkada Fraser and Fraser (2001)) focusing primarily on negotiation tactics. Other aspects of Hofstede's well-known framework have also been investigated. E.g., high power distance cultures have been found to spend less time compromising.

Good communication skills are fundamental for good negotiating. A good negotiator should have a wide vocabulary and be well versed in all segments of business to better present his / her side. Poor communication can lead to business interruptions, and the misunderstanding between the two sides. Good communication is the key element for reaching an agreement in business. In each negotiation, the cost of time, energy and resources should be rationally allocated. In the last few years, rent a car market, brings great income to the Croatian economy, while in the rest of the EU this growth trend has started much earlier (Lewicki, Saunders, Barry, 2009.).

This paper analyzes the importance of verbal, non-verbal negotiation skills of employees within rent-a-car sector in Croatia. In order to increase export competitiveness of rent-a-car-company, companies should be aware of selling and negotiation techniques. These negotiation and communication techniques can be absorbed from business experience but from employee's education as well. Successful implementation of negotiation and communication techniques lead to increased productivity of employees in car-rental sector. Higher productivity boosts the export competitiveness of car-rental sector.

Within the framework of the defined research problem, the main hypothesis of the paper is constructed, namely, that it is possible to assume that the implementation effective negotiation and communication skills increase export competitiveness of car rental service as the representative of Croatian service sector.

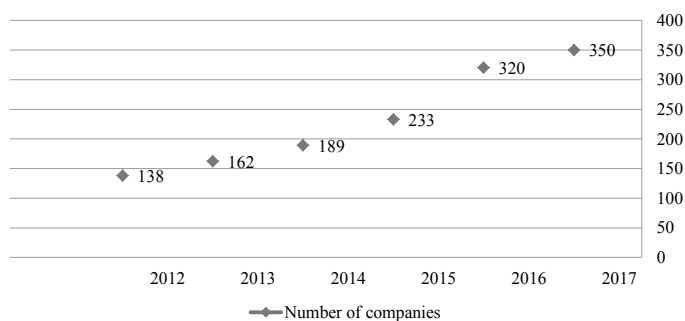
In this relation, the basic objective of the research is to justify the importance of verbal and non-verbal communication skills of negotiation in doing business within Croatian rent-a-car business and propose measures and activities for the improvement of export competitiveness in accordance with the results. Due to the small number of studies which analyze economic performance and negotiation techniques in rent-a-car sector in Croatia, the scientific contribution of this study is visible. The scientific contribution includes demonstrate the most adequate business scenarios for efficient communication and negotiation with clients of car rental companies in Croatia.

The paper consists of four systematically interrelated parts. After the Introduction, the second part of the paper presents analytical framework of Croatian rent-a-car business. The third part includes the results of conducted research. The final part comprises proposals, recommendations and conclusions.

2. THE ANALYTICAL FRAMEWORK OF CROATIAN RENT-A-CAR SECTOR

An overview of the business activities of rent-a-car sector in the Republic of Croatia from year 2012 to 2017 is given in the following text. Number of companies, profit margin, number of employees, average costs of employees of total 350 rent-a-car companies in Croatia will be analyzed in following section. The rent-a-car companies were selected in accordance with NACE rev. 2 Division 77, Group 77.1, Class 77.11 (Renting and leasing of cars and light motor vehicles). The following Figure 1 shows number of rent-a-car companies in the Republic of Croatia.

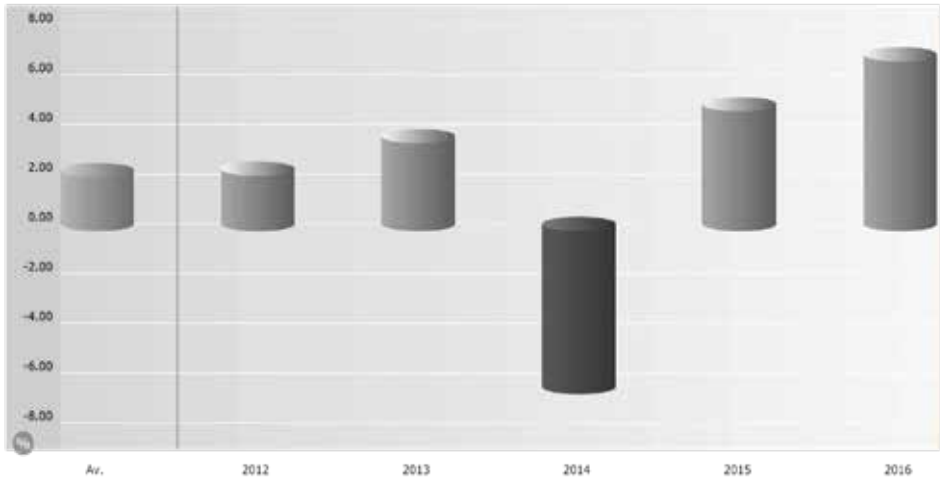
Figure 1. Number of rent-a-car companies in Croatia (2012-2017)



Data source: Amadeus, 2018

Figure 1 indicate upward trend in number of rent-a-car companies in Croatia. It can be concluded that this market recorded visible expansion. If we observe start and the end of observed period, we can stress out that the numbers doubled. It can be added that the expansion of Croatian tourist sector had big impact on the development of rent-a-car sector. Next figure shows profit margin (%) of rent-a-car companies in Croatia from period 2012 to 2016.

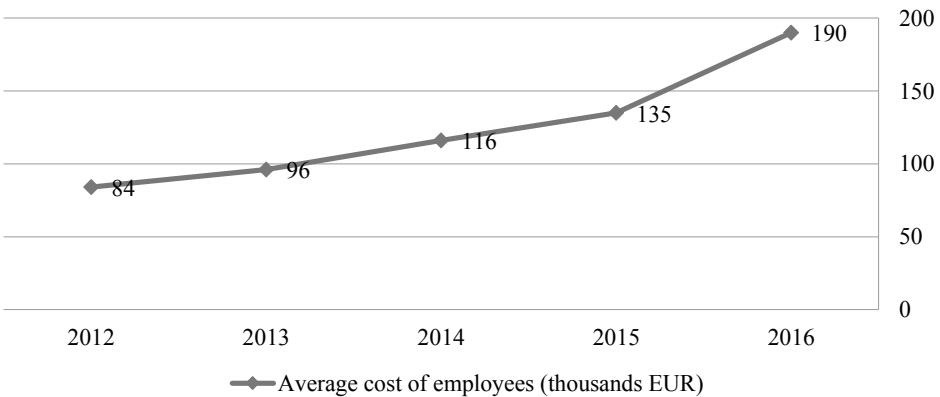
Figure 2. Profit margin of rent-a-car companies in Croatia (2012-2016)



Data source: Amadeus, 2018

Figure 2 implies on positive trend of profit margin except year 2014 which recorded sharp decline. It can be concluded that year 2014 was year of instability for rent-a-car sector in Croatia. At this period, rent-a-car companies faced higher financial and other expenses that operating revenues. Rent-a-car companies recorded average more than 2% profit margin level of the observed period. Following Figure 3 illustrates average costs of employees of rent-a-car companies in Croatia. The observed period is from year 2012 to year 2016.

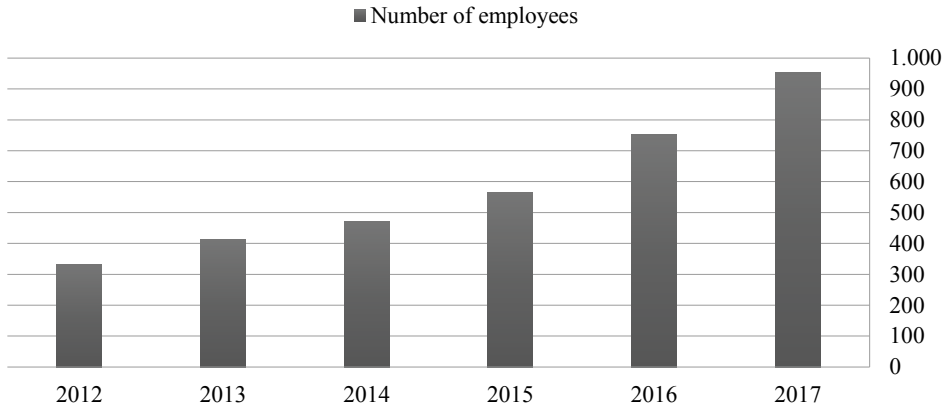
Figure 3. Average cost of employees of rent-a-car companies in Croatia (2012-2016)



Data source: Amadeus, 2018

It can be concluded that average cost of employees increased over the period. One of the reasons is higher wages due to the expansion of rent-a-car market. The sharpest increase of average costs of employees in Croatian rent-a-car market was recorded in year 2016 while smallest was recorded in year 2012. Another reason for this upward trend is increasing number of new employees of Croatian rent-a-car sector. These numbers are justified within Figure 4.

Figure 4. Number of employees in Croatian rent-a-car sector from 2012 to 2017



Data source: Amadeus, 2018

Figure 4 indicates positive trend of hiring employees in Croatian rent-a-car sector. Higher demand from tourism sector stimulated higher level of employment within rent-a-car companies. The highest level of employment was recorded in year 2017 while the lowest employment characterized year 2012.

3. THE RESULTS

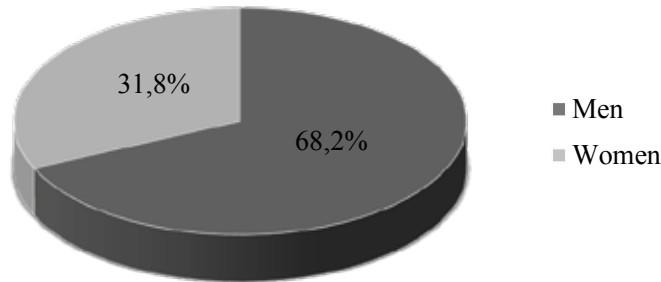
This section presents the results of a survey conducted in one rent-a-car company² which operate 8 years on Croatian rent-a-car market. In rent a car, there are 4 full-time employees and 6 seasonal workers in 3 Croatian cities. Rent a car initially had only 10 vehicles, while in 2014 it has increased to 40 vehicles and in 2018 the number of vehicles is 200. This rent a car will increase the number of reservations by 100% which will make them more competitive on the market.

The survey was conducted within the second half of 2018. 154 Clients had been interviewed through an interview. The main purpose of research was to examine the influence of communication skills on car rental. A questionnaire consisting of 16 questions was made. Two types of questions were made: multiple choice questions and rating

² Due to the business secrecy, the name of the company cannot be published.

scale questions. The survey was conducted at the one Croatian airport of Krk. The methodology was based on the methodology and results of previously conducted research (Galović et al. 2016, 2017; Bezić et al. 2016). It should be noted that these results can be used by business decision makers in order to increase awareness of the importance of the client's opinion and thereby to improve the employees' efficiency in verbal and non-verbal communication.

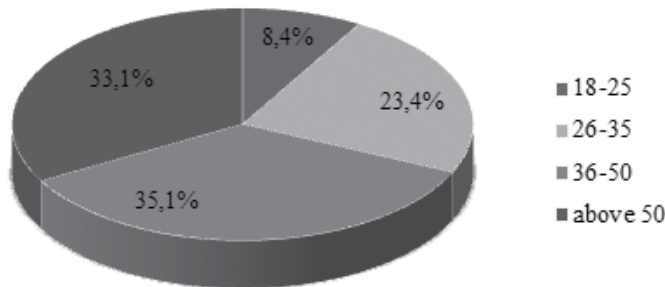
Figure 5. Structure of respondents by sex



Source: Prepared by the author

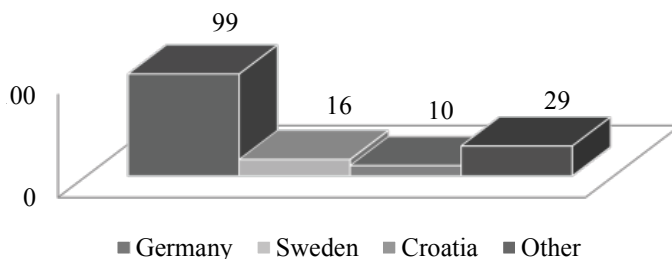
Figure 5 shows the structure of the respondents by sex. According to the latest data from the Central Bureau of Statistics, there were more than two million drivers in Croatia in 2015 and 59,5% of them were males. Following a survey of 154 respondents, there were 105 men and 49 women confirming the thesis that there were more male drivers than women.

Figure 6. Structure of respondents by age



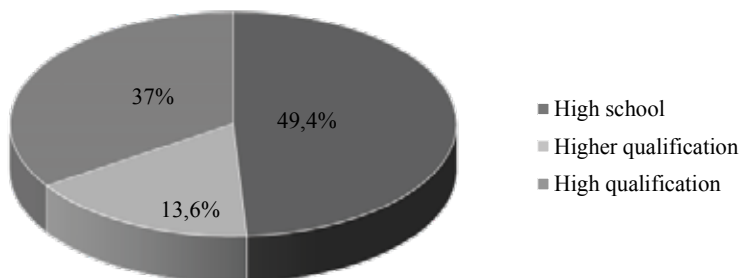
Source: Prepared by the author

The figure shows the structure of respondents by age groups. It is evident that most drivers belong to the age group between 36 and 50 (54) which is not different from the Croatian average, according to which the largest number of drivers is in the age group between 35 and 44 years. 51 respondents belong to the age group 36 to 50 years and 36 respondents in the age group 26 to 35 years. The least drivers were in the age group of 18 to 25 years, only 13 of them.

Figure 7. Structure of respondents by place of residence

Source: Prepared by the author

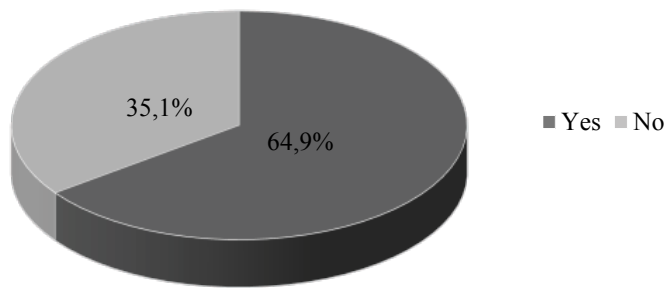
According to the conducted survey, the largest number of respondents came from Germany (99) and that's a 2/3 of respondents. Following countries are Sweden with 16 respondents and Croatia with 10 respondents. The states with under 5 clients are listed in "Other": Austria, Belgium, Denmark, Estonia, Finland, France, Ireland, Latvia, Malaysia, Hungary, The Netherlands, UK and Switzerland. The results show that respondents come from all parts of Europe, and beyond.

Figure 8. Structure of respondents by education level

Source: Prepared by the author

Most respondents have completed high school (76) which is almost half of the respondents. 57 respondents stated that they have high qualifications, and 21 responded that they have a higher qualification.

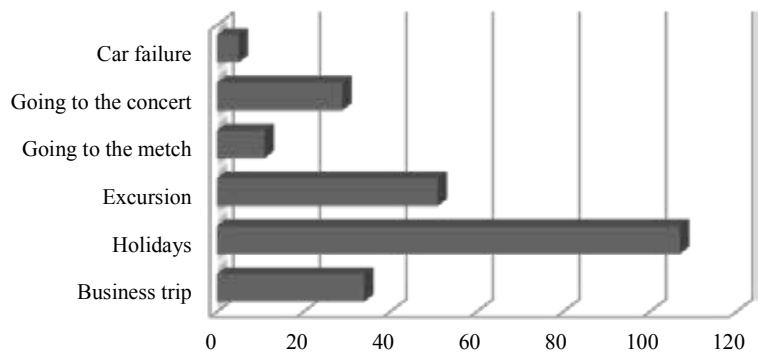
Figure 9. Structure of the answer to the question: “Have you ever rented a car before?”



Source: Prepared by the author

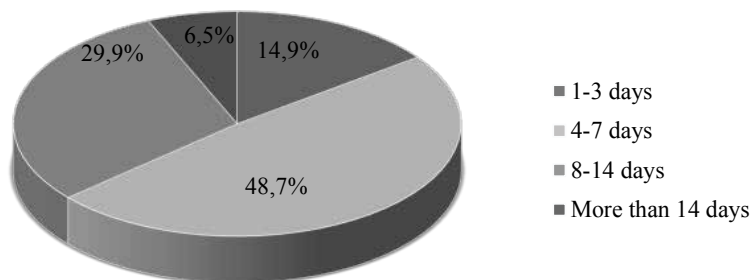
100 respondents, 2/3 of them had already rented a car, while the 54 of them rented a car for the first time. The number of people who rented a car for the first time tells us about the increase of car rentals. In 2017 there were 3032 reservations, which is about 50% more than in 2016.

Figure 10. Structure of the answer to the question: “What is the reason for your car rental? (Possible more correct answers) “



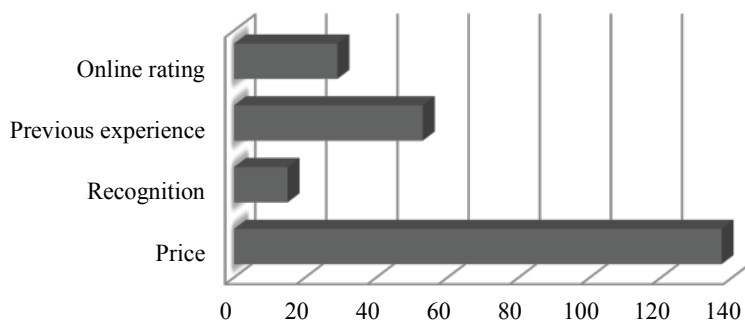
Source: Prepared by the author

The most common reason for renting a car is the summer vacation (107 respondents). 51 respondents answered „excursion “, while 34 of them had a business trip. Other respondents rented cars for going to a concert or a game or had a car failure.

Figure 11. Structure of the answer to the question: "For how long do you rent a car?"

Source: Prepared by the author

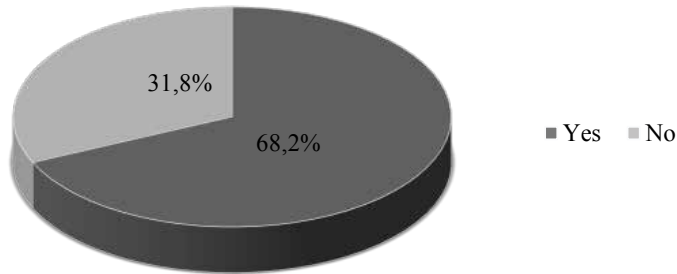
According to the survey, most people rent a car for 4-7 days (75 respondents). 46 respondents rented a car for a period of 8 to 14 days. A small number of respondents (23) rented a car for 1 to 3 days, while only 10 people rented a car for more than 14 days.

Figure 12. Structure of the answer to the question: "What was the reason to rent a car in this rent-a-car company? (Possible more correct answers)"

Source: Prepared by the author

The most respondent (137) answer that the main reason for renting a car in rent a car company was low price. 53 respondents said the reason was the previous rental experience. 29 participants answered „online rating“and 15 of them answered „recognition“.

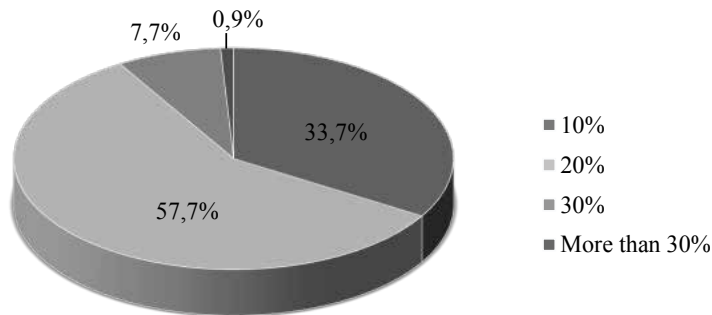
Figure 13. Structure of the answer to the question: “Could you negotiate the rental price?”



Source: Prepared by the author

Out of 154 respondents, 105 of them, answered that they were negotiating the rental price of the car, while 49 of them did not negotiate the rental price. Rent a car company objective is to rent cars at higher price, so the customers who do not negotiate the price are much more desirable. Because of customers who like to negotiate prices, it is very important to set the lowest price under which a car cannot be leased. Sellers should be skilled negotiators and also have to know the client’s language in order to communicate better.

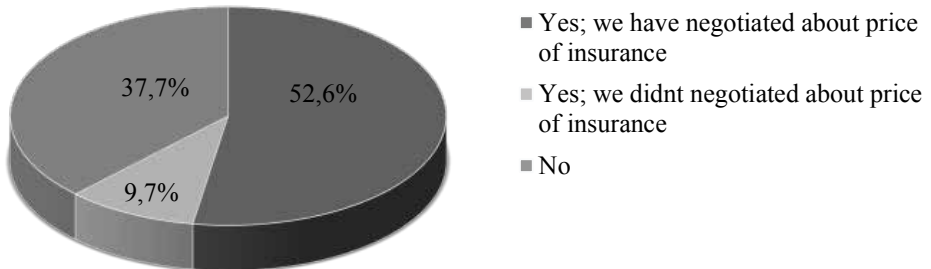
Figure 14. Structure of the answer to the question: “If you answered the previous question with YES, how much have you managed to lower the rental price? If you answered NO, you can skip the question.”



Source: Prepared by the author

2/3 of them negotiated the rental price of the car. Most of them (60) managed to lower the price by 20%. These are the leases that belong into the medium term, up to 14 days. Those who have a short-term lease (up to 7 days) managed to lower the price by 10 %. Only few respondents managed to lower the rental price by 30% or more, these are leases that last for 15 days or more, long-term leases.

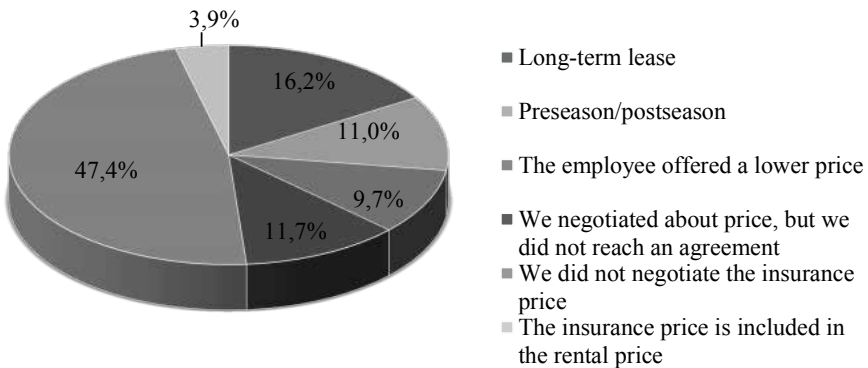
Figure 15. Structure of the answer to the question: “Did you take out additional car insurance? Could you negotiate the price of insurance?”



Source: Prepared by the author

The chart shows us how many people are taking extra car insurance, which is extremely important if there is a traffic accident. 2/3 of the respondents took car insurance and they did not have to pay any damages during the accident, while 1/3 of those who did not take insurance had to cover the damage. 96 respondents took additional insurance and 81 of them were negotiating the price of additional insurance.

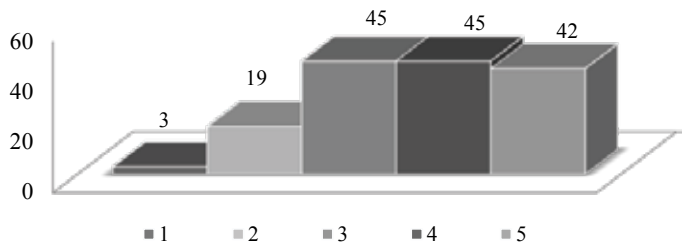
Figure 16. Structure of the answer to the question: “How did you negotiate the price of car insurance?”



Source: Prepared by the author

The graphic illustration explains how respondents negotiated the price of additional insurance. 25 respondents said that the insurance price was lower due to the longer-term rental of vehicles and 17 respondents said the insurance price dropped due to the preseason / postseason. Only few respondents (15) answered that the employee offered them the insurance price lower than listed in the price list, and 6 respondents have insurance automatically included in the rental price of the vehicle. Of those who have negotiated the insurance price only 18 of them have failed to lower the price.

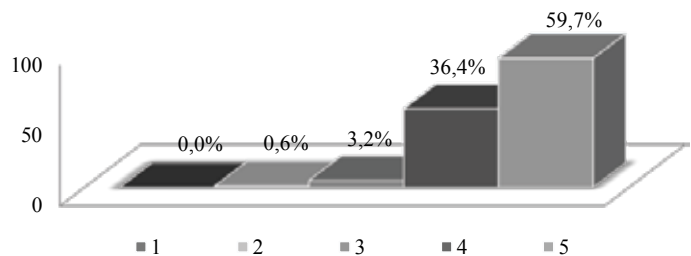
Figure 17. Structure of the answer to the question: “How important were the seller’s communication skills to take an additional car insurance?”



Source: Prepared by the author

Most respondents rated this question 3 and 4 (45 each) and 42 respondents rated 5. This points out that good communication is the key factor for customers to take an additional insurance. 22 respondents rated the question 1 and 2. They did not want to take an additional because they are confident in their driving abilities.

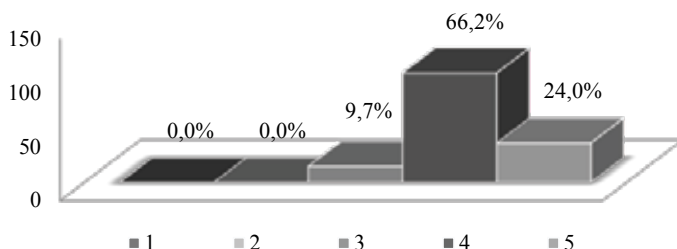
Figure 18. Structure of the answer to the question: “How much is seller’s verbal communication important to you?”



Source: Prepared by the author

In the next question, respondents were asked to say how important verbal communication is. The expected highest number of respondents rated 5, which means that for 92 people, verbal communication and knowledge of English or German is extremely important. 56 respondents also gave a high rating of 4, which confirms that good verbal communication and decent expression can contribute to higher sales of services. 6 people gave grades 2 and 3 and for them verbal communication is not important.

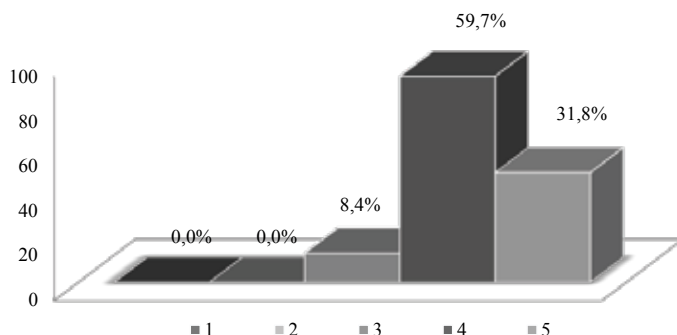
Figure 19. Structure of the answer to the question: “How much is seller’s nonverbal communication important to you?”



Source: Prepared by the author

In the 15th question, respondents were asked to give a score of 1 to 5, how much is a nonverbal communication important to them. More than 2/3 of the respondents rated 4, meaning that it is important to them that the worker is smiling and not making grim faces that would keep them off this rent-a-car company. Also 37 respondents gave the maximum rating, that nonverbal communication is extremely important to them. For 13 respondents nonverbal communication is not that important, so they gave a rating of 3.

Figure 20. The structure answers on question: “How would you evaluate the communication skills of a worker in rent-a-car?”



Source: Prepared by the author

In the last question, respondents evaluated the communication skills of workers in selected rent-a-car. The largest number of respondents (92) gave a very good rating, meaning they were quite satisfied with communication and language skills, while 49 of them rated excellent, which confirms that good communication is one of the key factors in negotiating. The smallest number of people (13) gave a rating of 3, and it means that there is still room for improving communication skills, so that all customers will be satisfied with the service.

It is extremely important for rent-a-car company to adjust to the market because of growing and increasing of the fleet of vehicles in other rent-a-car companies. The growth in the number of vehicles in rent to a car company is due to business leaps into new markets.

Variety of services always attracts a larger number of clients. If companies do not invest in a variety of services, they will never thrive and be competitors to the biggest players in the market. Increasing the volume of business is the key success of the company's progress and development.

When negotiating in rent a car, the most important is communication between the client and the employee. An employee in rent-a-car needs to be educated and have good communication skills to explain to the client the entire rental process and successfully sell their additional services. Verbal communication is the foundation, but non-verbal communication cannot be neglected, because it improves the impression. Based on the overall rent and car market research, it is possible to confirm the hypothesis that better communication will lead to greater volume of business and better sales of additional services and insurance. Verbal and non-verbal communication should be at the high level. When negotiating, it is desirable to reach an agreement that will be beneficial for both parties.

4. CONCLUSION

When evaluating accomplishment of negotiation, subjective perception and quality of process should be considered, not only the accomplishment itself.

The objective of successful communication is to provide information. It is very important that the recipient understands the meaning of information and that provider gets feedback. Inadequate communication can lead to conflict, missing good opportunities and sometimes to aggressive behavior. Good communication skills need constant improvement to facilitate information exchange.

The number of car rental companies in Croatia is continually increasing. The most car are rented to foreigners, mostly Germans. It is necessary for the employee to know the German language. English is also important because of the other costumers. The complete and understanding communication is the key element of negotiation with clients.

Most car rental offices offer a range of vehicle sizes to suit a variety of budgets and space requirements and some additionally offer specialized vehicles to suit its location such as convertibles, prestige models, hybrid/electric vehicles, or SUVs and passenger vans. At major airports or in larger cities, some independent car rental agencies offer high-end vehicles for rent. Car diversity is very important to attract more diferent costumers.

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PERCEPTION OF TRADITIONAL FOOD PRODUCTS AND CONSUMER ETHNOCENTRISM: EVIDENCE FROM CROATIA

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Abstract

The objective of this paper is to understand attitudes and behavior towards buying traditional food products among Croatian consumers. The paper also presents the profile of traditional food market in Croatia, and how consumer ethnocentrism leads to attitudes toward domestic food products. The research is based on a quantitative approach using a structured questionnaire survey from a total of 157 respondents. Research findings indicate that Croatian consumers still enjoy the quality of traditional food despite the fact that traditional food is more expensive. Furthermore, consumers expressed a positive attitude toward Croatian gastronomic offer, and allocating more money if the retailers would offer a wider range of Croatian traditional food products. Finally, the research data confirmed ethnocentric consumer tendencies within Croatia. The findings suggest that companies should focus on popularization and branding of Croatian traditional products by emphasizing that their brands and products are local and indigenous to increase ethnocentric consumers' willingness to buy. Overall, these findings provide important insight for traditional food producers in order to better understand consumers' motives and accordingly adapt their marketing and production strategies.

Key words: traditional food, food market, consumer ethnocentrism, consumer perception, Croatia

1. INTRODUCTION

The intensive processes in food industry, marked by rapid and complex changes in consumers' preferences, demand constant adjustments in market saturation and food quality (Vukasović, 2014). Furthermore, in the light of consumers concerns about the nutrition and quality (Gil *et al.*, 2000) and the origins of their food (Arsil *et al.*, 2013), consumer demand for local and traditional food has risen (Bianchi and Mortimer, 2015). Consequently, traditional food products are receiving more attention from the retail community. Some retailers have invested great resources into sourcing locally produced food in order to connect with consumers (Darby *et al.*, 2008). Also, traditional

food products are important element of European identity, by contributing to the development of rural areas and protecting them from depopulation (Verbeke *et al.*, 2016).

Cerjak *et al.* (2014) defined traditional food as a food with specific features, which distinguish it from other similar products of the same category in terms of the use of traditional ingredients or traditional type of production. Similarly, Weichselbaum *et al.* (2009) pointed out that traditional food products include foods produced in a traditional way, and have been consumed locally for an extended period of time. The research community showed high interest in traditional food products (e.g. Guerrero *et al.*, 2010; Hsu *et al.*, 2018; Vanhonacker *et al.*, 2010a), since a growing tendency toward quality of food products has created a growing market for traditional products carrying a strong identification with the specified region (Valkaj *et al.*, 2013).

Croatia has a strong heritage of culinary traditions; therefore the consumption of traditional food products is strongly connected with customers' cultural habits, as traditional food plays an important role in local identity; almost all Croatian regions are known for their traditional food products. Recently, the trend has shown that Croatian consumers are increasingly returning to the traditional food that ancestors have left in, which gives a special dimension to our perception of traditional food. Croatia as a member of the European Union, with its traditional products, simultaneously fosters its sovereignty and tries to find its market niche in the masses of various traditional products on the global market. Consumers are therefore motivated to consume traditional food to support the local economy and small scale producers (Morris and Buller, 2003). This could be linked to consumer ethnocentrism, which refers to the phenomenon according to which consumers prefer traditional local products in order to contribute to economic prosperity of the country (Gašević *et al.*, 2017).

For traditional food producers, who are in a great proportion small and medium/sized enterprises (Verbeke *et al.*, 2016), good understanding of consumers expectations toward products is of great importance for further development. In spite of the increased attention to traditional food consumption, limited research on the consumers' perceptions and attitudes toward traditional food products has been undertaken (e.g. Weatherell *et al.*, 2003). There is a general knowledge about European perceptions on traditional food products but there is a need to broaden the knowledge about Croatian consumers' behavior. Therefore, the objective of this paper is to gain knowledge about Croatian consumers' perceptions of traditional food products, and to examine what motivates them in decisions about choosing and buying traditional food products. Furthermore, the objective of the paper is to examine whether consumer ethnocentrism leads to attitudes toward domestic food products in Croatian market. The results of this paper may serve as a basis for the development of promotion policies for traditional food products, and identifying the proper sales channels and strategies.

The reminder of the paper is organized as follows. Section 2 provides the literature review and theoretical background, analyzing the relevant literature in traditional food market and consumer ethnocentrism concept. This part of the paper serves as a theoretical basis for a survey questionnaire development. Then, Section 3 deals with the research framework, explaining the research methodology, measurement development and data collection, followed by a discussion of the research findings. Finally, the paper concludes with Section 5, discussing the managerial implications.

2. LITERATURE REVIEW AND THEORETICAL BACKGROUND

2.1. *Traditional food market in the Republic of Croatia*

According to European Food Information Resource traditional food represents special sort of food where in production are used only domestic goods, traditional way of preparing or/and well know traditional combination of ingredients (Weichselbaum and Benelam, 2005). As mentioned above, it is visible that traditional ingredients are important in creation of traditional food. It is important that all of them can be found on a specific area that was used in the past and also available and used today in different sorts of food. Italian Ministry of Agriculture defined traditional food as agricultural products were methods of producing, keeping and preparing are aligned with the past and local usage (Pieniak *et al.*, 2009). The proposed definitions emphasize the importance of using local ingredients in preparing traditional food. Despite aligning time as key factor, there is still doubt about defining exact time frame for traditional food; European Parliament and European Commission in 2012 defined components of traditional food, setting exact rule for recognition. Traditional food is considered as food that was produced within borders of one country and it was transmitted from one generation to another for at least 30 years (EC, 2014).

Very often, traditional food is associated with a particular country which helps in recognition of a country and its differentiation on the gastronomic and touristic map of the world. Although most of the traditional dishes became global, because of their “background stories”, they certainly bear the popularization of the country itself. However, there is frequently confusion in determining the exact origin of a particular food or meal. In addition, it is usually a problem for manufacturers to label products and prove their authenticity and market position. In accordance with the various political and historical influences on the territory of Europe it was necessary to introduce some legal regulation to protect certain products in certain territories. Since the European Union currently consists of 28 member states, there is certainly a danger of losing the indigenous character. For that purpose, European Union decided to adopt a decree to protect the identity of a single member state (EC, 2014): (1) Protected Designation of Origin (PDO), a mark of products whose quality or properties, in essential parts or solely, come from that geographical environment and are inseparable from the natural and human factors prevailing in this area; (2) Protected Geographical Indication (PGI), a mark identifying product whose quality, reputation or other attribute is exclusively attributed to its geographical origin and which is at least partially produced in that geographical area; and (3) Traditional Specialty Guaranteed (TSG), the name shall be deemed to be eligible for registration if it identifies the traditional or specific property of that product. This division originated from the EU Regulation, which Croatia had to incorporate into its national legislation according to responsibilities taken with membership. When the European Union adopted declare in 2012, many states have called for recognition of their original and traditional products. This has led to problems with the authenticity of certain products. An example of such a dispute is the Slavonian kulen between Croatia and Slovenia (Kuskunović, 2016).

Due to rich history and various influences in Croatia, there is a wide range of foods and products considered as traditional, i.e. autochthonous. Given the different influences of various European cuisines, each region in Croatia has specific features in

gastronomy. According to the European Union regulations concerning the product's origin, there are 12 protected brand-products in Croatia, while 6 more products are in the process of obtaining the label (Table 1). Products that are protected by specific labels contribute to the intangible wealth and heritage of each individual country. As it can be seen in Table 1, almost every region has its own "representative" in the European Union's gastronomic offer, from the Baranjski kulen, originally from the east of Croatia and the Zagorski puran (specific turkey meat from Zagorje), to the Drniš pršut in the south of Croatia. However, in spite of a large number of traditional products, Mesić *et al.* (2012) consider that opportunities for protection and marketing of traditional food products in Croatia are still not used sufficiently.

Unfortunately, despite the fact that Croatia has a good predisposition for producing food and generating revenue from it, food export numbers are showing a different scenario. Croatia is importing more goods to satisfy needs for food. This data is showing negative trend and, considering basic advantages Croatia has, represents a huge problem for economy. According to population census from 2011, the Republic of Croatia has 2.25 million hectares of treated areas, which puts her in the order of average rich countries according to treated areas (CBS, 2011). According to this indicator, Croatia could increase production and exports by at least 80%, but unfortunately this percentage seems not reachable at this time.

Table 1. Traditional Croatian products (according to the EU regulations)

Product (original, protected name)	Description
Krčko maslinovo ulje	Olive oil from island Krk
Zagorski puran	Turkey from Zagorje region
Poljički soparnik / Poljički zeljanik / Poljički uljenjak	Savoury pie with Swiss chard filling
Dalmatinski pršut	Prosciutto from Dalmatia
Drniški pršut	Prosciutto from Drniš
Istarski pršut / Istrski pršut	Prosciutto from Istria
Lički krumpir	Potato grown in Lika region
Baranjski kulen	Spicy sausage from Baranja region
Ogulinski kiseli kupus/Ogulinsko kiselo zelje	Sauerkraut from Ogulin
Ekstra djevičansko maslinovo ulje Cres	Extra virgine olive oil from island Cres
Neretvanska mandarina	Tangerina from Neretva region
Krčki pršut	Prosciutto from island Krk
Šoltansko maslinovo ulje	Olive oil from island Šolta
Korčulansko maslinovo ulje	Olive oil from island Korčula
Paška janjetina	Lamb from island Pag
Istarsko ekstra djevičansko maslinovo ulje	Extra virgine olive oil from Istria
Slavonski kulen / Slavonski kulin	Spicy sausage from Slavonia region
Varaždinsko zelje	Sauerkraut from Varaždin
Slavonski med	Honey from Slavonija region
Međimursko meso 'z tiblice	Cured pork meat from Međimurje region

Source of the figure: Author prepared according to EC (2018)

Table 2 shows that exports in the Republic of Croatia increased by 45% compared to 2006, which would, without comparison with imports, indicate a very good result. However, if we compare this data to the import, which increased by 65%, this is actually a negative indicator. These results show that import has actually increased at a higher rate, and that is why Croatia has negative foreign trade balance in the food industry of \$ 1.321 million (in 2014), and given the potential Croatia owns, the indicator is even worse.

Table 2. An overview of foreign trade of agricultural and food products by years

Year	Export (mil. USD)	Import (mil. USD)	Difference (mil. USD)
2006.	1.190	1.848	-658
2007.	1.313	2.150	-837
2008.	1.399	2.625	-1.226
2009.	1.360	2.239	-879
2010.	1.355	2.168	-813
2011.	1.560	2.592	-1.032
2012.	1.593	2.541	-949
2013.	1.567	2.790	-1.223
2014.	1.735	3.056	-1.321
Index			
2013./2012.	98	110	129

Source of the figure: Author prepared according to HGK (2016)

Potentially the biggest food production problem in Croatia is the deruralisation and trend of “white plague”; fewer people are engaged in agricultural activities and food production at a micro level. Recently, most farms are extinct, people are emigrating which leads to decrease in the market productivity.

On the other hand, consumers are involved in the food products market. Consumers in Croatia mostly choose the price ahead of quality. The level of net salaries in Croatia is below the EU average, which reduces the purchasing power of consumers. The following table shows the trends of purchasing power in Croatia from 2010 to 2015. The research was conducted by the German GFK Institute, measuring purchasing power at EU level (GFK, 2016).

Table 3. Purchasing power - comparison between Croatia and the EU average

Purchasing power	Croatia	European average
2010/2011	4.808,00 €	11.945 €
2012/2013	5.208,00 €	12.808,00 €
2013/2014	5.208,00 €	13.122,00 €
2014/2015	6.666,00 €	13.636,00 €

Source of the figure: Author prepared according to GFK (2016)

Going further, if we compare general personal consumption in Croatia, data for 2008 show a total of 74,524 kuna (local currency) annually, and in 2014, personal consumption expenditures per household were 81,315 kuna (DZS, 2015). According to these data, it is evident that the average salary in the Republic of Croatia is less than half than on EU level. This undoubtedly defines the habits of the average consumer in the Republic of Croatia, which has different preferences, considering lower income that appears as limitation.

One of the trends in Croatian food products retail is an insatiable buyer. This consumer persistently wants something new, new promotion packages, new actions, which represents a very big issue for retailers. Today, consumers also demand new non-traditional stores, where, for example, they could dine in stores. Following these trends, retailers have become rivals to restaurants, which again contributed to the change of traditional retail trade. Therefore, one can conclude it is difficult to meet the variety of customers' needs today and to act upon them. Retailer must offer a wide range of products, while at the same time being innovative and constantly following and align to market trends. In such environment, retailers can seek their comparative advantage in offering traditional food but at the same time cannot focus on that segment only, which represents a challenge and reduces supply of traditional food.

2.2. Consumer ethnocentrism concept

Consumer ethnocentrism indicates tendency to purchase domestic products (Grgic, 2013). Over the last few decades, this phenomenon increasingly has become subject to research and appears to be one of the potential key points of a country's economy, as well as a potential competitive advantage for retailers. If retailers take advantage of this phenomenon well enough, there is a possibility of gaining bigger profits and better placements in the market for domestic producers and companies. Ethnocentrism was initially conceived as a purely sociological concept among groups wishing to emphasize their affiliation. Several factors have been identified that determine or are closely related to consumer ethnocentrism and as such can be categorized into four categories: socio-psychological, economic, political and demographic (Shimp, 1984).

The concept of consumer ethnocentrism can be explained as a reflection of the social and moral principles of consumers. Therefore, the consumer's attitude to avoid purchasing products from a particular country is not due to the fear of losing jobs or the preservation of the domestic economy, but because of the political, military and economic activities of those countries that have caused disloyalty and anger at them (Matić, 2013a). Of course, this concept can easily lead to fanaticism and intolerance to other groups, but to a certain extent consumer ethnocentrism is certainly beneficial.

Consumer ethnocentrism is influenced by different socio-demographic factors that naturally change. A classic example of a factor that influences the mechanism of ethnocentrism in purchasing goods is the age of consumers. As already proven by previous research, older people are more reluctant to accept and tolerate interference from the outside world and other cultures in relation to the younger population. Because of

increased cosmopolitanism, young people tend to be more polycentric and feel more like citizens of the world than adults (Bawa, 2004). The existing research also showed that women are much more closed and value more social sensitivity, quality of life and feelings generally related to society (Yoo and Donth, 2005).

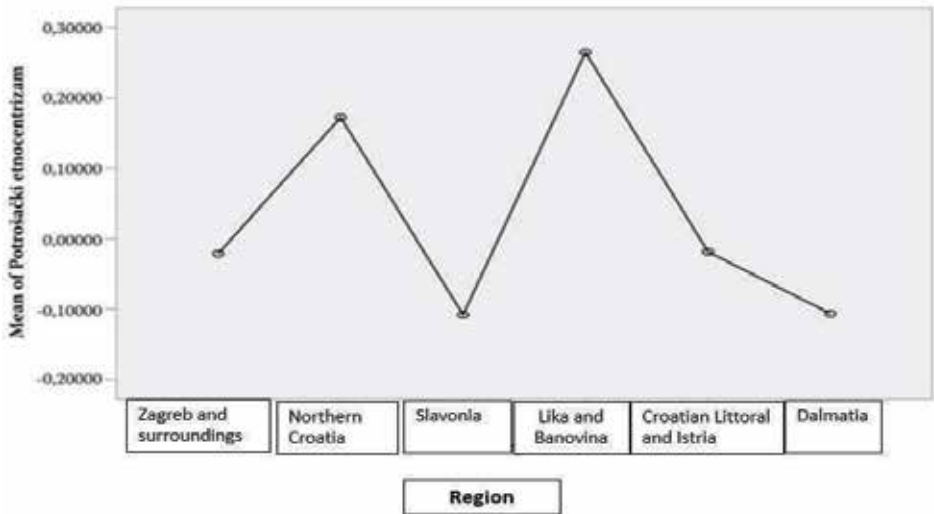
There are also two opposing possibilities of ethnocentrism. Consequences of consumer ethnocentrism among consumer behavior are perceived product necessity and attitude towards imported products as perceived economic threat (Sharma *et al.*, 1995). The perceived necessity of the product refers to the fact that consumers consider they cannot live without a certain foreign product. On the other hand, an economic threat refers to products that are absolutely unnecessary on domestic market and are perceived as a threat to domestic products. In ethnocentrism, it is also emphasized that consumers will buy domestic products even when this product is of a lower quality than the foreign product (Matić, 2013). Some studies have shown that higher-income consumers are less aware of the origin of the product and show lower tendency to ethnocentrism (Kumar *et al.*, 2011). On the other hand, less educated consumers show stronger pronounced feelings of giving preference to domestic products and are more conservative and less open to outside national influences and foreign products (Matić, 2013b).

Given the complexity of this concept, there were difficulties in measuring the level of ethnocentrism. Shimp and Sharma (1987) created a measuring scale called Cetscale (C-Consumer, E-Ethnocentrism, T-Tendency, S-Scale), which has proven that the concept of consumer ethnocentrism is measurable. Cetscale has been shown as a quality instrument for measuring the tendency of consumer ethnocentrism, through which it is possible to answer and explain why consumers prefer domestic in comparison to foreign products.

2.2.1. Consumer ethnocentrism in the Republic of Croatia

Croatia is a small country but at same time abounds in gastronomic offers. Given the history and tragic path to the birth of the Republic of Croatia, the patriotism is often emphasized, mostly in the political field, but is even visible in the traditional food sector. Consumer ethnocentrism is often even more negative on regional base where every region in Croatia values and buys its own. However, the obstacle to consumer ethnocentrism for people in Croatia is the financial situation where they are not always able to choose the quality ahead of the price. To explore socio-psychological influences (patriotism, conservatism/liberalism, cultural openness) and demographic factors on ethnocentrism and consumer awareness in differentiating domestic and foreign brands of products, the results of the research on the Croatian market have identified a negative correlation between ethnocentrism and cultural openness and a positive correlation between ethnocentrism and patriotism, conservatism/ liberalism and collectivism/individualism. Also, the results indicated that younger consumers with higher education and incomes would have lower tendencies of ethnocentrism (Ozretić-Došen, 2005).

Figure 1. Consumer ethnocentrism tendencies with respect to the regions of the Republic of Croatia



Source of the figure: Matić, M. (2013a), pp.51

The research on the consumer animosity and consumer ethnocentrism conducted in 2013 has shown that there are different levels of consumer ethnocentrism with respect to individual regions in Croatia. Figure 1 gives an overview of the strength of consumer ethnocentrism in the Republic of Croatia. The highest level of the consumer ethnocentrism is registered in the area of Lika and Banovina, while the lowest level appeared in the Slavonia region.

2.3. Perception of traditional food – review of the existing research

Traditional food products conceptualization and consumers perceptions regarding local food consumption have been a subject of many academic researches so far (e.g. Cerjak *et al.*, 2014; Hsu *et al.*, 2018; Verbeke *et al.*, 2016). Vanhonacker *et al.* (2010b) underlined the importance of cultural and territorial identity, and transferability from one generation to another in defining traditional food products. In Chambers *et al.* (2007) research consumers expressed their positive feelings for consuming local products and creating value for the local community, but there were also negative perspectives for cost and difficulties to find them in stores. Furthermore, Cerjak *et al.* (2014) examined Austrian and Croatian consumers’ motives in buying traditional food products, concluding that customers perceive traditional food products as those with a long production tradition and with a traditional recipe.

There are many factors influencing the decision on the consumption of traditional food products. For instance, Vanhonacker *et al.* (2010a) found that Southern Europe citizens achieve a higher consumption level of traditional food products than the

North, showing that ethnicity affects perception of traditional food products. Furthermore, Van't Riet *et al.* (2011) research showed that local people are habitually connected with traditional food products, making their consumption a necessity for them. When it comes to cost as a factor influencing the traditional food products purchase decision, results and opinions are contradictory. Degeratu *et al.* (2000) research showed that particular groups of consumers, online buyers for instance, are hyper-sensitive when it comes to cost of traditional food products. On the other hand, Di Vita *et al.* (2013) conclude that for urban consumer place of origin is much more important factor than price when making a purchase decision for traditional food products. Also, Vlontzos *et al.* (2018) confirmed in their research that cost is not the essential parameter in buying traditional food products, even for consumers with lower income.

3. METHODOLOGY AND RESULTS

3.1. *Measurement development and data collection*

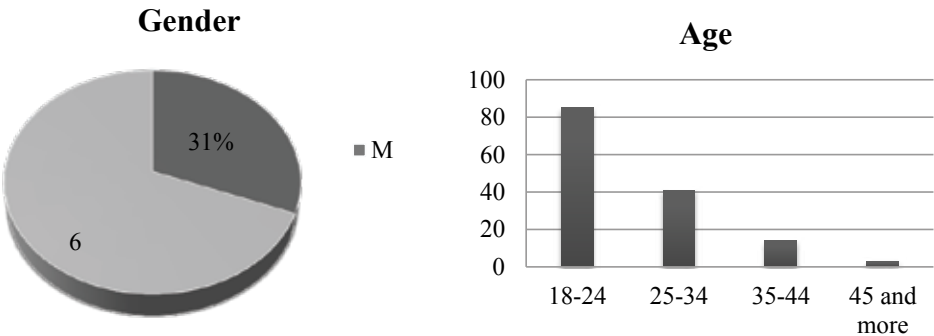
The research is based on a quantitative approach using an online questionnaire survey to collect data. The questionnaire was developed to elaborate consumers' perceptions of traditional food products and traditional food supply in retail stores. The final version of the research instrument consisted of two main parts, and was subdivided into two subsections. The first part of the questionnaire examined the social and demographic data of the respondents, such as gender, age, monthly income and level of education. The second part of the questionnaire consisted of questions aiming to find how consumers perceive and understand traditional food products. In addition, a map of Croatia was attached to the respondents, on which they had to identify their perception of the region in Croatia and the gastronomic offer of the region. All variables were measured through respondents' perceptions by using five-point Likert scale ranging from 1=strongly disagree to 5=strongly agree. The questionnaire was employed in large sample testing from August to September 2016. The measurement scale for the consumer perception on traditional food products, as shown in Table 4, was adapted from the scales established in previous research (i.e. Cerjak *et al.*, 2014; Verbeke *et al.*, 2016).

3.2. *Research results and discussion*

A total of 157 completed responses make the final survey sample. The analysis of the collected data was conducted in two phases: (1) descriptive analysis, (2) assessment of traditional food perceptions, and traditional food supply in retail stores.

The sample consisted of 49 male and 108 female respondents. A higher rate of female respondents has been observed by other papers as well (e.g. Vlontzos *et al.*, 2018). Considering the age of the respondents (Figure 2b), 85 of them were 18 to 24 years old. This is mainly due to distribution of the questionnaire through university networks.

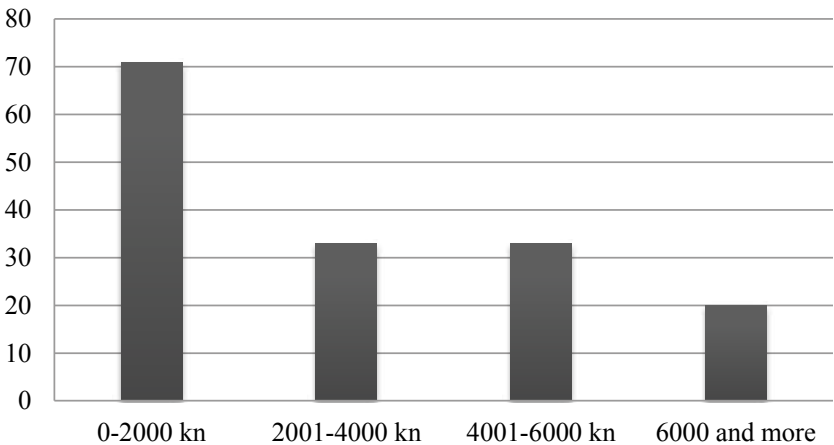
Figure 2a and 2b. Demographics of overall sample



Source of the figure: Author prepared according to research results

In addition, respondents were asked about their current employment and the amount of monthly income. Majority of the respondents (n=61) who participated in the research are currently unemployed (out of which 20 completed high school), 16 respondents are part-time employed, 3 respondents are self-employed while others are employed for a definite or indefinite period. As it was previously mentioned, majority of the respondents is from student population, which explains the lower unemployment rates and monthly incomes of the respondents. Structure of the respondents by income level is shown in Figure 3.

Figure 3. Structure of the respondents by income level (in kuna)



Source of the figure: Author prepared according to research results

In the second part of the questionnaire, respondents were asked to quantify their knowledge and commitment towards traditional food products.

As shown in Table 4, 75.80% of the respondents consider they would know how to define the concept of traditional food. It is also evident that the same number of respondents (n=114) think that traditional food is what our ancestors ate. Furthermore, the definition refers to the traditional, i.e. specific combination of ingredients. Then, 71.64% of respondents agree or completely agree the traditional food is prepared on “grandma’s way”, which the existing literature suggests as a necessary prerequisite for food to be called traditional. Equally, Cerjak *et al.* (2014) research defined traditional food products as those with a traditional recipe or as “food of generations”. Seasonality in the consumption is not a significant factor in defining traditional food products (average rating 3,21) which is in line with the Cerjak *et al.* (2014) research. However, Verbeke *et al.* (2016) found that seasonality represents an important factor in defining traditional food products among Belgian consumers. Likewise, if it comes to calories, even 61 respondents think this food is as caloric as the modern one.

Another interesting conclusion is the importance of traditional food quality compared to price for a consumer. Even 91% of the respondents strongly disagree with statement that quality is not essential when choosing traditional food products, which means that Croatian consumers still enjoy the quality of traditional food despite the fact it is more expensive. These findings are in opposition to those offered by Vukaso- vić (2014), who found that consumers in West Balkan Countries would not pay more money for traditional food products. Finally, 91 of the respondents consider Croatia as a country which abounds with traditional food. From this fact it is possible to draw a conclusion that consumer perception is that Croatia has a good gastronomic offer, and that Croatian consumers would allocate more money if the retailers would offer a wider range of traditional food products. Here is a great opportunity for retailers who, if devoted to selling traditional food, can achieve higher profits.

Table 4. Perceptions of the respondents on traditional food products

	Strongly agree	Agree	Neutral	Disagree	Strongly disagree	Average rating
I consider that I would know how to define traditional food.	44	75	33	3	2	3,99
Traditional food is food that our ancestors ate, i.e. food that has been available for a long time.	54	60	29	10	4	3,96
Traditional food product is typically produced in “grandmothers way”.	62	50	33	8	4	4,01
The availability of traditional food is strongly dependent on the season.	32	34	46	25	20	3,21
Traditional food has an authentic origin of raw material.	76	31	37	7	6	4,13

Table 4 - continued

	Strongly agree	Agree	Neutral	Disagree	Strongly disagree	Average rating
Consuming traditional food reminds me of childhood.	67	55	21	6	7	4,06
Traditional food has more calories than other food types.	20	16	61	30	29	2,78
When choosing traditional food, quality is not essential for me, than price.	5	7	34	50	60	2,01
By choosing traditional food I show loyalty to country where I come from.	25	60	46	6	20	3,41
Croatia is a country rich in traditional food.	91	53	10	2	1	4,47
I am willing to pay more for the traditional food product.	35	78	32	8	4	3,85
The price is more important than the quality of the traditional food product.	5	14	43	59	36	2,32
I would recommend the foreign guest to taste traditional Croatian food.	131	18	5	3	0	4,76

Source of the table: Author prepared according to research results

In the next part of the questionnaire, the respondents were provided with a map of Croatia where they were supposed to position their place of birth in a particular Croatian region. In the following, respondents were asked to round off a product that should represent Croatia on the global level. The following answers were suggested: slavonski kulen, zagorske štrukle, istarski pršut, paški sir, dalmatinska patcada and “others” where respondents could enter their suggestion. From the answers offered, the highest number of votes received slavonski kulen (n=85); zagorske štrukle and paški sir achieved almost equal number of votes (12- 15%), while istarski pršut and dalmatinska patcada had about 5% of votes. Comparison of these responses with the question about respondents’ place of birth gave the insight into the existence of consumer ethnocentrism on the Croatian market. For that matter, only two largest surface regions (Slavonia and Dalmatia) are covered (Table 5).

Table 5. Traditional food products that should represent Croatia on the global level

Traditional products	Slavonia (n=65)	Dalmatia (n=13)
slavonski kulen	59	2
paški sir	4	3
istarski pršut	2	
dalmatinska paštica		3
dalmatinski pršut		3
zagorske štrukle		1

Source of the table: Author prepared according to research results

According to regionally segmented data presented in Table 5, one can conclude that ethnocentrism is extremely pronounced in Croatia. Although the number of respondents from Dalmatia is limited, persons with a place of birth in Slavonia demonstrated a high level of ethnocentrism with regard to the selection of traditional products that should represent Croatia in the world; among 5 offered products, 86% of Slavonian-born respondents considered slavonski kulen as a product which should represent Croatia on a gastronomic offer. If national consumer ethnocentrism is analysed, it is equally highlighted among respondents; 83% of the respondents would certainly recommend tasting traditional Croatian products to foreign guests.

In conclusion, the results of this research showed that consumers' perceptions on traditional food products in Croatia are in line with the findings in existing literature (e.g. Cerjak *et al.*, 2014; Verbeke *et al.*, 2016). Considering states of definition, traditional food should necessarily have 3 components: traditional ingredients, traditional preparation and original combination of ingredients. This research showed that consumers in Croatia properly perceive traditional food, and by defining traditional food they have in mind all the crucial components to perceive this food as traditional. The respondents have shown they consider traditional food as the one that our ancestors ate and were prepared in "grandmothers' way". Similarly, the traditional food encourages childhood memories to respondents, and by choosing some of the traditional foods, they stimulated a sense of attachment. On the other hand, consumers are willing to allocate more money if they are sure about the originality of a particular traditional product. From this it is evident that if retailers would devote more attention to the traditional food segment, they can attract more consumers, who will not be price sensitive, if they had higher quality and wider range of products available.

4. CONCLUSION

In addition to new technological trends on the food products market, there are also significant changes in the profile of customers who increasingly want to be familiar with the origin of the product, and the harmful substances in the products they consume. In these circumstances, traditional food products are becoming more and

more important. According to the amount of traditional products protected by the European Union Decree on Product Authenticity, Croatia is equally represented among the member states. Croatia is characterized by gastronomic diversity, which is different even at the local level, where the regions are different in terms of types of meals and even groceries. Encouraged by the above mentioned facts, neither the Croatian market has circumvented the trend of consumer ethnocentrism, which significantly contributed to the competitiveness of traditional food products in a wide assortment of international retail chains present on the Croatian market.

In the empirical study, the theses that were set in the theoretical part of the paper were examined. The research results have shown that consumers in Croatia believe they can define traditional food, which is confirmed by examining the importance of tradition, original ingredients and the skills of preparing in defining the traditional food products among the respondents. It is also interesting that although economic situation in Croatia is not promising, for consumers of traditional food products quality is more important than price. This is the reason why retailers in this product segment, coupled with increasing quality of the traditional food products, can attract non-price sensitive customers. This approach is a good opportunity for domestic traditional food producers who would get a new channel for product placement through this path.

Furthermore, this research showed that consumer ethnocentrism is present in Croatia, and how it is regionally emphasized. The results have shown that the place of birth certainly forms the perception of the respondents about a particular traditional product. At national level, the average ethnocentrism is present, but not too pronounced. When asked whether they link food with national affiliation or think about showing their attachment, the respondents emphasize that this is not very important. Finally, the results also emphasize consumers positive perceptions toward Croatian traditional food products when highlighting they would certainly offer them to their overseas guests. So this is yet another proof that the consumer ethnocentrism is present on the Croatian food market.

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CHALLENGES OF INTERNATIONALIZATION

CHANGES IN NATIONAL CULTURE AND ITS INFLUENCE ON INNOVATION: THE CASE OF CROATIA

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Abstract

The relationship between national culture and innovation has been analysed in a substantial body of literature. Most of these studies were conducted at a certain point in time and did not account for the changes that can happen in national culture. Forces, such as globalization and internationalization as well as technological contingencies, could be factors that catalyse the change in national culture. However, there is still not enough research on this topic. The aim of this paper is to answer the question how and to which extent national culture influences innovation and to propose a research model that will take into account the changes happening within a nations culture and the potential changing face of the relationship between national culture and innovation. In order to do so, we view values of Hofstede's dimensions of national culture in a sample of undergraduate business administration students in a Croatian university and compare them to national value scores based on World Values Survey conducted in Croatia. We find some differences between national culture dimensions in the student sample and the dimensions at the national level, lending empirical proof to the argument that national culture dimensions can change over time.

Key words: national culture, changes in national culture, Hofstede's six cultural dimensions, innovation, Croatia

1. INTRODUCTION

The question why some nations and organizations are more innovative than others has been present for nearly as long as Schumpeter (1942) first defined innovation. In the meantime, the differences between innovation on different levels have been explained by a number of factors, such as intellectual property rights, market structure, corporate governance systems, geography, human capital and demand (Crespi, 2004). Culture has also been emphasized as an important factor for innovation both at the national and organizational level (Shane, 1993; Buschgens et al., 2013). This study is an addition to the literature on culture and innovation.

Shane (1993) was one of the first authors to analyse the relationship between national culture and innovation. Over the course of the past two decades, a number of

other studies (Didero et al., 2008; Kaasa & Vadi, 2008) have replicated Shane's research model in order to analyse if his findings were prevalent over time. The main findings are consistent and there is a consensus that national culture influences innovation. However, an ambiguity regarding the relationship between specific national culture dimensions and innovation can be found. The relationship between national culture dimensions and innovation depends on a number of factors. One of them is the phase of innovation process. Different activities related to innovation, such as idea invention or commercial implementation are conducted more easily in different cultural contexts (Smale, 2016).

Tellis et al. (2009) on the other hand state that skilled labour, capital, government and culture are the most important factors for innovation. They also state that national cultures are converging due to the influence of the global economic system, and are therefore losing their significance as factors determining innovation. However, they offer little empirical data to back their claims. Ingelhart (2008) has on the other hand showed, based on the analysis of empirical data from Western European countries from 1970 to 2006, that their national cultures show some incomplete convergence, but the differences between them nevertheless tend to stay stable.

According to Kirkman et al. (2017) it can be stated that there is a lack of longitudinal research on changes in national culture, and especially in the potentially changing relationship between national culture and innovation. Therefore, in order to hypothesize the relationship between national culture dimensions and innovation in the Croatian context, we'll conduct an analysis of cultural dimensions of undergraduate business administration students from a Croatian university in order to see how do they correspond with the data on national level and what implications could they have for the future. The aim of this paper is therefore to answer the question how and to which extent national culture influences innovation and to propose a research model that will take into account the changes happening within a nations culture and the potential changing face of the relationship between national culture and innovation.

2. NATIONAL CULTURE

National culture is one of the most important factors influencing all processes taking place in an organization. It enters the organization through values and beliefs of workers and managers and it has great impact on their actions. This view is shared by ecological (Hannan & Freeman, 1977), contingency (Lawrence & Lorsch, 1967) and institutional (Di Maggio & Powell, 1983) theories of management.

Culture can be viewed on many levels and this paper focuses on culture at the national level and its relationship with innovation. Studying of culture has its origins in the field of anthropology. The concept of national culture is based on the works of Kroeber & Kluckhohn (1952) and Inkeles & Levinson (1969).

National culture can be defined as a set of values, norms, expectations and beliefs that individuals usually attain in early childhood, and are shared by a larger group of individuals (Hofstede et al., 2010).

The core of national culture are values. The most commonly used model of national culture is based on aggregated individual scores of culture value dimensions within a nation and was introduced by Hofstede in the 1980s. The dimensions that constitute national culture are individualism, uncertainty avoidance, power distance, masculinity, long term orientation and indulgence (Hofstede, 2010). These dimensions of national culture were validated and expanded by a number of other authors (Schwartz, 1999; Trompenaars, 2004; House et al., 2004).

National culture can also be seen as the most important informal institution of a nation. Formal institutions on the other hand are the political and legislative national system (Lundvall, 2010; Elenkov & Manev, 2005). Similar types of national culture do not necessarily need to have the same influence on individual or organizational outcomes because national culture does not matter equally in each nation due to different formal institutions and other environmental factors. However, most culture researchers tend to wrongly equate the whole national effect on individuals and organizations with the effect of national culture alone (Kirkman et al., 2017; Taras et al., 2009). It is therefore necessary to include national culture size effect estimation when conducting international culture research (Kirkman et al., 2017).

Most commonly used models of national culture are based on values. Values define individual's internal beliefs while on the other hand norms define his behaviour (House et al., 2004). Therefore, values explain how individuals feel things should be done in a society while norms are the way they are actually done. Gelfand et al. (2006) divide national cultures based on how tight or loose the prevailing norms in the society are. Tight cultures imply higher norm, value and belief homogeneity between individuals in a certain culture. It can therefore be expected that members of tight cultures will have less internal cultural differences and that the influence of national culture on individuals and organisations will be stronger. If we combine the views of Gelfand et al. (2006) and Hofstede et al. (2010) it can be stated that dimensions of national culture values will have a stronger anticipated effect on individuals and organizations if the society is tighter.

Hofstede (2010) states that values are nevertheless the most stable element in culture. Inkeles and Levison (1969) suggested that these values could be seen as ways people around the world deal with a number of key issues, such as relation to authority, relationship between individual and the society and the individual's concept of masculinity and femininity, as well as ways of dealing with concept. Based on their work, Hofstede conducted an analysis of a large body of survey data relating to most common employee problems in more than fifty subsidiaries of IBM around the world. He discovered that IBM employees in different countries are facing similar issues, namely: Social inequality, including the relationship with authority; The relationship between individual and the group; Concepts of masculinity and femininity: the social and emotional implications of having been born as a boy or a girl; Ways of dealing with uncertainty and ambiguity (Hofstede et al., 2010). On the other hand, he also found out that different societies have different ways of dealing with these issues.

Based on these findings, Hofstede defined four dimensions of national culture that could be measured relative to other cultures: power distance; collectivism versus in-

dividualism, femininity versus masculinity, and uncertainty avoidance. Hofstede et al. (2010) explain that “a dimension groups together a number of phenomena in a society that were empirically found to occur in combination, regardless of whether there seems to be a logical necessity for their going together”. It is important to state that national culture dimensions are based on statistical relationships between countries and can only be detected when comparing a number of countries. Over time, two additional dimensions were added to the existing four. The fifth was labelled long-term versus short-term orientation, and the last one indulgence versus restraint. All of the dimensions are explained further in the text.

Power distance is a value dimension that defines ways in which people deal with inequality. Hofstede et al. (2010) define it as “the extent to which the less powerful members of institutions and organizations within a country expect and accept that power is distributed unequally”. Therefore, it can be stated that power distance informs on the dependence relationships in a country. When a national culture has a small power distance index employees tend to have a low level of dependence on their managers and do not fear confrontation or consultation. On the other hand, in high power distance index cultures employees have a considerable dependence on their managers, and are not willing to communicate directly with their superiors.

Collectivism versus individualism is the second national culture dimensions explained by Hofstede. Hofstede et al. (2010) define individualism as “societies in which the ties between individuals are loose: everyone is expected to look after him or herself and his or her immediate family”. On the other hand, collectivism is defined as “societies in which people from birth onward are integrated into strong, cohesive in-groups, which throughout people’s lifetime continue to protect them in exchange for unquestioning loyalty”.

Femininity versus masculinity is a dimension defined by the conception of gender roles in a society. Hofstede et al. (2010) define a society as masculine “when emotional gender roles are clearly distinct, men are supposed to be assertive, tough, and focused on material success, whereas women are supposed to be more modest, tender and concerned with the quality of life”. On the other hand, a society is defined as feminine “when emotional gender roles overlap: both men and women are supposed to be modest, tender, and concerned with the quality of life”.

Hofstede et al. (2010) define the fourth dimension, uncertainty avoidance as “the extent to which the members of a culture feel threatened by ambiguous or unknown situations”. This dimension can be closely linked to the feelings of stress and anxiety, but it is important to state that it is not the same as risk avoidance. Uncertainty cannot be expressed through probability, while risk can. Hofstede et al. (2010) explain that in this sense, high certainty avoidance cultures want to reduce ambiguity and the numbers of ambiguous situations, that is they prefer to have all corners covered.

Long-term versus short-term orientation is the fifth dimension that was added to Hofstede’s model after a survey conducted on Chinese students which was compared to previous work on “western” values. Long term orientation stands for “the fostering of virtues oriented toward future rewards – in particular perseverance and thrift” (Hofst-

ede et al., 2010). On the opposite, short term orientation stands for “fostering of virtues related to the past and present – in particular, respect for tradition, preservation of face and fulfilling societal obligations” (Hofstede et al., 2010).

Indulgence versus restraint is the newest national culture dimension and it relates to happiness, life control and importance of leisure in a national culture. Hofstede et al. (2010) define indulgence as “a tendency to allow relatively free gratification of basic and natural human desires related to enjoying life and having fun”. Restraint on the other hand can be defined as “a conviction that such gratification needs to be curbed and regulated by strict social norms”.

As was stated earlier in the paper, national culture influences innovation, but findings regarding the influence of specific dimensions on innovation are still ambiguous. In order to conceptualize a theoretical framework, we conducted a literature review on the relationship between innovation and national culture.

3. INNOVATION AND NATIONAL CULTURE

Innovation is one of the key determinants of business success, and the level of innovation of a nation can be a good predictor of how well it will do on the international market. OECD (2005) defines innovation as the implementation of a new or significantly improved product or process, marketing method, organisational method in business practice, organisation of workplace or external relation. Mytelka and Smith (2002) argue that differences in innovativeness at the national level are embedded in social, cultural and political processes. Similarly, Trompenaars (2007) claims that it is possible to predict which national groups are going to have relatively better results in different parts of the innovation process. Shane (1993) was among the first to analyse the relationship between national innovation rates and dimensions of national culture. He found that low uncertainty avoidance as well as low power distance and high individualism are related to high rates of innovation. Didero et al. (2008) and Kaasa et al. (2010) also agree that low power distance, low uncertainty avoidance and high levels of individualism in a national culture have a positive influence on innovation.

A number of positive traits of different dimensions of national culture can be linked to innovative performance. Regarding power distance, its components of importance of hierarchy, vertical communication patterns, centralization of power, control over subordinates and resistance to change can all be related to innovation. Minimizing hierarchy, promoting equality in organizations, free communications across levels, decentralized authority, control systems in organizations based on trust, acceptance of change of distribution of power in organizations have all proven to be beneficial for innovation efforts in the literature (Shane, 1993; Dobni, 2008). National cultures that score highly on individualism are also expected to have a number of traits that should be beneficial to innovation, such as belief in freedom, outward orientation and importance of contact with senior managers (Shane, 1993; Kaasa et al, 2010). High scores on masculinity also signify that a national culture rewards and recognizes performance and focuses on training and improvement of the individual which can be beneficial for innovation.

Kaasa et al. (2010) tried to create a composite national culture index that would take into account the possibility of a culture having some dimensions positively influencing innovation, while others hindering it. Therefore, it can be stated that not only the scores of national culture dimensions are important for innovation, but their combinations as well.

Most authors that studied the relationship between national culture and innovation have used simple measurements of the national innovation output, such as trademarks, which are limited since they are only applied to marketed innovations, and not to process or other types of innovations. Another issue in national culture and innovation research is that many authors tend to wrongly equate culture with nation (Kirkman et al., 2017). National culture should be seen only as a part of the national effect on innovation, and it is important to measure the size of this effect, which many studies do not do, but simply assume a linear relationship between national culture and innovation (eg. Shane 1993; Efrat, 2014).

In general, it can be stated that the studies of national culture and innovation are somewhat problematic due to difficulties in getting accurate measures of cultural values, as well as studies usually not controlling for differences in organizational structures, dominant types of corporate culture, legal systems, technology or national wealth. The oversimplification of innovation measurement can also be stated as an important issue with these studies. On the other hand, it can be stated that national culture does influence innovation. However, there is still an unanswered question regarding how changes in national culture influence innovation, and a lack of longitudinal studies explaining this.

4. NATIONAL CULTURE DIMENSIONS AND INNOVATION IN CROATIA

Similar to other Eastern European countries, Croatia underwent the process of deindustrialization in the 1990s. This, together with a stronger emphasis on services, led to the weakening of the manufacturing sector and its technological obsolescence (Penava & Družić, 2015). This can therefore be one of the explanations for Croatia scoring poorly on most global innovation scoreboards. In the context of EU, Croatia can be seen as a moderate innovator, and its innovative performance has declined to that of the EU, relative to 2010 (European Commission, 2018). Croatia scores poorly on sales impacts and intellectual assets as innovation dimension being measured in the European Innovation Scoreboard, as well as having GDP per capita and the employment share in high and medium tech manufacturing below EU average.

Regarding national culture dimensions and their relationship with innovation, Croatia scores high on power distance (73), uncertainty avoidance (80) and low on masculinity (40) individualism (33) and indulgence (33), with a neutral score on long term orientation (58) (Hofstede Insights, 2018). According to Hofstede Insights, this means that people accept a hierarchical order without further justification, centralization is expected and subordinates are expected to be told what to do. One of the foremost important values in this type of culture is loyalty and it has a stronger influence on behaviour

than social regulations. Croatia can also be seen as a feminine society in which conflicts are resolved with compromise and value their free time and flexibility highly. A high score on uncertainty avoidance signifies that innovation may be hindered and security is highly valued. Regarding the score on long term orientation, Hofstede Insights states that Croatian culture can be viewed as pragmatic, that is, it has an ability to adapt traditions easily to changed conditions while at the same time having a strong propensity to save and invest. Low score on indulgence signifies a society that can be cynical and pessimistic and individuals in this types of societies can think of themselves as being restrained by the social norms. Lažnjak (2012) conducted a research on national culture dimensions in Croatia and hypothesized on their relationship with innovation. The author confirmed that high levels of uncertainty avoidance and power distance, as well as high levels of collectivism and feminism are all proven to be detrimental for innovation. Since we lack longitudinal data on national culture dimensions we conducted a survey to see if there are any differences in national culture dimension scores between undergraduate business administration students and the general national culture.

Ingelhart (2008) as well as Hofstede et al. (2010) hypothesize that, although societal values are stable over time, they can change. This change can potentially influence the relationship between national culture and innovation. Smale (2016) explains how China implemented a strategy to compensate for the lacking parts of its national culture dimensions when it comes to innovation, and how it seems to have had an effect in the long run. However, there is no research on the national culture dimension scores in younger generations. It would be interesting to see if there are significant differences in national culture dimensions in future generations that have yet to enter the labour market. If their values differ significantly from the existing national culture dimensions, it would be interesting to see how this would change in the future and in which way would it influence the national innovation output.

5. RESEARCH

5.1. *Research setting and methodology*

For the purpose of this paper, a primary empirical research was conducted with the aim of studying changes in national culture in Croatia. The research instrument was questionnaire originally designed by Geert Hofstede (Values Survey Module 2013 Questionnaire) available in appendix of this paper. Module 2013 presents the newest version of the Values Survey Questionnaire and it is the only version that includes all six cultural dimensions. Earlier versions include merely four or five dimensions.

The questionnaire was distributed online. Following the guidelines of Hofstede's Culture Values Survey, we distributed the survey to third year undergraduate students at the Faculty of Economics and Business at the University of Zagreb, Croatia using Google Classroom, an online e-learning tool that students use in their everyday work. The sample size was 185 students and the data were collected throughout the month of October in 2018. The sample size is far above recommended sufficient size for homogeneous sample of 50 respondents.

The questionnaire consisted of 24 rating scale questions and respondents were asked to assess their level of agreement or personal attitude toward certain values, norms and ideas on a scale from 1 to 5. Each cultural dimension was represented, studied and measured by four questions of the questionnaire. The other six questions asked for demographic information: the respondent's gender, age, education level, kind of job, present nationality, and nationality at birth.

The 24 content questions allow index scores to be calculated on six dimensions of national value systems as components of national cultures: Power Distance (large vs. small), Individualism vs. Collectivism, Masculinity vs. Femininity, Uncertainty Avoidance (strong vs. weak), Long- vs. Short-Term Orientation, and Indulgence vs. Restraint. For each of the 24 question, mean scores were calculated, up to two decimals. Cultural dimensions are usually presented as index values on a scale 0 to 100. For each cultural dimension, an index was calculated based on the mean score of questions that concerns it. The indexes were calculated according to the following formulas (Hofstede & Minkov, 2013):

Power Distance Index (PDI):

$$PDI = 35(m07 - m02) + 25(m20 - m23) + C(pd)$$

Individualism Index (IND):

$$IDV = 35(m04 - m01) + 35(m09 - m06) + C(ic)$$

Masculinity Index (MAS):

$$MAS = 35(m05 - m03) + 35(m08 - m10) + C(mf)$$

Uncertainty Avoidance Index (UAI):

$$UAI = 40(m18 - m15) + 25(m21 - m24) + C(ua)$$

Long Term Orientation Index (LTO):

$$LTO = 40(m13 - m14) + 25(m19 - m22) + C(ls)$$

Indulgence versus Restraint Index (IVR):

$$IVR = 35(m12 - m11) + 40(m17 - m16) + C(ir)$$

where m01 stands for mean score for question coded 01, etc. Codes are provided in the Appendix of this paper. The indexes normally have a range of about 100 points. Constants C(pd), C(ic), C(mf), C(ua), C(ls) and C(ir) can be added by users in order to shift index scores to values between 0 and 100. Constants can be positive or negative, depending on the nature of the samples, since it does not affect the comparison between countries. Since we studied the change in national culture during time, and not between countries, constants were removed from the calculations.

5.2. Sample characteristics

Total of 185 valid answers were collected. Majority of respondents were female students (Table 1). Almost 90% of respondents were age of 20-24 (Table 2) which shows that sample is homogeneous group of young people that present future work force that has the power to impact future innovation capabilities of Croatia.

Table 1. Sample characteristics: gender

Gender	Frequency
male	32,61%
female	67,39%

Source: own research

Table 2. Sample characteristics: age

Age	Frequency
Under 20	0,00%
20-24	89,19%
25-29	6,49%
30-34	2,70%
35-39	1,62%
40-49	0,00%
50-59	0,00%
60 or over	0,00%

Source: own research

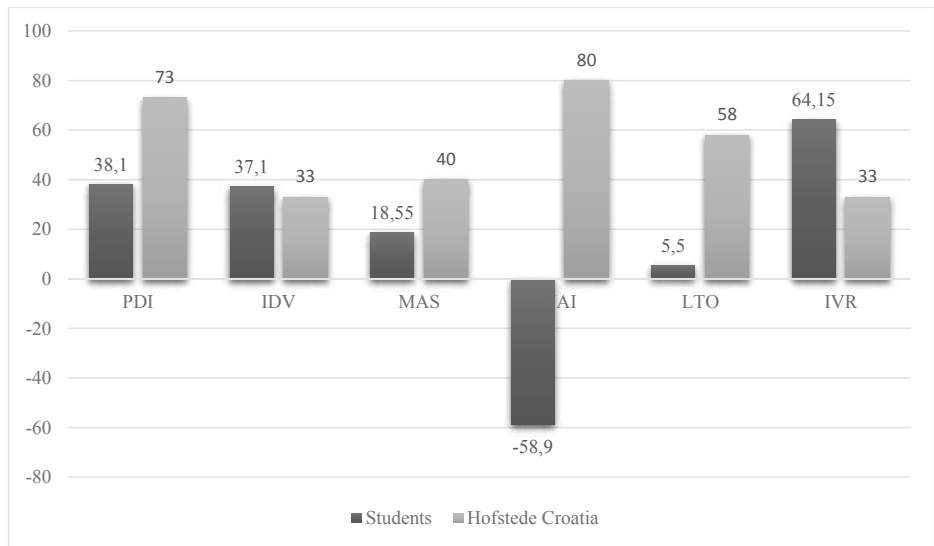
Regarding the education, majority of respondents have 14, 15 and 16 years of formal school or equivalent education (33%, 37% and 14% respectively). Regarding the nationality, all respondents are Croatian whereas those few that had different nationality at birth have either dual nationality or have changed it from Bulgarian (one respondent), Slovenian (two respondents) and German (one respondent) to Croatian.

5.3. Research findings and discussion

The results of our study are presented in Graph 1. and compared to those provided by Hofstede Insights (2018). Comparing the results of national culture between two samples it can be seen that students rank lower on power distance than general public in Croatia (38 compared to 73 index points), higher on individualism (37 compared to 33 index points), lower on masculinity (19 compared to 40 index points), extremely lower on uncertainty avoidance (-60 compared to 80 index points), lower on long term orientation (6 compared to 58 index points) and higher on indulgence (64 compared to 33 index points). It can be concluded that young educated generations give lower importance to hierarchy and structure, whether it is organizational or social, give higher value to equality of group members and wish to be able to contribute to the organisation's performance. Only slight increase in individualism shows that collectivistic values are strongly incorporated in all strata of our society, even when it comes to different age generations. Twice as low masculinity index indicates that young generations see both genders as equal and prefer to work in order to live and not vice versa. Massive drop in uncertainty avoidance reveals that new generations are going to break the rules and

are willing to work in an ever-changing environment, embracing failures as lessons not obstacles. Considerate drop in long term orientation shows their focus on quick results and their rights rather than obligations, as well as their aversion toward thrift. Twice as higher indulgence indicates their higher level of optimism, but also less moral discipline and higher importance on leisure.

Graph 1. Comparison of cultural dimension indexes of student sample and values provided by Hofstede Insights



Source: authors` presentation according to research results & Hofstede Insights (2018)

The major gap in index values between two samples occurs in uncertainty avoidance dimension (difference of 140 index points), followed by long term orientation (difference of 52 index points) and power distance (difference of 35 index points), whereas the smallest gap occurs in individualism dimension (difference of 4 index points).

If we view today’s students as tomorrow’s working force it can be argued that aforementioned gaps in index values between students and general public in Croatia can be viewed as forthcoming changes in national culture. The question remains how will this changes affect innovation rate in Croatia.

Building on the findings of Shane (1993), Didero et al. (2008) and Kaasa et al. (2010) it can be hypothesized that increase in individualism and decrease in power distance and uncertainty avoidance will have stimulating effect on innovation rate. On the other hand, building on the results of Lažnjak (2012) it can be hypothesized that lower masculinity could have detrimental effect on innovation rate. It should be noted that not only the scores of national culture dimensions are important for innovation, but their combinations as well.

4. CONCLUSION

It can be stated that Croatian national culture can be one of the factors hindering innovation at the national level. High levels of uncertainty avoidance, collectivism and power distance have all shown to be detrimental for innovation efforts in previous research (Shane, 1992; Didero et al., 2008; Kaasa et al., 2013). Lažnjak (2011) has confirmed these findings in the Croatian context as well. Research also shows that dimensions of national culture can change over time (Eisenhardt, 2008; Hofstede 2010). However, there is lack of knowledge on how do changes in national culture influence innovation. This is an interesting path for future research, especially when considering the lack of longitudinal culture research in general (Kirkman et al., 2017). In our study we show that a group of undergraduate students that can be seen as a new generation that will soon be entering the labour market and innovating organizations does indeed have some significant differences compared to existing national culture dimensions in Croatia.

However, these findings should be taken with consideration due to a small and specific sample. In order to be able to generalize the findings, the sample should be larger and include a more diverse group of young respondents. Also, this research can be seen as a first step in a larger longitudinal research effort that aims to see how do national culture dimensions change over time, and if this process has an influence on innovation. In order to do so, it is important to take into account other factors influencing innovation on national level, such as national wealth, GDP and technological breakthroughs.

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APPENDIX: QUESTIONNAIRE

Q1. Please think of an ideal job, disregarding your present job, if you have one. In choosing an ideal job, how important would it be to you to ... (please circle one answer in each line across):

- 1 = of utmost importance
- 2 = very important
- 3 = of moderate importance
- 4 = of little importance
- 5 = of very little or no importance

						code
have sufficient time for your personal or home life	1	2	3	4	5	01
have a boss (direct superior) you can respect	1	2	3	4	5	02
get recognition for good performance	1	2	3	4	5	03
have security of employment	1	2	3	4	5	04
have pleasant people to work with	1	2	3	4	5	05
do work that is interesting	1	2	3	4	5	06
be consulted by your boss in decisions involving your work	1	2	3	4	5	07
live in a desirable area	1	2	3	4	5	08
have a job respected by your family and friends	1	2	3	4	5	09
have chances for promotion	1	2	3	4	5	10

Q2. In your private life, how important is each of the following to you: (please circle one answer in each line across):

- 1 = of utmost importance
- 2 = very important
- 3 = of moderate importance
- 4 = of little importance
- 5 = of very little or no importance

						code
keeping time free for fun	1	2	3	4	5	11
moderation: having few desires	1	2	3	4	5	12
doing a service to a friend	1	2	3	4	5	13
thrift (not spending more than needed)	1	2	3	4	5	14

Q3. How often do you feel nervous or tense? (code 15)

- 1. always
- 2. usually
- 3. sometimes
- 4. seldom
- 5. never

Q4. Are you a happy person ? (code 16)

1. always
2. usually
3. sometimes
4. seldom
5. never

Q5. Do other people or circumstances ever prevent you from doing what you really want to? (code 17)

1. yes, always
2. yes, usually
3. sometimes
4. no, seldom
5. no, never

Q6. All in all, how would you describe your state of health these days? (code 18)

1. very good
2. good
3. fair
4. poor
5. very poor

Q7. How proud are you to be a citizen of your country? (code 19)

1. very proud
2. fairly proud
3. somewhat proud
4. not very proud
5. not proud at all

Q8. How often, in your experience, are subordinates afraid to contradict their boss (or students their teacher?) (code 20)

1. never
2. seldom
3. sometimes
4. usually
5. always

Q9. To what extent do you agree or disagree with each of the following statements? (please circle one answer in each line across):

- 1 = strongly agree
- 2 = agree

3 = undecided

4 = disagree

5 = strongly disagree

	1	2	3	4	5	code
One can be a good manager without having a precise answer to every question that a subordinate may raise about his or her work.	1	2	3	4	5	21
Persistent efforts are the surest way to results.	1	2	3	4	5	22
An organization structure in which certain subordinates have two bosses should be avoided at all cost.	1	2	3	4	5	23
A company's or organization's rules should not be broken -not even when the employee thinks breaking the rule would be in the organization's best interest.	1	2	3	4	5	24

Some information about yourself (for statistical purposes):

Q10. Are you:

1. male
2. female

Q11. How old are you?

1. Under 20
2. 20-24
3. 25-29
4. 30-34
5. 35-39
6. 40-49
7. 50-59
8. 60 or over

Q12. How many years of formal school education (or their equivalent) did you complete (starting with primary school)?

1. 10 years or less
2. 11 years
3. 12 years
4. 13 years
5. 14 years
6. 15 years
7. 16 years
8. 17 years
9. 18 years or over

Q13. If you have or have had a paid job, what kind of job is it / was it?

1. No paid job (includes full-time students)
2. Unskilled or semi-skilled manual worker
3. Generally trained office worker or secretary
4. Vocationally trained craftsperson, technician, IT-specialist, nurse, artist or equivalent
5. Academically trained professional or equivalent (but not a manager of people)
6. Manager of one or more subordinates (non-managers)
7. Manager of one or more managers

Q14. What is your nationality?

Q15. What was your nationality at birth (if different)?

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INFLUENCE OF ACCESSION TO EUROPEAN UNION ON PUBLIC DEBT OF REPUBLIC OF CROATIA

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Abstract

One of the most common problems in Croatia's economy for many years is the question of public debt. Over the past two decades excessive borrowing, followed by structural and economic changes of the state, lead to an alarming position of Croatian's public debt, and excessive borrowing proved to be a consequence of bad leadership in economic politics during recent years. Deficit that has been made had negative influence on every economic aspect of the state, and recent crisis and recession have worsened the situation, starting with GDP, lowering the investments, dropping the consumption and savings, excessive borrowing by the citizens, which have been left without primary incomes followed by the crisis. The state is also affected with emigration during the past few years, especially with younger population that is leaving the country, seeking better life and work conditions. All of the above leads Croatia to the position of the most undeveloped country of the European Union and to macroeconomic imbalance, although few positive changes are visible. Public debt that has been too high during the past few years has been overstated by the economic growth of the country, not only because of the loans, but also because all of that leads to many other negative consequences, like increasing public expenses due to the impossibility of its payment, and slow fiscal policy was not able to improve economic activity, and because of all that, the country is exposed to numerous risks, especially on financial markets. After long time of constant fall of GDP and increase of the public debt, for the last few years some of the positive changes have been recorded, but they are still not enough to make the situation in the state satisfactory.

Key words: excessive borrowing, economic policy, gross domestic product, global competition, public debt, structural changes

1. INTRODUCTION

The Republic of Croatia is a country that has been heavily affected with the recent crisis and recession, and their consequences are still visible today in almost all economic sectors, and being itself a relatively young state, that gained its independence before a little over two decades, the debts from the former state and privatization, along with unfavourable situation in its environment and the instability on the political scene,

have been a good basis for the emergence and rapid spread of the crisis. In the period from 2008 till today, Croatia's debts have rapidly grown and caused instability on financial markets that continues today. Croatia's public debt has been unstoppably growing over the last years, which creates problems in the entire economy and limits the country's development, and the ungrateful political situation also largely influences the growth of the borrowing and the increasing costs of the public debt. The accession of Croatia to the European Union has brought a series of ordinances and regulations it has to comply with, regarding the public debt as well, but, nevertheless, the problem of the public debt in Croatia is still present, its future is uncertain, because we are all aware that this problem brings along many other issues, like the growth of the interest rates, the drop of demand for the government bonds, the increase of the inflation rate etc.

2. LITERATURE REVIEW AND THEORETICAL BACKGROUND

2.1. *The concepts of GDP and public debt*

Gross domestic product is a measurement of a country's overall economic activity and it represents the total value of all the produced goods and services in an economy in the specific period, most often for the period of one year. So, a country's GDP represents the total value of the goods produced in the country, regardless of who owns the production. If a company with foreign ownership produces and sells the goods in the country, it enters GDP, and the profits made abroad by the domestic companies are not included in GDP. The most important index of economic activity since the beginning of the 1990s in almost every country has been GDP, which enables the comparison of the economic state among different countries (Vojak *et al.*, 2013).

There is a difference between the nominal and the real GDP. The nominal GDP is expressed in the current prices and is simply calculated as the sum of the produced final goods and services multiplied with their current prices. Considering that current prices are not constant, but rather changing for various reasons, the nominal GDP expresses the flow of the actual GDP and the flow of the prices. The real GDP is calculated if the flow of the prices is excluded from the nominal GDP and by inflation and deflation of GDP, where GDP is calculated based on the constant prices; if the prices in the observed period increase, their influence is eliminated by deflation, and if they decrease, then inflation is used (Benić, 2016).

The public debt of the government is the amount that the government has borrowed to finance the previous deficits. Often, the term "debt" is used, meaning "deficit". The difference between the two terms can be simply explained: if the government expenditure is bigger than its income, the government budget shows a deficit that has to be financed with borrowing. The amount of the deficit increases the debt and only budgetary surplus can reduce it (Ralašić, 1993). Over the last 25 years, significant levels of the public debt and foreign finance have led to macroeconomic vulnerability more than to economic growth of the developing countries, and this theory has its grounds not just on the examples of the countries with traditionally big inflation, but also in other countries that have a long tradition of smart managing macroeconomic policy and rapid

economic growth (Gill and Pinto, 2005). Smilaj (2004) defines public debt as the sum of debts made by the government budget, non-budgetary funds and agencies and local and regional government units, i.e. as the total general debt of a country. Public debt is an accumulated surplus of expenditure over income that is realised in the previous period. On the other hand, budgetary deficit shows that government expenditure is bigger than its income, so the amount of deficit increases the debt that has to be financed through borrowing (Kolačević and Hreljac, 2011).

The public debt can be financed with fiscal policy, i.e. with taxation or borrowing on the domestic financial market (bank loans or issuing public debt bonds – gilt bonds on the domestic capital market) or with borrowing on foreign financial market (from the modern financial institutions or issuing public debt bonds on the foreign capital markets denominated in different currencies) and with selling the assets (e.g. income from privatization). One of the possibilities is also borrowing from the central bank in the form of direct loans or when the central bank buys the government bonds. Indeed, in many less developed countries one of the tasks of the central monetary government is to credit the state with minimum interest rates; besides having the effects of inflation, this form of financing public debt is in complete opposition with market principles which require that all financial needs be satisfied on the market under equal conditions, even if the government is in question (Kolačević and Hreljac, 2011).

The state can finance the public debt, i.e. return the principal and the interests by issuing the bonds, increasing the taxes or by selling its assets. Selling the bonds of the government treasury is termed debt monetization, for the central bank, in order to buy government bonds, has to create money (Kesner Škreb, 1994). Deficit financing via public debt means selling bonds with the obligation to pay off the debt by instalments over the specific number of years, and in the end, and usually the principle is paid off in the end. Upon buying and selling the bonds, there is no compulsion, but it is rather performed voluntarily, the state competes on the market with other borrowers and pays the requested interest. Deficit financing does not necessarily decrease the investments; their decrease will occur only due to the lack of conformity between the fiscal expansion and restrictive monetary policy that does not allow the growth of the monetary offer along with the growth of demand (Ralašić, 1993).

2.2. The state of economy in the Republic of Croatia and the overview of GDP

The crisis that emerged in 2008 overtook many countries whose economies and economic state was much more stable than Croatian, so it is not surprising that Croatian economy has not gone through the whole process of the crisis and recession intact. The question is what has caused today's poor economic condition in Croatia, and it can be said that it is the consequence of all what happened and has been happening over the last 20 plus years, since the independence and the imposed War of Independence from 1991 to 1995. Then, inadequate model of privatization, where service activities, especially commerce, have become dominant and where "young Croatian entrepreneurs" strived to get rich by selling second-rate goods from abroad at first-rate prices, without investing in production. According to all of the analyses, at the crisis peak, Croatia was in far

worse shape than it was before the War of Independence, with significantly deteriorated economic structure, where service activities and finance tried to “pull” the economy, but industry and agriculture were falling behind (Benić, 2012).

The consequences of the recession have largely affected the unfavourable flows in retail, which is in large part conditioned with lowering of employment, credit restrictions and decrease of the citizens purchasing power. Negative flows have been recorded in industry as well, and they are the result of lower demand for the processing industry sectors which is the most important element of the entire industrial production in the Republic of Croatia. The Croatian National Bank has played an important role in mitigating the effects of the recession, which is especially evident in lowering the obligatory bank reserve requirements and releasing a share of the central bank currency reserves, which have all been useful tools for alleviating the crisis, but, for the significant imbalance in Croatian economy to be solved, it is necessary to create a new model of economic development (Butorac *et al.*, 2009). The economic crisis period was also for Croatia a period of an extreme need for government financing, not only for the distorted fiscal balance and the rise of nett government debt; an additional reason for the rising need for financing was the due date for the existing public debt payment, as well as the need for financing the returning of the debt to the pensioners, due to which the increase of the debt surpassed the amount of the annual deficit. The need for financing at the government level was for those reasons very high in 2009 and 2010, when it amounted to 8.4, i.e. 11% of GDP (Švaljek and Andabaka Baturina, 2011).

Table 1. Economic indexes of the Croatian economy for the selected years

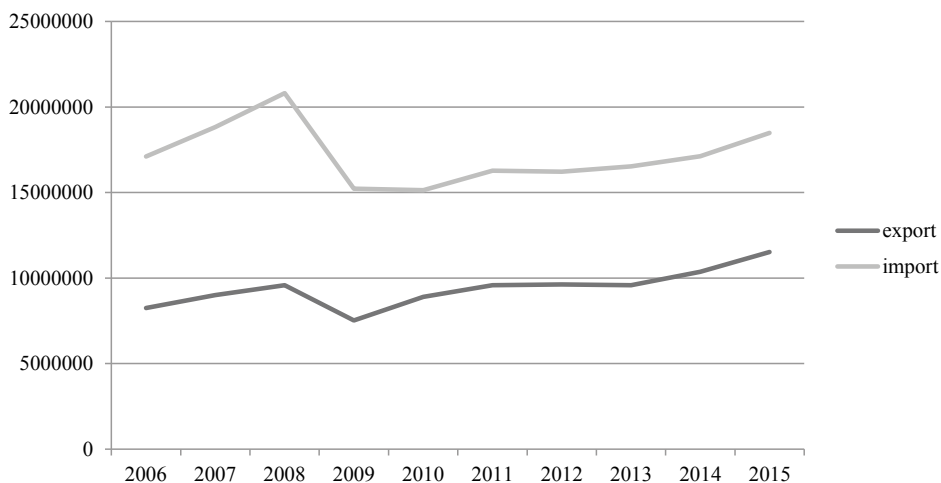
	2000	2005	2008	2009	2011	2013	2015
GDP (mil. HRK)	176,690	270,191	347,685	330,966	332,587	329,571	334,219
GDP per inhabitant (EUR)	5,299	8,467	11,169	10,480	10,453	10,225	10,364
Real GDP change	3.0	4.2	2.1	-7.4	-0.3	-1.1	1.6
Inflation rate	4.6	3.3	6.1	2.4	2.3	2.2	-0.5
Current account balance of payments (mil. EUR)	-568	-1-892	-4-228	-2-300	-315	443	2.260
Current account balance of payments (% GDP)	-2.5	-5.2	-8.8	-5.1	-0.7	1.0	5.1
Export of goods and services (% GDP)	40.7	39.4	38.5	34.5	40.5	43.1	50.0
Import of goods and services (% GDP)	45.1	45.5	46.5	38.2	40.9	42.7	47.2
Foreign debt (mil. EUR)	12,264	25,990	40,590	45,600	46,397	45,958	45,534
Foreign debt (% GDP)	53.0	71.2	84.3	101.1	103.7	105.6	103.7
Gross international reserves (mil. EUR)	3,783	7,438	9,121	10,376	11,195	12,908	13,707
Government debt (% GDP)	34.5	41.3	39.6	49.0	65.2	82.2	86.7
Unemployment rate	16.1	12.7	8.5	9.2	13.7	17.3	16.3
Employment rate	42.6	43.3	48.6	48.2	44.8	42.1	44.1

Source of the table: Butorac, G. (2017), p. 8

2.2.1. Trade exchange between Croatia and the foreign counties

Along with the already-mentioned slowdown of the global economy growth, the most important factors of Croatian export and import in 2016 were the continuation of a steady, yet stable growth in the European Union, Croatia's most valuable foreign trade partner, continual drop of raw oil prices, other energy products and raw materials, but consequently, also a series of products on the global market and further use of the advantage of free trade that the accession to the EU has enabled. The growth in the European Union was slightly slowing down, from 2.2% in 2015, to 1.9% in 2016, but this rate was nevertheless among the higher ones in the period after the critical 2009. The countries of the EU that are the most important foreign trade partners of Croatia also recorded relatively high growth rates (Croatian Chamber of Economy, 2017). As the following chart suggests, foreign trade exchange balance of the Republic of Croatia realised its record results in 2008, when export amounted to 9,585.134 thousand EUR, and import 20,817.147 thousand EUR, and, over the following years, there was a drop of foreign trade exchange due to global economic crisis and recession. The recovery was recorded in 2011, when foreign exchange trade of goods and services increased, but did not still achieve the levels from previous years before the crisis. The chart shows that foreign exchange balance in Croatia is definitely out of balance, import of the goods and services is constantly rising, and although in the last years there has been some increase regarding export of the goods, it has yet not achieved a satisfactory level.

Chart 1. Foreign trade balance of the Republic of Croatia for the period from 2006 to 2015 (in thousand EUR)

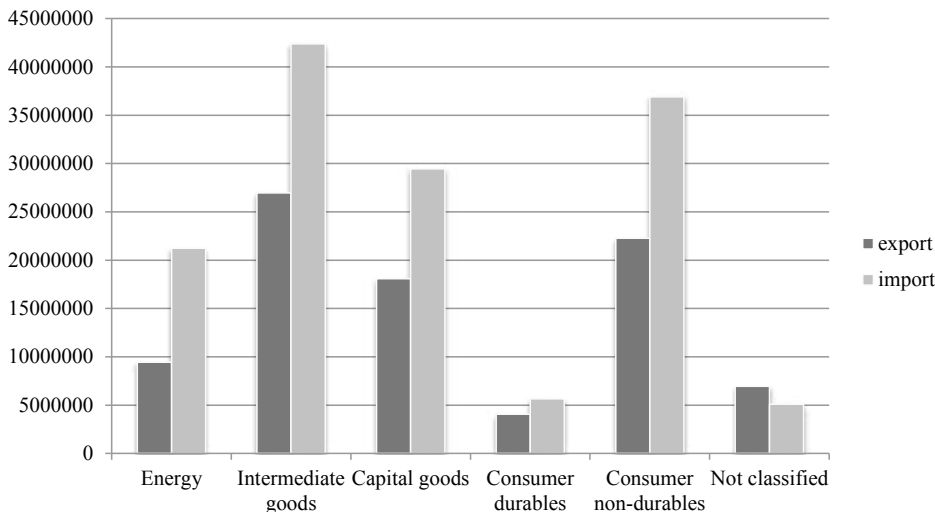


Source of the chart: Authors' Calculations according to the data from Croatian Bureau of Statistics (2016). *Statistical Yearbook of the Republic of Croatia 2016*. Zagreb, Croatian Bureau of Statistics, p. 400.

The following chart shows that export of the Republic of Croatia is in all the observed sectors lower than its import, so it follows that in 2015, Croatia imported energy

in the amount of 21,247,292,00 HRK, which is more than double than the export whose amount was 9,449,401,00 HRK. The same situation is present in the intermediary and capital products, as with the non-durable consumer goods. Statistics show that Croatia mostly imports electrical energy, and several types of wheat like oat and rye, although the country possesses huge potentials for a self-contained supply, especially in Slavonia, but they are not used properly, nor anything is being done considering the investments and help to the producers of these products. Likewise, pork and corn, milk and dairy are also imported, while the export of the wood products and the products from the fishing industry is recorded. Additionally, it is important to mention that over the last few years, there has been an increase of the export of exotic plants, like pineapple, kiwano etc., which is contradictory, since products distinctive of this area and for which growing there is plenty of space (like the wheat) are being imported.

Chart 2. Export and import in the Republic of Croatia in 2015 (in thousand HRK)



Source of the chart: Authors' Calculations according to the data from Croatian Bureau of Statistics (2016). *Statistical Yearbook of the Republic of Croatia 2016*. Zagreb, Croatian Bureau of Statistics, p. 401.

Due to its comparative advantages, i.e. the agricultural resources, land, natural resources, favourable climate and the water resources, Croatia has agreeable opportunities for agricultural development. Croatia, with around 0.65 ha of farmable land per capita, enters the group of countries fairly rich in agricultural land, but rational management of the land has been hindered by many factors: inherited issues of the fragmented private land, constant loss of agricultural land due to urbanization, the until recently undefined management of the government land, a considerable share of uncultivated and neglected land etc. Around two thirds of the entire agricultural land are owned by family agricultural businesses, and the remaining third is in the government ownership. More than 70% of those family businesses have less than 3 ha, those being often very fragmented, with very little technology, and there are very few vital and market-orient-

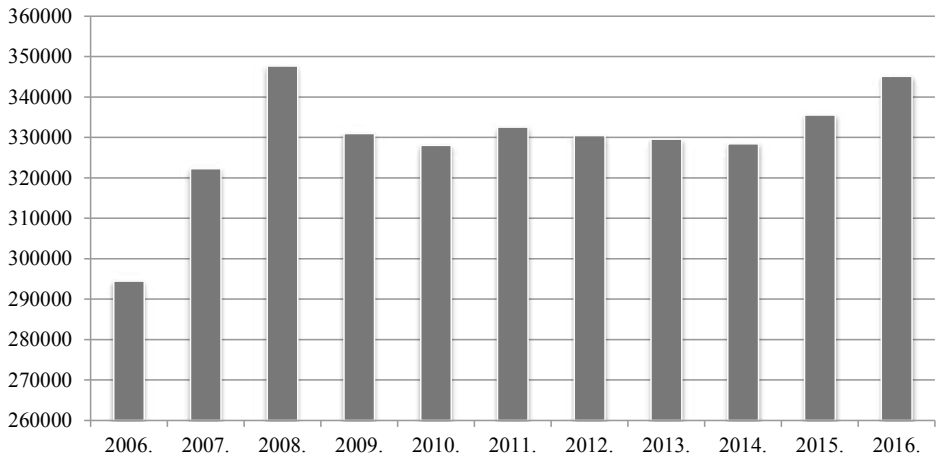
ed businesses than could fairly deal with the import competition (Franić and Žimberk, 2003). It is impossible to anticipate in advance the actual effects of entering the unique market of the European Union on Croatian economy, but the experience of many Member States suggests that upon the accession, there is a considerable increase of the export of goods measured with the share in GDP. If the period from 2000 to 2012 would be divided into three sub periods – the period before the accession to the EU, from 2000 to 2004, the period immediately after the accession, from 2005 to 2008 (regarding the countries of the Middle and Eastern Europe -Lithuania, Latvia, Estonia, Poland, Czech Republic, Slovakia, Hungary and Slovenia), and the period of the global recession, from 2009 to 2012, where it is evident than new Member States were experiencing a constant growth of the share of exported goods in GDP. In the period before the accession to the EU, new Members, on average, exported the goods in the amount of 39% of GDP, and this level rose by 11.5% in the period from 2009 to 2012, despite the crisis. At the same time, Croatian export of goods in the entire period stagnated at a very low level, around 20% of GDP, so between Croatia and other new Member States there arose a big discrepancy regarding the trade of goods, where they today, in terms of GDP, export on average 2.5 times more than Croatia (Švaljek, 2013).

2.2.2. Movements in GDP through the years and the influence of the economic crisis on GDP

In the first quarter of 2017, nothing spectacular happened. Most categories of the demand continued to grow, and the growth was in fact more dynamic than in the first quarter of the last year, where GDP increased by 2.7%. The most noticeable was the export of goods and services whose growth rate increased from the last-year's 6.9% to 8.6%, as the consequence of a considerably more dynamic growth of the export of goods. At the same time, the only category of demand whose growth was slightly slower were the investments in the fixed capital. However, the first quarter of that year recorded a considerably more dynamic growth of import of the goods and services. Its growth rate increased from 5.6% to 10.1%, while its annual growth, observed in constant prices, was by 58.6% higher than its growth in the same quarter of the last year (Croatian Chamber of Economy, 2017).

The overall situation in Croatia did not much differ from the circumstances in other countries of Southeast Europe – reduction of GDP, increase of the deficit of the government budget, decrease of the deficit of the current account balance of payments and high government expenditure. The average regional direct foreign investments that in 2007 and in 2008 were 27.8 billion USD, in 2009 were almost cut in half to 14.3 billion USD. While some indicators, like the economic growth and the flow of direct foreign investments were strongly affected by the crisis, Croatia had been facing the issues it should had dealt with before, because it lived too long beyond its possibilities, and in the crisis, it led itself to the situation where it had to pay off expensive international and domestic debts that came due (Ott, 2010).

Chart 3. GDP of the Republic of Croatia for the period between 2006 and 2016 (in mil. HRK)



Source: Authors' Calculations according to the data from Croatian Bureau of Statistics (2016). *Statistical Yearbook of the Republic of Croatia 2016*. Zagreb, Croatian Bureau of Statistics, p 217.

3. METHODOLOGY AND RESULTS

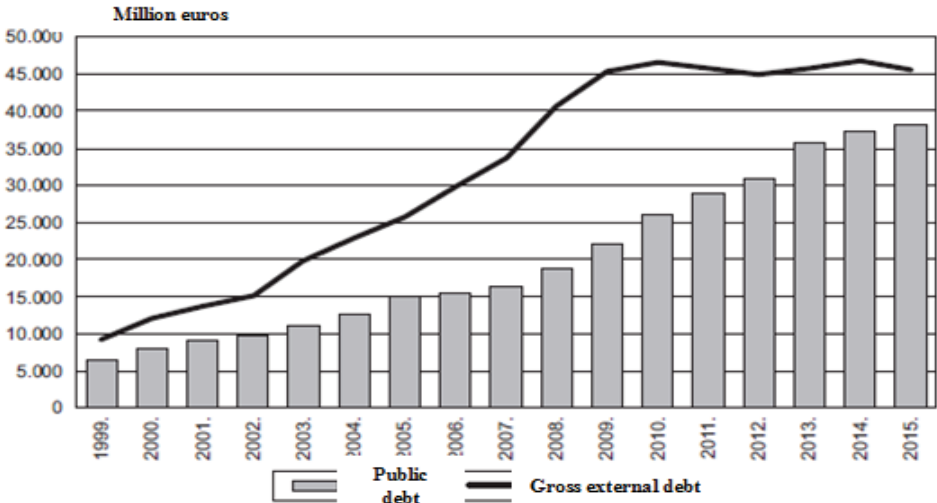
After the crisis left its significant stamp on the entire Croatian economy, one of the most challenging and most stricken sectors of the economy is GDP, and an especially big problem that has arisen is the public debt which was unsatisfactory even before the crisis. In line with that, the purpose of this paper is to investigate the share of the public debt in GDP before and after Croatian accession to the European Union. The goal of the research is the deep analysis of the state of affairs in the economy of Croatia, especially regarding the public debt, and understanding its state before and after the accession, i.e., to analyse the reasons which have led to the crisis of the public debt. The research was conducted on the example of the public debt of Croatia in the years prior and after its accession to the Union of European nations, i.e. for the period till the present day. The process of collecting data included the available statistical reports from the Croatian Bureau of Statistics, the Croatian National Bank and other official sources in the Republic of Croatia. The goal was to examine the economic market and the state of Croatian economy, along with the influence of the economic crisis and recession on the public debt and the movement of the public debt through the years.

Regarding Croatia, the data on the public debt are insufficient and incomplete for the entire period before the year 2000, where the situation till 1994 is especially difficult to recreate. With the impossibility to borrow abroad till 1996, i.e. until assuming the inherited obligations from the previous state, Croatia could only rely on the borrowing on the domestic market, using the reserves and the savings in the citizens and company's sector and in the banking sector, therein transferring the obligations into the future periods. The accumulated issues regarding the payment of the citizens savings in foreign currencies, unpaid dues of the companies towards the banks and the crisis in the

banking sector have been solved by forming of the public debt, i.e. by issuing the bonds that are payable in the future or can be used in the processes of privatization of the companies and the buying out of the so-called social flats. So, since 1991 there has already existed the trend of issuing the bonds of old savings in foreign currencies and the so-called high-yield bonds, since 1993, the bonds for restoration followed, and till 1996, the deficits and bad debts have been accumulated in the banking sector whose restructuring has been dealt with the issuing of the Bank Restructuring Agency bonds. Until relations with the governments that are members of the Paris Club and the commercial banks members of the London Club hadn't been regulated, foreign debt of Croatia was negligible, and after taking on the obligations towards the 15 states - creditors of the Paris Club in March 1995, in the amount of 1,086,900,000 USD and towards the banks - members of the London Club in 1996, in the total amount of 1,462,222,000 USD, the total public debt of Croatia in 1996 grew to about 30% of gross domestic product (Croatian Chamber of Economy 2015:4). According to the data from the Government of the Republic of Croatia (2016) the public debt at the end of May 2016 was 285 billion HRK, which is 84.1 million less than in April and 4.8 billion HRK less than in May of the last year, and the Croatian Chamber of Economy (HGK) points out that the public debt has been reducing on a monthly level for the fourth time in a row, and annually, for the third time in a row, and the tendency of lowering the gross foreign debt has been continued. A more favourable economic situation followed by the growth of GDP and the growth of budgetary income has enabled a better budgetary situation, especially because the temporary financing regime and the later office of the technical Croatian government have impeded the growth of budgetary expenditure. In relation to the end of 2016, all the components of the public debt have decreased, most of all the bond debt (by 4.6 billion HRK), then credits (by 2.7 billion HRK) and the short-term debt that has been reduced by 40.5 million HRK.

Certain influence on the public debt movement has been exerted by the changes in the comprehension and classification of the reporting units and the processes of companies' restructuring (shipbuilding, air transport, railway) during which a considerable part of the obligations has been transferred into the public debt. Likewise, a part of the government guarantees, that were not paid on time by the companies, has been transferred into the public debt by the rule of the third call. Principally, the contribution to the forming of the total public debt in Croatia, with accumulation of a high budgetary deficit, has been made by the financing of the road infrastructure, the processes of restructuring the companies and the banks sponsored by the state, taking on the obligation towards the citizens (old savings in foreign currencies) and effecting the generously issued government guarantees (Croatian Chamber of Economy, 2015). The social security funds, according to the ESA 2010 methodology, include the Croatian Pension Insurance Institute, the Croatian Health Insurance Fund and the Croatian Employment Service (Croatian National Bank - HNB, 2016).

Figure 1. Movement of the gross foreign and the public debt in Croatia in the period from 1999 to 2015



Source: Butorac, G. (2017), p. 10

The following table shows the internal government debt for the period from 1999 to 2017. It can be noticed that the internal debt of the central government grew from 16.37 billion HRK in 1999 to 182.24 HRK in 2017, which is the increase of 1012%, and the internal debt of the local government grew by 371.69% in the same period. Observing the internal debt of the social security funds, it is evident that it has decreased, and it can be concluded that internal debt of the central government makes the most of the total general government debt.

Table 2. Internal debt of the general government for the period from 1999 - 2017 (in million HRK)

Year	Internal debt of the central government	Internal debt of the social security funds	Internal debt of the local government
1999	16,377,5	1,176,5	943,7
2000	16,574,3	5,781,3	1,223,4
2001	19,640,3	6,342,5	1,299,5
2002	24,317,1	8,202,6	1,428,3
2003	29,010,3	6,45,6	1,632,3
2004	38,395,1	4,434,7	2,037,9
2005	50,560,5	4,352,8	1,952,9
2006	53,017,0	5,520,8	2,106,3
2007	52,599,9	6,639,8	2,361,6
2008	68,256,8	3,242,3	2,384,2
2009	79,958,0	3,904,0	2,442,5
2010	103,140,8	1.0	3,756,9

Table 2 - continued

Year	Internal debt of the central government	Internal debt of the social security funds	Internal debt of the local government
2011	123,934,1	2,3	3,854,3
2012	133,139,0	1.6	3,768,0
2013	151,826,0	0.9	4,761,2
2014	160,889,2	3.5	5,174,5
2015	166,771,6	1.9	4,959,0
2016	176,249,6	0.6	4,673,2
2017	182,246,2	0.3	4,451,2

Source: Authors' Calculations based on the data from the Croatian National Bank (available at: <https://www.hnb.hr/statistika/statisticki-podaci/opca-drzava/dug-opce-drzave>, accessed: 02.08.2017.).

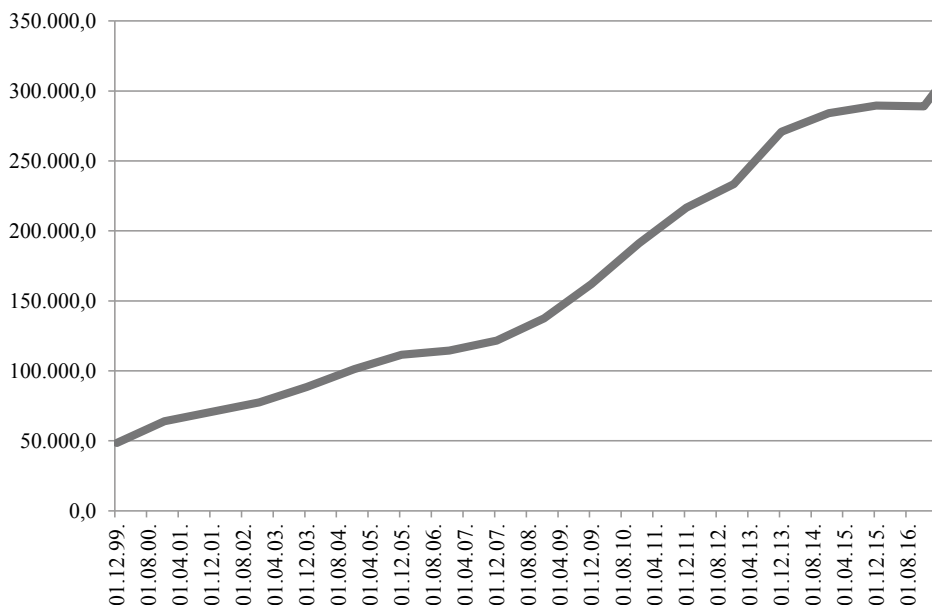
The public debt of the general government at the end of 2015 reached the level of 289.6 billion HRK, i.e. 86.7% of GDP. This high level of the public debt represents a big burden to the total economic policy and with its related risks, it facilitates the vulnerability of the public finance. Cyclic disturbances in the period from 2008 to 2015, followed by the structural rigidities, demonstrated consequential proportions and the speed of the public debt expansion, which in that period grew by 152 billion HRK, or, measured by the share in GDP, from 39.6% to 86.7% (Ministry of Finance, 2017).

Table 3. Foreign debt of the general government for the period from 1999 to 2017 (in million HRK)

Year	Foreign debt of the central government	Foreign debt of the social security funds	Foreign debt of the local government
1999	28,858,9	1,188,3	419.2
2000	39,338,4	1,161,7	452.0
2001	42,548,2	1,111,3	474.9
2002	41,134,8	2,557,6	389.9
2003	47,231,4	4,251,1	316.0
2004	49,136,2	7,689,5	240.6
2005	46,208,6	8,689,1	241.1
2006	45,244,8	8,862,1	190.9
2007	50,260,0	9,898,8	321.9
2008	61,669,8	1,998,0	421.7
2009	73,500,2	1,891,9	736.4
2010	83,917,3	0.0	656.7
2011	88,524,2	0.0	564.6
2012	96,297,9	0.0	512.7
2013	113,951,9	0.0	483.4
2014	117,833,8	0.0	481.0
2015	117,702,6	0.0	413.6
2016	108,109,6	0.0	375.3
2017	113,413,1	0.0	369.4

Source: Authors' Calculations based on the data from the Croatian National Bank (available at: <https://www.hnb.hr/statistika/statisticki-podaci/opca-drzava/dug-opce-drzave>, accessed: 02.08.2017.).

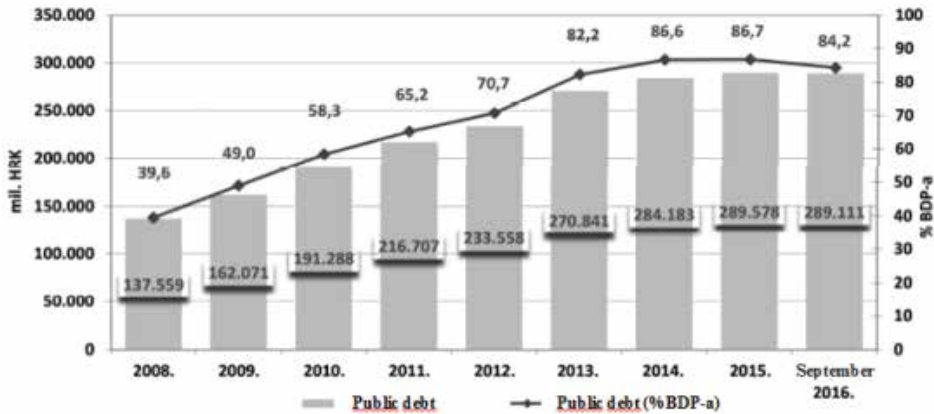
The above table shows the foreign debt of the general government for the period from 1999 to 2017. It is evident that the foreign debt of the general government grew from 28.86 billion HRK in 1999 to 113.41 billion HRK in 2017, and the foreign debt of the social security funds grew till the year 2007, after which it decreased. Also, while observing the foreign debt of the local government, it is evident that it decreased after 2009 by 49.83%. The Croatian National Bank anticipates that the share of the gross foreign debt in GDP will drop below the level of 100%, which is a positive shift, but Croatia will still remain a highly indebted country with high risks and heavy burden of servicing the created debt. Nevertheless, positive trends in the movement of the public and the gross foreign debt can create more favourable environment for the possible improvement of the credit rating and therein for cutting down the costs of the borrowing (Government of the Republic of Croatia, 2016.). Looking at the debt instruments, the major share of the public debt has been created via issuing the long-term debt securities, i.e. the bonds (56.1%), followed by the loans (37.4%) and the short-term debt securities (6.5%). The currency structure of the public debt points to the fact that a significant part of the debt has been denominated into foreign currencies, where the debt denominated in Euros is 74.4%, the debt in Kuna 21.4%, and the debt in US dollars 4.1% of the total debt. A very small share of the debt is denominated in the Swiss francs. The debt denominated in Euros has been gradually increasing over the last years, and it is for the most part the result of the issued domestic and foreign bonds denominated in Euros, the borrowing on the domestic market via the syndicated credits and the use of the project loans from international financial institutions. The time structure of the public debt shows that at the end of 2015, the share of the public debt with its due up to one year in the total debt was 6.7%. The share of the public debt payable between one and five years was 16.4%; the share of the debt due in the period from 5 to 10 years was 37.3%, and the debt with the payment date over 10 years was 39.6% of the total public debt (Ministry of Finance, 2017). The total debt of the general government at the beginning of 2017 was 300.14 billion HRK, which, compared to the year 1999 (when it was 48.47 billion HRK), is the increase of 519.2%. The chart shows the constant growth of the general government public debt in the period from 1999 to 2017, and the global crisis and recession have only contributed to that growth.

Chart 4. Total general government debt (in million HRK)

Source: *Authors' Calculations* based on the data from the Croatian National Bank (available at: <https://www.hnb.hr/statistika/statisticki-podaci/opca-drzava/dug-opce-drzave>, accessed: 02.08.2017.).

The drop of the public debt was nevertheless recorded in 2016, and this happened due to the dramatic drop of the foreign debt of 10.8 billion HRK, which is a staggering 9.2% on an annual level, and after the delay of the issuance of the Eurobond last year, a changed structure of the government debt has been noticed, benefiting the borrowing on the domestic market. The share of the domestic debt in the public debt has increased by 3.6 percentage point to 63.2%. Regardless of the drop of the public debt, which has resulted in lower foreign vulnerability and better timing, interest and currency structure, high costs of the servicing during the following period will still put pressure on the Croatian public finances (Blašković, 2017). As it is stated in the Public Debt Management Strategy for the period from 2017 to 2019, at the end of September 2016, the public debt was 289.1 billion HRK, or 84.2% of the estimated GDP for the year 2016, wherein the nominal decrease of 467.4 million HRK in relation to the end of the year 2015 was recorded.

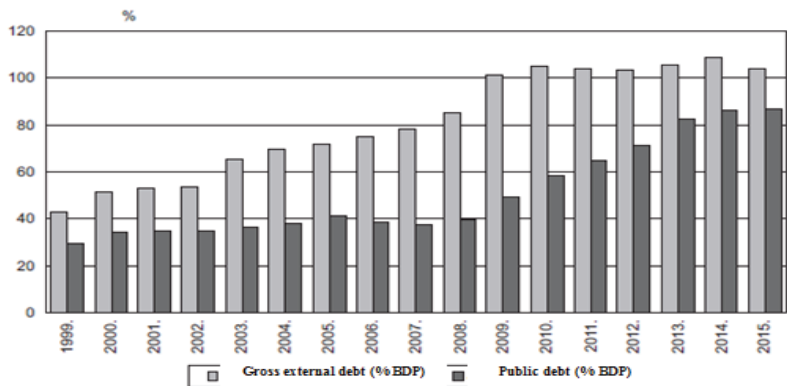
Figure 2. Public debt movement for the period from 2008 to 2016



Source: The Republic of Croatia, Ministry of Finance (2017), Public Debt Management Strategy for the period from 2017 to 2019, p. 10.

According to relatively optimistic projections from the Stability and convergence programme of the Republic of Croatia for the period from 2015 to 2018, a high budgetary deficit will continue, being 5.0% of the GDP, which will also bring the level of the public debt to the alarming 90% of the GDP. The Programme anticipates the growth of the debt till the level of 92% of the GDP during 2017, after which its share in GDP should stagnate and begin to drop. It is obvious that not even with the historically low debt on the global financial markets, Croatia cannot avoid the “snow ball” effect, regarding the fact that slow economic growth will still not surpass the costs of borrowing connected with the unfavourable credit rating. In principle, the increase of the newly added value will be used for the servicing of the existing obligations, and not for the purpose of the country’s development (Croatian Chamber of Economy, 2015).

Figure 3. The share of the foreign and the public debt in GDP of the Republic of Croatia for the period from 1999 to 2015



Source: Butorac, G. (2017), p. 11.

The sustainability of the public debt represents the key macroeconomic risk of the Croatian economy and it is therefore of great importance to realise the planned fiscal adjustment whose goal is to return the share of the public debt in GDP at a sustainable path. Based on the existing fiscal projections of the government budget for the period from 2017 to 2019, and in line with the projected movements of the income and expenditure of the other levels of the general government budget, including the projections of the deficit/surplus of the public companies and other units included in the general government sector, it is expected that the planned deficit of the general government will be 1.6% of the GDP for the year 2017, 1.0% in 2018, and 0.6% of the GDP in 2019. In line with the movement of the deficit of the consolidated general government, and taking into account the planned privatization income and the change in the state of the deposit, it was expected that the share of the public debt in GDP recorded a significant reduction in 2017, with which the assumptions for Croatia's exit from the procedure of the excessive budgetary deficit will be fulfilled, and with the further sustainable, reasonable and balanced fiscal policy, Croatia will ensure the safe return of the credit rating at the level of investments and the long-term decrease of the burden caused by the debt (Ministry of Finance, 2017).

Table 4. Estimated total deficit/surplus of the general government

	Plan 2017	Projection 2018	Projection 2019
GOVERNMENT BUDGET			
Total deficit/surplus	-6,185,883	-5,659,607	-3,938,932
% of the GDP	-1.9	-1.5	-1.0
NON-BUDGETARY USERS			
Total deficit/surplus	948,949	1,18,101	709,985
% of the GDP	0.3	0.3	0.2
LOCAL GOVERNMENT			
Total deficit/surplus	222,910	245,775	266,870
% of the GDP	0.1	0.1	0.1
CONSOLIDATED GENERAL GOVERNMENT			
Total deficit/surplus	-5,644,023	-4,228,732	-2,962,077
% of the GDP	-1.6	-1.1	-0.8
PUBLIC COMPANIES			
Total deficit/surplus	-103,111	334,998	376,521
% of the GDP	0.0	0.1	0.1
OTHER ADJUSTMENTS			
% of the GDP	0.0	0.0	0.0
CONSOLIDATED GENERAL GOVERNMENT			
Total deficit/surplus	-5,687,747	-3,828,986	-2,541,075
% of the GDP	-1.6	-1.0	-0.6

Source: The Republic of Croatia, Ministry of Finance (2017), Public Debt Management Strategy for the period from 2017 to 2019, Zagreb, p. 28.

4. CONCLUSION

The Republic of Croatia is a country that has been affected by the recession much more than other European countries in the last years, and the difficult situation is still evident today. Structural changes that occurred in the 1990s, the process of separation from the former state and the debts inherited from the previous state, as well as poor management, have not yielded good results, which has negative consequences on almost all the aspects of the economy. Gross domestic product, by definition, represents the total value of all the produced goods and services in an economy, and it is mainly observed on an annual level, and it is GDP that has been most affected by the recession and the economic crisis. GDP of the Republic of Croatia has been extremely poor in relation to other Members of the European Union, and the drop of GDP was in fact recorded six years in a row, which has brought the country in an unfavourable position, and it also brought a number of other aspects, like many companies going under because of the crisis, which also has led to losing many workplaces, and furthermore, to inability to employ the people who lost their jobs. Moreover, people save less and spend less, and the stable and long-term economy growth is still not on the horizon, although the situation has somewhat improved in the last two years. The period between 2009 and 2014 was very difficult for the Croatian economy, and Croatia stood out among the Member States as the one having the biggest drop, i.e. the slowest economic growth, and as the country most affected by the crisis. During the mentioned period, there was a drop in the industrial production, the extinction of shipbuilding, the reduction of salaries and pensions, and the budgetary income was constantly decreasing, while the expenditure was rising. The public debt of the Republic of Croatia was continually growing for eight consecutive years and the issues connected with the public debt have not yet been solved at the government level, so the situation is still alarming. The public debt is mostly created with the borrowing via long-term bonds, credits and short-term bonds. Because of the inability to pay off the obligations, the country has been slipping into further debts and also there were other numerous obligations of the state that have been transferred into the public debt, which has caused its unsustainability. Besides that, unfavourable demographic trends Croatia is facing over the last years (especially the emigration of many young people), have reflected on the public debt as well; although they are not yet so evident, they will create problems in the near future regarding the sustainability of the pension and the health system. In 2016, the Republic of Croatia, after eight years of growth, recorded the drop of the public debt, and at the end of the year it had around 85% of the share in GDP. Also, GDP grew after many years of stagnation. The decrease of the public debt was caused by the lower foreign borrowing, and more favourable conditions and lower interest rates on the domestic market influenced its reduction. This change in the financing structure led to more borrowing on the domestic market. The drop of the share of the public debt in GDP in future will mostly depend on the ways and the continuity of the application of the fiscal consolidation, as well as on the measures of the development policy, which is especially important, for the public debt is a great burden to the state and economic policy, and its reduction is of great significance for the survival of the public finances. It is therefore necessary to ensure the measures for its long-term sustainability, to conduct regular evaluations and apply management strategies of the public debt, and to ensure the continuance of positive movements of the

public debt, which is particularly important for improving the credit rating of the state, and the removal of macroeconomic imbalances. Although in the last year and a half the public debt has slightly reduced, the Republic of Croatia is still in a very vulnerable position, and the changes that could happen in its surroundings will have an immediate negative impact on the interest rates and the changes in the economy, which can again lead to a slower economic growth and the drop of GDP. It is necessary to conduct deep structural reforms that would have positive effects on the structure of the expenditure and on the government budget, and therein, positive movement of the country's economic growth.

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TESTING CROSS-CULTURAL VALIDITY OF RESEARCH INSTRUMENTS IN MARKETING RESEARCH OF CONSUMERS

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Abstract

In conditions of globalization of business, it is of the great importance for companies operating at markets of different countries to identify whether it would be more appropriate to choose standardization or adaptation as an adequate approach. Marketing research is at the beginning of marketing management process implementation. The role of marketing research of consumers is crucial in answering standardization / adaptation question appropriately. Within the use of research instruments, cross-cultural validity testing is being performed. Hereby, it is possible to define whether it is more adequate to define segments within each market separately or in the cross-cultural context. The goal of this paper is to present the methodology of testing cross-cultural validity. Firstly, theoretical considerations regarding that topic will be provided. Furthermore, practical demonstration on data base will be given as well. The lack of knowledge regarding the topic and the lack of use of it within the business practice can lead to inappropriate defining of companies' strategies when operating in multicultural environment.

Key words: cross-cultural validity, research instruments, consumer research

1. INTRODUCTION

In conditions of globalization of business, it is of the great importance for companies operating at markets of different countries to identify whether it would be more appropriate to choose standardization or adaptation as an adequate approach. Marketing research is at the beginning of marketing management process implementation. The role of marketing research of consumers is crucial in answering standardization / adaptation question appropriately. Within the use of research instruments, cross-cultural validity testing is being performed. "From a statistical point of view, the cross-cultural validity of a survey instrument can be defined as the degree of its measurement invariance across different populations" (O'Sullivan *et al.*, 2005). Hereby, it is possible to define whether it is more adequate to define segments within each market separately or in the cross-cultural context.

The goal of this paper is to present the methodology of testing cross-cultural validity. Such testing will be performed in regard to often used food-related lifestyle (FRLS) instrument. Firstly, theoretical considerations regarding food-related lifestyle segmentation as well as in relation to cross-cultural validity testing will be provided. Furthermore, practical demonstration on data base will be given as well. The lack of knowledge regarding the topic and the lack of use of it within the business practice can lead to inappropriate defining of companies' strategies when operating in multicultural environment.

2. LITERATURE REVIEW

2.1. Food-related lifestyle research

When developing food-related lifestyle instrument, Grunert *et al.*, (1993) point out to motives that had driven lifestyle research in marketing, which had started to be popular from 1960s:

- demographic market segmentation becoming less useful in predicting/explaining consumer behaviour, due to fragmentation of consumer markets,
- the use for development of advertising campaigns, for product positioning and repositioning by communication parameters,
- renewed interest towards instruments for measuring values and lifestyles based on widespread discussion on the development of post-material values in Western societies,
- interest towards the possibility of detecting global segments.

However, Grunert *et al.*, (1993) also pointed out to criticism of until that moment dominant lifestyle research:

- there was no agreement on what lifestyle actually ment,
- the methods used were purely inductive and not guided by theory,
- the derivation of the underlying dimensions was unclear and/or unsatisfactory,
- the explanatory value of lifestyle types or dimensions with regard to consumer choice behaviour was low and not well documented,
- the cross-cultural validity of the international lifestyle instruments remained to be demonstrated.

Having in mind named disadvantages of till that moment existing lifestyle research, the authors developed food-related lifestyle market segmentation concept and its instrument which continued and extended previous work and integrated cognitive approaches to analyzing consumer behaviour like means-end chains and cognitive structure research. The instrument has been until now used in lifestyle research in a number of countries, as well as for product specific group lifestyle researches (Brunso *et al.*, 1996; Bredahl and Grunert, 1997; Askegaard and Brunso, 1999; Grunert *et al.*,

2001; Reid *et al.*, 2001; Bruwer *et al.*, 2002; Kesić and Piri-Rajh, 2003; Ryan *et al.*, 2004; O'Sullivan *et al.*, 2005; Kesić *et al.*, 2008; Fang and Lee, 2009; Szakály *et al.*, 2012; Djokic *et al.*, 2018).

Food-related lifestyle instrument is developed in order to measure food-related lifestyle, that has been based on a new concept of lifestyle. Namely, having in mind criticism toward the concept of lifestyle that was dominant till that moment, Grunert *et al.*, (1993) proposed new cognitive, deductive approach to lifestyle research in which the questionnaire would be kept as the basic form of operationalisation, but the dimensions to be measured by that questionnaire would be formulated in advance, based on theory, while the suitability of questionnaire items for measuring these dimensions would be investigated by confirmatory techniques. The proposed approach summarised major results from cognitive psychology and was based on following assumptions (Grunert *et al.*, 1993):

- human behaviour can be explained by a cognitive paradigm, i.e. by the interaction of comprehension processes, integration processes, and cognitive structure,
- cognitive structures consist of declarative and procedural knowledge,
- declarative knowledge can be conceived as a system of cognitive categories and their associations: cognitive categories vary in level of abstraction; associations vary in strength,
- procedural knowledge can be conceived as a system of scripts,
- behaviour is motivated by linking cognitive categories referring to concrete acts or objects to abstract cognitive categories referring to values,
- this linkage can be stored as a system of associations in cognitive structure, and can then influence behaviour without becoming conscious, or can be formed by conscious thought in a problem-solving situation,
- the linkage can involve both procedural and declarative knowledge.

Starting from these assumptions Grunert *et al.*, (1993) proposed a definition of a consumption-related lifestyle by which it is the system of cognitive categories, scripts, and their associations, which relate a set of products to a set of values. It is consistent with the means-end approach to consumer behaviour (Reynolds and Olson, 2001) by which consumers are not interested in products per se, but are interested in them regarding the way the product helps them attain their life values, while the links of consumer's perception of the product's characteristics to self-relevant consequences and values are called means-end chains.

Considering that according to described approach lifestyle transcends individual brands or products, but may be specific to a product class, there is a sense to consider food-related lifestyle. Food-related lifestyle is the general pattern of how consumers use food to fulfil basic motives or attain life values. The food-related lifestyle instrument (Brunsø *et al.*, 2002) consists of 69 questions that measure 23 lifestyle dimensions. These dimensions belong to five life domains:

- ways of shopping - including following dimensions: importance of product information, attitudes to advertising, enjoyment from shopping, speciality shops, price criteria, shopping list,
- quality aspects - including following dimensions: health, price/quality relation, novelty, organic products, taste, freshness,
- cooking methods - including following dimensions: interest in cooking, looking for new ways, convenience, whole family, planning, woman's task,
- consumption situations - including following dimensions: snacks versus meals, social event, and
- purchasing motives - including following dimensions: self-fulfilment in food, security, social relationships.

Summarizing previous researches' results regarding food-related lifestyle market segments in a number of European countries and also in some countries outside Europe (Askegaard and Brunsø 1999; Reid *et al.*, 2001), Brunsø *et al.*, (2002) give descriptions of common market segments defined in these researches: the uninvolved food consumers, the careless food consumers, the conservative food consumers, the rational food consumers and the adventurous food consumers.

The analysis of the *uninvolved food consumers* leads to the conclusion that food does not represent a central element in their lives. When analysing the life domain of ways of shopping, these consumers can be described as being uninterested in most aspects of shopping since they don't read product information while relying basically on food quality cues, they don't use speciality shops and even their interest in price is limited. Regarding the life domain of quality aspects, it can be noticed that their interest in food quality is limited mostly to certain aspects of convenience, while regarding the life domain of cooking methods, it can be stated that they have little interest in cooking, don't tend to plan their meals, and snack a great deal. Considering the life domain of purchasing motives, it can be concluded that their purchasing motives considering food are weak. Having in mind other segmentation criteria, it can be said that compared to the average consumer, the uninvolved food consumers are single, young, have part- or full-time jobs, average to low-level incomes, and tend to live in big cities.

When describing *the careless food consumers*, it can be concluded that these consumers are similar to the uninvolved food consumer regarding the low importance they give to food in their lives and about being young and living in big cities. They are also similar to the uninvolved food consumer regarding their low interest in food quality, except, again like for the uninvolved food consumer, their interest in convenience. However, these consumers differ from the uninvolved food consumers considering dimension novelty belonging to quality aspects life domain, since they do like new products and tend to buy them spontaneously, at least as long as they don't require a great effort in the kitchen or new cooking skills. The careless food consumers differ from the uninvolved food consumers also for being more educated and having higher incomes.

The conservative food consumers can be described regarding cooking methods by preparing the meals in the traditional way and considering it as part of the woman's

tasks, so they are not very interested in convenience, while regarding purchasing motives they can be described by the security and stability achieved by following traditional meal patterns as a major purchasing motive. The conservative food consumers are, considering quality aspects life domain, very interested in the taste and health aspects of food products. The conservative food consumers are the oldest, the least educated and tend to live in rural areas. Their households are on average smaller while household income is in general lower than of the other segments.

The rational food consumers have characteristics that regarding ways of shopping life domain, they process a lot of information when shopping, they pay attention to product information and prices and they use shopping lists to plan their purchases, while regarding cooking methods, they tend to plan their meals. Considering quality aspects, these consumers can be described as interested in all aspects of food quality, while considering purchasing motives, they can be described by having self-fulfilment, recognition and security as major purchasing motives. Comparing the rational food consumer with the average food consumer, it can be concluded that this market segment consists of a higher proportion of women with families, of a relatively large proportion of consumers who do not work and of consumers who tend to live in medium-sized towns.

For *the adventurous food consumer* cooking is a creative and social process for the whole family, food is an important element in a life and self-fulfilment in food is an important purchase motive. These consumers can be characterised mostly regarding their approach to cooking methods life domain: they are very interested in cooking, search for new recipes and new ways of cooking, involve the whole family in the cooking process, are not interested in convenience and reject the idea that cooking is the woman's task. Regarding their approach to quality aspects, it can be stated that they show above-average interest in most quality aspects and demand good taste of food products. The adventurous food consumers are younger, have highest education and income, tend to live in big cities, while their household size is above average.

2.2. Cross-cultural validity measurement

The main issues regarding cross-cultural validity testing can be found in papers dealing with FRLS as well (Scholderer *et al.*, 2004; O'Sullivan *et al.*, 2005). The authors based these issues on some previous theoretical research. As it can be seen in Table 1, there are six questions in regard to cross-cultural validity testing.

Table 1. Cross-cultural validity issues

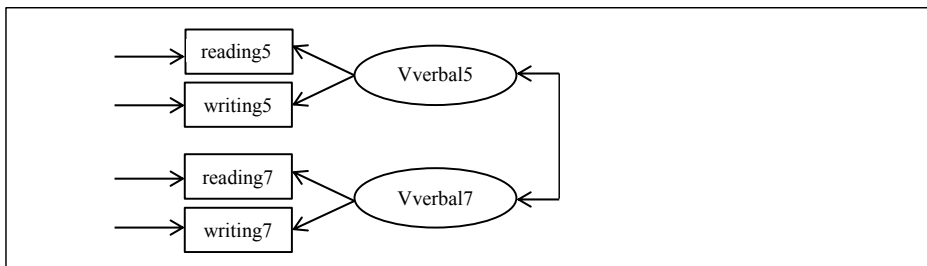
Type of invariance	Explanation
Configural	“The pattern of zero and non-zero factor loadings is assumed to be invariant across groups. Configural invariance implies that the same underlying constructs are measured in all groups.”
Metric	“The factor loadings are assumed to be invariant across groups implying the additional constraint. Metric invariance implies that the observed variables are measured according to the same scale units.”
Scalar	“Factor loadings and intercept terms are assumed to be invariant across groups; implying the additional constraint. Scalar invariance implies that the observed variables are measured according to the same scale units and scale locations, i.e. on common interval scales.”
Factor covariance	“Factor loadings, intercept terms and factor covariances are assumed to be invariant across groups; implying the additional constraint for all factors. Factor covariance invariance implies that interrelationships among the underlying constructs are the same across samples.”
Factor variance	“Factor loadings, intercept terms, factor covariances and factor variances are assumed to be invariant across groups; implying the additional constraint for all factors. Factor variance invariance implies that the variability of the underlying constructs is the same across samples.”
Error	“Factor loadings, intercept terms, factor covariances, factor variances and error variances are assumed to be invariant across groups; implying the additional constraint for all items: Error variance invariance implies that the item reliabilities (and therefore, also the scale reliabilities) are the same across samples.”

Source of the table: Scholderer, J. *et al.*, (2004), p. 202.

In function of better understanding of these issues (Milfont and Fischer (2010), Figure 1 represents theoretical model (verbal 5 and 7 are presenting verbal ability in grades 5 and 7, observed through reading and writing), while further graphical representation is provided:

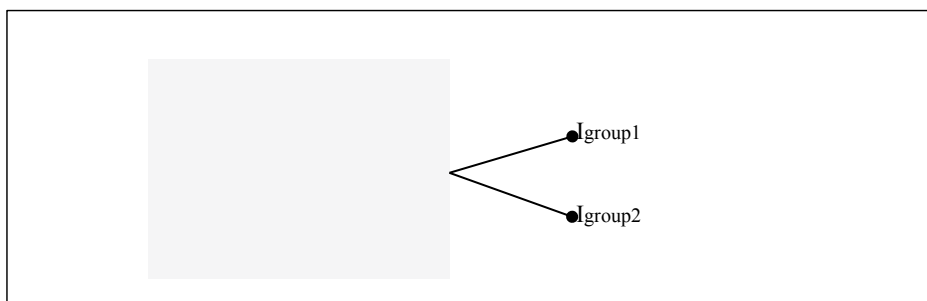
- figure 2 presents configural invariance,
- figure 3 shows error variance invariance,
- figure 4 points out to metric invariance,
- figure 5 presents factor variance invariance,
- figure 6 represents scalar invariance,
- figure 7 shows factor covariance invariance and
- figure 8 points to factor mean invariance.

Figure 1. Theoretical model used in example



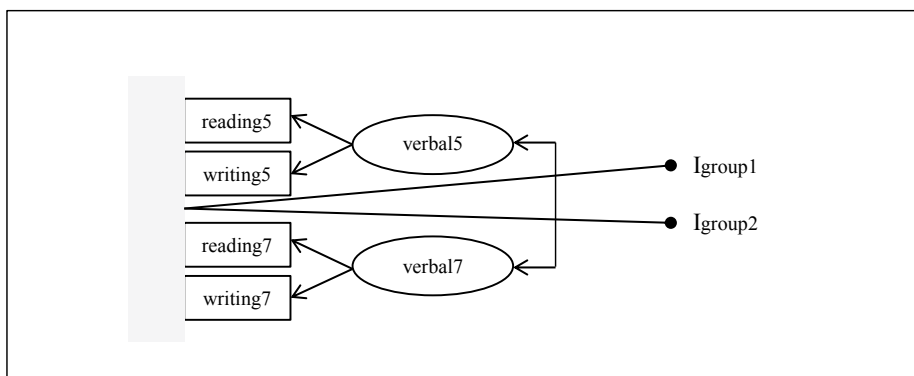
Source of the figure: Milfont, T. L. and Fischer, R. (2010), p. 113.

Figure 2. Configural invariance (same structure across groups)



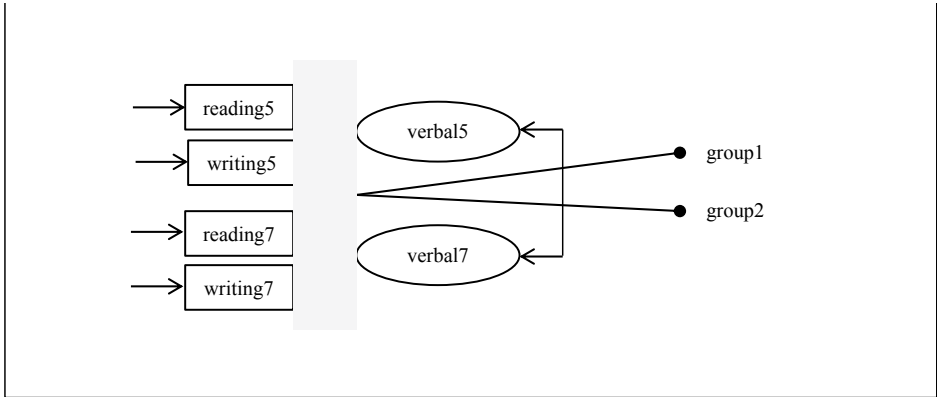
Source of the figure: Milfont, T. L. and Fischer, R. (2010), p. 114.

Figure 3. Error variance invariance (same error variance across groups)



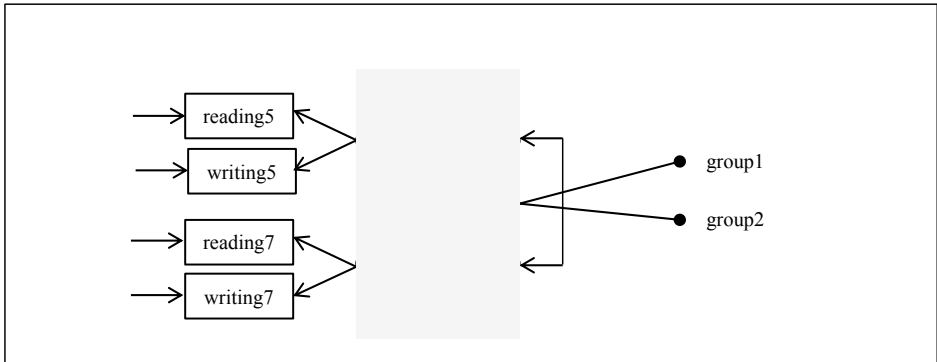
Source of the figure: Milfont, T. L. and Fischer, R. (2010), p. 114.

Figure 4. Metric invariance (same factor loadings across groups)



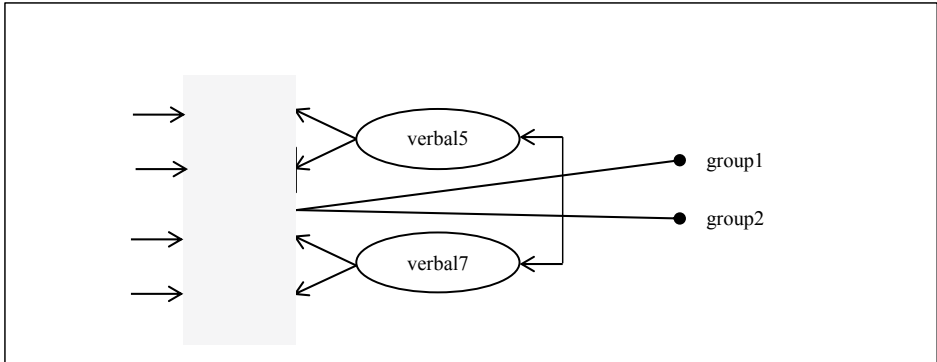
Source of the figure: Milfont, T. L. and Fischer, R. (2010), p. 114.

Figure 5. Factor variance invariance (same factor variance across groups)



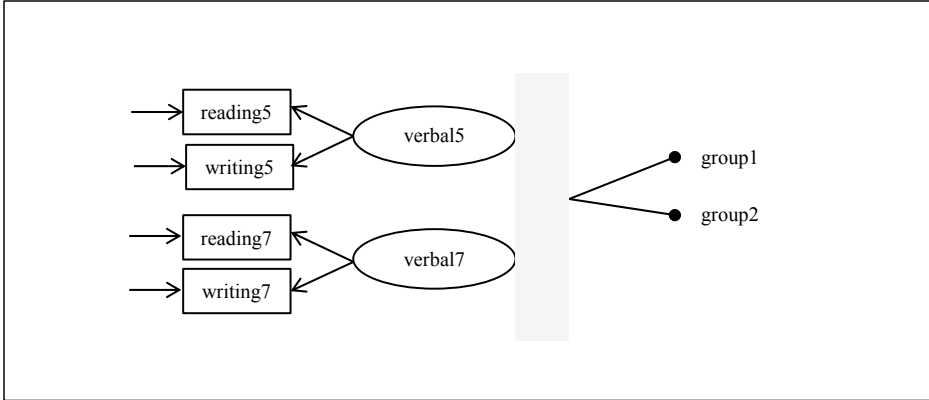
Source of the figure: Milfont, T. L. and Fischer, R. (2010), p. 114.

Figure 6. Scalar invariance (same item intercepts across groups)



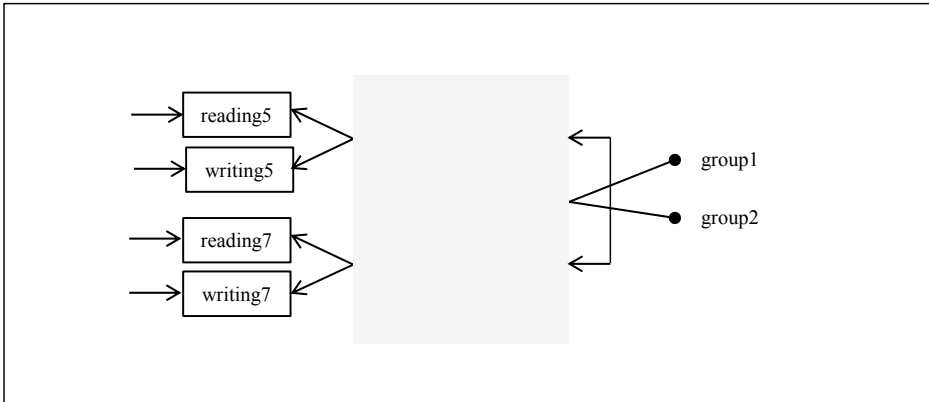
Source of the figure: Milfont, T. L. and Fischer, R. (2010), p. 114.

Figure 7. Factor covariance invariance (same factor covariance across groups)



Source of the figure: Milfont, T. L. and Fischer, R. (2010), p. 114.

Figure 7. Factor mean invariance (same factor mean across groups)



Source of the figure: Milfont, T. L. and Fischer, R. (2010), p. 115.

Following part of the paper deals with these issues on concrete data bases from FRLS research.

2.3. Cross-cultural validity measurement in FRLS research

Besides being implemented in a number of countries, the cross-cultural validity and validity in replication surveys of the food-related lifestyle instrument have been tested as well. Scholderer *et al.*, (2004) point out that the early analysis has shown that using simultaneous factor analysis model for populations in Denmark, Germany France and UK (Grunert *et al.*, 1997), as well using similar invariance models on replication surveys carried out in Germany in 1993 and 1996 (Bredahl and Grunert, 1997), results in the same factor loadings valid across the four consumer populations and factor vari-

ances and covariances invariant between the replication surveys. The later analysis using the confirmatory factor analysis model with structured means has shown that the food-related lifestyle instrument is in all its five domains valid over time in all aspects and cross-culturally valid regarding factor configuration, factor loadings, factor covariances, and factor variances, while item-specific means and item reliabilities are biased across cultures (Scholderer *et al.*, 2004). However, when the same approach has been used in Ireland and Great Britain, allowing to examine whether differences between the two food consumer cultures would bias the measurement characteristics of the survey instrument, while holding the language of responses constant, it is concluded that in all five food-related lifestyle domains, the measurement characteristics of the survey instrument were completely invariant across the two cultures (O'Sullivan *et al.*, 2005).

3. CONCLUSION

The additional value of this paper is reflected in demonstrating the need and the manner of testing cross-cultural validity of research instruments, in concrete case FRLS questionnaire. To the significance of that questionnaire has already been pointed out in domestic researches (Grubor *et al.*, 2014) as well as for the need to test its reliability, validity and unidimensionality (Djokic *et al.*, 2018), and in these aspects this paper only summarizes previous researches. However, this is, according to the authors' knowledge, the first recommendation in domestic conditions for it to be implemented cross-culturally and adequately tested.

Implications of previously described actions can be important for strategy of domestic companies from food sector operating in foreign cultures. Based upon that, an important part of their business success can be determined.

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IMPACT OF DIGITAL TECHNOLOGIES ON INTERNATIONALIZATION OF RETAILERS

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Abstract

Revolutionary changes in retailing influence the way technology is applied in relation to consumers, regardless of whether they make purchases in a retail store or online. Retailers alter the boundaries between the digital and physical retail store thanks to new technologies that help them see the growing importance of shopping experience and improve it by providing access to retailers' offers on the web and social networks. The new evolution of retail sales can be seen in contact with consumers more, and in the technology itself a bit less. The application of technology is facilitated by the accelerated internationalization of retail. The paper will analyze sales revenues of major retailers and sales revenues of the largest electronic retailers in the world, and whether internationalization of operations affects their increased sales revenues. A special view will be in the increase in sales revenues of electronic retailers, that is, in increase in the shares of electronic retailing in the operations of the largest retailers, as well as the representation of retailers' operations in more markets as a reflection of international of retail trade.

Keywords: Internationalization, retail, electronic retail, consumers, sales revenue

1. INTRODUCTION

Retailers see the benefits of expanding their business outside the home market with the support of digital technologies and large retailers take on an increasingly important role in marketing channels as in relation to competition. Therefore, the value of retail sales on the market is created under the influence of high internationalization of the market with intense retail competition. There are numerous challenges that retailers face in contemporary conditions, among which the challenges drawn by the environment, competition and the changing role of consumers. Retailing is a highly competitive business, and competition goes beyond market boundaries. The future of retailing is increasingly reflected in the acceptance of new technology and the understanding of a new type of consumer in the digital era. The questions to be answered in this paper are:

- Do retailers of a particular retail format have more internationalized business and therefore a high sales revenue?

- Are pure-play electronic retailers more prominent in international business?
- How does internationalization affect multichannel retailers' high sales revenue?

The aim of the research in this paper is to determine the connection between the sales revenues of the major retailers and the sales revenues of the largest electronic retailers, multichannel and pure-play, in the world and their internationalization of operations and the impact on their increased sales revenues. In the analysis, all major retailers were classified according to retail format, with the relation made between retail format and the country of operation, retail sales and retail formats. In the analysis of the largest multinational retailers, the relationship between ecommerce retail sales and country of operation, ecommerce growth and country of operations, as well as ecommerce retail sales in total retail income and country of operations were examined. The largest pure-play electronic retailers have been tested in relation to the relationship between retail sales and country of operation, as well as ecommerce growth rate and country of operation.

2. REVOLUTIONARY CHANGES IN RETAILING

In markets with relatively limited sales potential, as well as in highly-saturated markets, there are limited opportunities for further growth and enterprise development (Lovreta, Končar, Petković, 2013: 367). As with the supply, globalization of the market brings changes with the demand, in the sphere of final consumption. Thanks to the development of market integration, there is greater availability of goods and services, leading to better offer and strengthening competition among retailers. Retailers see benefits in expanding their business beyond the domicile market, and large retailers take on an increasingly important role in marketing channels. Therefore, the value of retail sales on the market is created under the influence of high internationalization of the market with intense retail competition. In particular, findings of Bianchi (2009: 221) suggest that specific capabilities and resources, such as local and regional partnerships, organizational learning, innovation orientation, adaptation to the local markets, and an experienced management team, are required for emerging market retailers to internationalize and improve their likelihood of success in foreign markets.

From the study Luangpituksa (2017: 88), it can be suggested that information revolution, consumer behaviors, cultural influence and transference of human resource are factors behind the occurrence of the existence of a new phenomenon, "retail synchronization", in retail internationalization, which is different to that outlined in conventional research about localization patterns. Competition between retailers is strengthening, thanks to globalization. The value of retail sales in the global market is created under the influence of high internationalization of the market with intense retail competition. Consumption size influences retail turnover and it determines attractiveness of the market and strengthens competition between retailers in the global market.

Table 1. Globalization of the retail market by regions in the world

	Region/country profiles				Level of globalization by region/ country		
	Number of Com- panies	Average retail revenue (US\$M)	Share of Top 250 Com- panies	Share of Top 250 Revenue	% Retail revenue from foreign operations	Average # countries	% Single- country operators
TOP 250	250	\$17,643	100.0%	100.0%	22.5%	10.0	33.2%
AFRICA/ MIDDLE EAST	10	\$6,789	4.0%	1.5%	34.7%	11.2	0.0%
ASIA PACIFIC	63	\$10,813	25.2%	15.4%	9.4%	3.6	47.6%
China/Hong Kong ¹	14	\$11,610	5.6%	3.7%	13.7%	4.1	64.3%
Japan	32	\$9,901	12.8%	7.2%	8.9%	4.0	43.8%
Other Asia Pacific	17	\$11,873	6.8%	4.6%	6.7%	2.5	41.2%
EUROPE	82	\$18,185	32.8%	33.8%	40.6%	16.4	15.9%
France	12	\$29,064	4.8%	7.9%	45.1%	30.2	0.0%
Germany	17	\$25,000	6.8%	9.6%	47.2%	14.1	5.9%
UK	12	\$17,896	4.8%	4.9%	16.9%	16.8	16.7%
Other Europe	41	\$12,261	16.4%	11.4%	42.1%	13.3	24.4%
LATIN AMERICA	8	\$7,834	3.2%	1.4%	23.8%	2.9	37.5%
NORTH AMERICA	87	\$24,228	34.8%	47.8%	13.6%	9.0	42.5%
US	80	\$25,203	32.0%	45.7%	13.7%	9.4	41.3%

Source: Deloitte (2018), p. 26.

Factors, such as the level of economic development or the perceived risk in a given country, certainly influence the range of strategic choices of the retailer (Lessassy, Jolibert, 2007, p. 12). The impact of globalization on the retail market is shown in the table, on the basis of indicators of retail companies in the world; indicators of the percentage of retail turnover realized outside the domicile market by retailers in the region indicated; the average number of countries in which retailers have their own retail network and the percentage of retailers who do not apply the strategy of internationalization of the market but already based their business on the domicile market.

The first indicator indicates that out of the 250 largest retailers 87 are in North America, 82 in Europe, and 80 in the United States. High international business is recorded by European retailers with an over-average percentage of turnover outside the domicile market, with differences in individual countries. Thus, for example, German and French retailers have over 45% of turnover outside the domicile market, while retailers from the United Kingdom have below average retail turnover. On the other hand, the markets of Japan and the United States are characterized by the high purchasing

power of consumers, therefore retailers of these countries are directed to the domestic market and realize their goals only on the domestic market, so that the percentage of turnover outside the domicile market is 8.9% and 13, 7% respectively, which is significantly below the average. If we look at the number of countries in which retailers have their own retail network, the Latin American, Asian-Pacific region (China and Japan) and North America and the United States have the lowest value of this indicator. Retailers from Africa and the Middle East have an extraordinary presence on the market, while this indicator is most pronounced among European retailers. French retailers operate in the largest number of markets in the world.

The research results Mešić (2014) show that the trend of internationalization of retailing is significantly present in European retailers and sales abroad represents a significant proportion of total sales and growth, top retailers perform the majority of their sales on the European market, but the internationalization of retailing in the US is significant, and not as intense in developed EU countries (p. 43). For the purpose of statistical analysis in this paper, all major retailers were classified into retail format making it possible to examine the relations between retail formats and country of operations, and retail sales and retail formats.

3. APPLICATION OF TECHNOLOGY IN THE FUNCTION OF INTERNALIZATION OF RETAILING

Changes are being promoted by advances in technology that have led to increasing growth of communication through interactive media, primarily the Internet, so that today, most companies are delving into Internet marketing to reach, capture and keep consumers returning to increase brand loyalty and build relationships with their customers (Gupta, Hooda, 2011, p. 2). There are numerous challenges that retailers face in contemporary conditions. Retail has always been a highly competitive business. Therefore, the future of retailing is the acceptance of new technology and the understanding of a new type of consumer in the digital era. What appears as a consumer demand is giving more payment options. With the rise of mobile payments, retailers are updating their old payment terminals to new models, which will not only help retailers with compatibility and security, but also allow them to accept multiple payment options. Mobile phones have a growing role in buying for “click and collect” electronic retailers. Traditional “click and collect” programs include consumers who buy online and then collect products in the store. It can be expected that the mobile device will play a greater role in this process.

Retailers increasingly promote online and offline data collection. Today's consumers go through multiple channels on their way to shopping, as collecting and studying data is increasingly integrated. The future of retailing becomes a combined analysis of online and offline data. In this way, they have a more comprehensive picture of purchasing of customers. Retailers adopt mobile devices in the store, which in the future will affect the adoption of mobile devices such as mPOS systems and tablets in the store. Today, every mobile phone becomes a personal computer that can help access the Internet and is intensively used in the purchasing process.

The application of retail technology in the coming years is concerned with the five largest retail trends (KPMG, 2017: 4):

- 1) Technology changes consumer experience - as technology changes briskly, only adjusted retailers have a chance of success;
- 2) Mobile shop continues its growth - smart phones are rapidly increasing their share in electronic retail, 54% are annual consumer growth in retail facilities under the influence of using smart phones.
- 3) Creating a significant experience is crucial - consumer and consumer engagement are crucial, consumer experience becomes key in competitiveness.
- 4) Personalization is the future of retailing - the importance of personalization in retailing shows that the companies that personalize the Internet increase sales by 19% on average.
- 5) Retraction and retention of talent is critical - the need to attract, retain and develop a workforce that suits the rising needs of the market is of paramount importance, in order to ensure growth, retailers must ensure that they attract and retain talents with the right skills.

Loyalty programs to which retailers and consumers are accustomed today are becoming more and more popular. Modern consumers still value prizes and promotions, but they do not matter much more to them. Consumers, who now become omni-channel consumers, will increasingly give priority to value, convenience, through loyalty rewards when selecting a retailer. This does not mean that loyalty programs will not be successful, but the simple application of rewards will not be enough to remain competitive. In the coming years, in the competition of retailers who do this, those who offer personalized awards will win, along with excellent products and practical shopping experience.

Multi-channel, omni-channel, mobile, social, showrooming, internet of things, big data, wearables, gamification - the never ending list of trends and innovations reflects the rapid pace of change in the retail industry (Bcx, 2016). Omni-channel shopping is becoming more and more standard. Consumers now use computers, smart phones, tablets or technology in the store while they are buying. Omni-channel purchases do not show signs of slowing down, and in order to keep on going, retailers, whether having a primary brick and mortar or electronic retail, will need to integrate physical and digital systems that serve to omni-customers. The following table shows the largest multinational retailers in sales revenue, as well as the participation of electronic retail in total retail revenue and the number of countries in which they have their business, as a measure of internationalization.

Table 2. The largest multichannel retailers and internationalization of business

Rank	e-50 sales rank	Top 250 retail revenue rank	Company	Country of origin	e-commerce retail sales (US\$M)	e-commerce retail sales % of total retail revenue	e-commerce growth rate	e-commerce CAGR1	Countries of operation
1.	3	33	Apple Inc.	US	24,368e	46.5%	18.2%	26.9%	19
2.	4	1	Wal-Mart Stores, Inc.	US	13,700	2.8%	12.3%	21.0%	30
3.	5	46	Suning Commerce Group	China	8,095e	37.1%	95.0%	70.9%	10
4.	6	92	Otto (GmbH & Co KG)	Germany	7,181	68.0%	0.5%	5.1%	4
5.	7	9	Tesco PLC	UK	6,539e	8.1%	9.0%	12.9%	10
6.	9	97	Liberty Interactive Corporation	US	5,146	51.5%	-1.0%	7.1%	10
7.	10	35	Macy's, Inc.	US	4,850e	17.9%	n/a	n/a	3
8.	11	6	The Home Depot, Inc.	US	4,690e	5.3%	25.4%	38.2%	4
9.	12	25	Best Buy Co., Inc.	US	4,000	10.1%	13.5%	15.1%	4
10.	13	19	Casino Guichard-Perrachon	France	3,756	7.3%	-2.4%	11.0%	31
11.	14	2	Costco Wholesale Corporation	US	3,500e	3.0%	17.6%	16.1%	10
12.	16	148	Home Retail Group plc	UK	3,040e	47.4%	0.8%	6.5%	2

Source: Deloitte (2017), p. 26.

According to the data presented in the table, multichannel retailers have high growth rates of electronic retail that amount to as much as 95%. Other growth rates are significantly higher compared to the growth in traditional retail sales. These multichannel retailers have business in several countries, from 3 countries to 31 countries. For the purpose of statistical analysis in this paper, all major multichannel retailers were taken into account together with the relationship between ecommerce retail sales and country of operation, ecommerce growth and country of operations, as well as ecommerce retail sales and total retail income and country of operations were examined.

More and more retailers are looking for technology-led data tracking and cloud-based technology solutions. Days of online and offline management will disappear, as more retailers switch to retail with one view of the management system. A multi-channel viewer system is essential for every modern retail strategy to track sales, inventory and visibility of customers in different channels. In the modern world, the amount of business data is constantly increasing. In retail, it means tracking each individual consumer, their every purchase and storage of data, giving retailers room for making decisions about performance in relation to consumers.

Social networks are increasingly developing as part of an omni-channel strategy. Social media has been playing a major role in buying, for some time. Retailers no longer rely on a large number of suppliers. Due to the increasing overflow of offers in multiple channels available to the consumer, more and more subscription services are being developed that make it easier for customers to discover and select products, saving them time and preventing the wrong decision. Pure electronic retailers are gaining an increasingly important place in the retail market. They are a significant competitor to multicultural and “brick and click” retailers.

Table 3. The largest pure-play electronic retailers and internationalization of business

e-50 sales rank	Top 250 retail revenue rank	Company	Country of origin	e-commerce retail sales (US\$M)	e-commerce growth rate	e-commerce CAGR1	# Countries of operation
1	10	Amazon.com, Inc.	US	79,268	13.1%	17.2%	14
2	36	JD.com, Inc	China	26,991	54.5%	68.3%	2
8	157	Vipshop Holdings Limited	China	6,084	64.4%	127.7%	1
15	n/a	Zalando SE	Germany	3,286	33.6%	55.2%	n/a
20	n/a	Shop Direct Group	UK	2,763e	25.8%	10.4%	n/a
29	n/a	vente-privee.com	France	2,222e	17.6%	16.1%	n/a
32	n/a	Wayfair Inc.	US	2,040	85.2%	80.1%	n/a
40	n/a	ASOS Plc	UK	1,740	17.2%	23.5%	n/a
42	n/a	Bluestem Group, Inc.	US	1,720NS	297.8%	ne	n/a
43	n/a	Ocado Group plc	UK	1,700	16.7%	16.6%	n/a
45	n/a	Overstock.com, Inc.	US	1,658	10.7%	12.0%	n/a
47	n/a	E-Commerce China Dangdang	China	1,450	18.0%	26.2%	n/a

Source: Deloitte (2017), p. 26.

The largest pure-play electronic retailers have above-average growth rates of retail turnover, which significantly exceed the growth rates of traditional retail. The table shows the largest pure-play electronic retailers, among which only the first two have internationalized business, for the other data is not available, since it is very difficult to determine the boundaries of the retailers' market, which indicates that many pure-play electronic retailers actually have an internationalized business. For the purpose of statistical analysis in this paper, all the largest pure-play electronic retailers were taken and the relations between high retail sales and country of operation, as well as ecommerce growth rate and country of operation, were examined.

More and more retailers use Internet of things to enhance customer buying experience. Mobile devices are just the beginning. In addition to using the mPOS system and tablets in the store, some retailers (especially larger ones) will probably explore ways to use Internet of Things (IoT) at their retail locations. A key factor in introducing Internet of things in retail is to lower costs. But the introduction of technology also implies high initial costs, sensor installation, maintenance, data mining, data collection, as well as data processing that requires software, as well as knowledge in this area. Therefore, no matter how big of a pressure is on the digitization of retail, the listed cost pressures of small retailers, of local character, will not have an interest in introducing the Internet of thing. It is known that there are restrictions on the introduction of electronic payments with retailers operating with only one or a few retail outlets and performing locally.

4. RESULTS OF ANALYSIS OF INTERNALIZATION OF RETAILING IN DIGITAL ERA

The aim of the research was to determine the connection between sales revenues of the major retailers and sales revenues of the largest electronic retailers, multichannel and pure-play, in the world and their internationalization of operations and the impact on their increased sales revenues. Retailers are sorted by retail format, as follows: apparel / footwear specialty, cash & carry / warehouse club, convenience / forecourt store, department store, discount store, drug store / pharmacy, electronics specialty, home improvement, hypermarket / supercenter / , superstore, other specialty, and supermarket. By the classification of retail formats, the goal is to determine which retail format has a higher level of internationalization, and it is additionally analyzed which retail formats have above average revenues from sales. In the survey, internationalization in particular among pure-play electronic retailers and multinational retailers was compared to the level of sales revenue. To confirm the hypothesis, Pearson's coefficient of correlation was used. Research hypotheses are:

H1: Traditional retailers of a particular retail format have more pronounced business internationalization.

H2: Pure-play electronic retailers have more internationalized business.

H3: Multichannel retailers with higher sales revenue have a significant internationalization of business.

The table presents twelve different retail formats for which data were collected within the research. The largest number of retail formats is from supermarket (59), other specialty (35), hypermarket / supercenter / superstore (31) and department store (25). Apparel / footwear specialty (36.87), other specialty (16.09) and cash & carry / warehouse club (9.80) are ranked as the retail format represented in most countries, corrected for the ratio of retail format and number of countries. Compared to retail revenues, corrected for the total number of retail formats, the largest revenue comes from sales have cash & carry / warehouse club (40999.2), hypermarket / supercenter / superstore (36735.2) and discount department store (28521.0). The results are presented in Table 4.

Table 4. Connection of retail formats and the country of operations

Category	Number retail formats	Number of country of operations	The ratio of the number of retail formats and countries	Retail revenue -mean	Retail revenue -total
Apparel/FootwearSpecialty	23	848	36.87	9585.3	220462
Cash&Carry/WarehouseClub	5	49	9.80	40999.2	204996
Convenience/Forecourt Store	12	78	6.50	10193.6	122323
Department Store	25	167	6.68	9609.6	240239
Discount Department Store	3	4	1.33	28521.0	85563
Discount Store	14	77	5.50	21121.5	295701
Drug Store/Pharmacy	12	78	6.50	20973.3	251680
ElectronicsSpecialty	12	51	4.25	13569.5	162834
HomeImprovement	11	83	7.55	20611.1	226722
Hypermarket/Supercenter/Superstore	31	210	6.77	36735.2	1138792
OtherSpecialty	35	563	16.09	8107.2	283753
Supermarket	59	218	3.69	15718.1	927368

Source: authors calculation

On the basis of the above, hypothesis H1 has been confirmed, that is, apparel / footwear specialty retailers, other specialty and cash & carry / warehouse club have a pronounced level of retail internationalization, while the highest sales revenue and high level of internationalization can be attributed to cash & carry / warehouse club retail format.

The degree of correlation between variables e-commerce retail sales (US \$ M), e-commerce growth rate and countries of operation in pure-play electronic retailers was investigated using the Pirson coefficient of correlation. The only statistically significant, positive and very high correlation ($r = .97$, $p < .01$) was observed between e-commerce retail sales (US \$ M) and countries of operation. The relationship between the remaining variables is not statistically significant ($p > .05$). The hypothesis H2 is confirmed on the basis of this because it has been proven that there is a connection between the level of ecommerce retail sales and countries of operations for pure-play electronic retailers. The results are shown in the table 5.

Table 5. Connection of ecommerce retail sales, ecommerce growth rate and country of opearations of pure-play electronic retailers

	1	2	3
(1) e-commerce retail sales (US\$M)	1		
(2) e-commerce growth rate	-.162	1	
(3) Countries of operation	.970**	-.164	1

Source: authors calculation

In order to examine the degree of correlation between variables related to multi-channel retailers, Pirson’s correlation coefficient was applied (Table 6). The relationship between ecommerce retail sales and country of operation is not statistically significant for multi-channel retailers ($r = .02$, $p = 89$). The relationship between ecommerce growth and country of operations is also not statistically significant ($r = -.08$, $p = 61$), nor is the relationship between ecommerce retail sales in total retail income and country of operations ($r = .09$, $p = 58$). Correlation coefficients between all measures are presented in Table 6. The only statistically significant, positive and very high correlation ($r = .80$, $p < .01$) was identified between FY2015 e-commerce growth rate and FY2011-2015 e-commerce CAGR1.

Table 6. Multichannel retailers connection of variables

	1	2	3	4	5
(1) FY2015 e-commerce retail sales (US\$M)	1				
(2) FY2015 e-commerce retail sales % of total retail revenue	0.11	1			
(3) FY2015 e-commerce growth rate	0.04	-0.14	1		
(4) FY2011-2015 e-commerce CAGR1	0.11	-0.19	.80*	1	
(5) Countries of operation	0.02	0.09	-0.09	-0.06	1

* $p < .01$

Source: authors calculation

Based on the analysis of the H3 hypothesis, it is rejected, since no relationship between the tested variables has proven to be significant as an indicator of internationalization. The only connection is the logical connection between the variables that stemming one from the other. This suggests that multichannel retailers do not have intrinsic intrationalization of retail, nor does it have an impact on their level of sales revenue.

5. CONCLUSION

In the study of the impact of digital technology on the internationalization of the business, the goal was to determine the connection between the revenues from the sales of the major retailers and the revenues from the sale of the largest electronic retailers, multichannel and pure-play, in the world and their internationalization of operations, as well as the impact on their increased sales revenues. The largest retailers are classified according to the retail format: apparel / footwear specialty, cash & carry / warehouse

club, convenience / forecourt store, department store, discount store, discount store, pharmacy, specialty specialty, home improvement, hypermarket / supercenter /, superstore, other specialty, and supermarket. By the classification of retail formats, the goal was to determine which retail format has a higher level of internationalization, and it is additionally analyzed which retail formats have above-average sales revenues. In the survey, internationalization among pure-play electronic retailers and multichannel retailers in particular was compared to the level of sales revenue.

Based on the results of the research, it was concluded that the retailer formats apparel / footwear specialty, other specialty and cash & carry / warehouse club have a pronounced level of retail internationalization, while the highest sales revenue and high level of internationalization can be attributed to the cash & carry / warehouse club retail format. The results of the survey indicate that in the case of pure-play electronic retailers, there is evidence that there is a connection between the levels of ecommerce retail sales and countries of operations. For multinational retailers, it can not be said that they have internationalized business since no relationship has been proven to be significant.

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POTENTIAL SECURITY IMPLICATIONS OF THE GLOBAL FINANCIAL CRISIS

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Abstract

Today's world, owing to globalization and the advancement of technology, is integrated to the extent that global interdependence has no alternative. The origin of the current economic crisis is largely attributed to illegitimate financial procedures and behavior of large banking institutions and investment funds. This fact raises issues of control and supervision of financial flows in the world. At the 2009 G20 summit in London, the off-shore banking institutions and tax havens were highlighted as an example of "the central dark spot" in the regulation of the global financial market. The global financial crisis has also jeopardized the implementation of anti-terrorism rules and numerous efforts aimed at combating terrorism. This situation encourages scientists to examine and explore in their research and projects the various aspects of correlation between security and the economy. Social security is treated as part of national security achieved by people and equated with the people. Therefore, the notion of a nation's security is very often equated with the concept of national security. The economic policy and national security intertwine and complement each other. The greatest risk for national security in many societies these days is an economic crisis. The rate at which the financial crisis, created in the United States, expanded to the rest of the world confirms the complexity and interdependence of the modern world. The financial crisis has accelerated the processes which lead towards a multipolar world. The financial crisis has accelerated the processes which lead towards a multipolar world. In many societies, the financial crisis has generated tensions, inequalities, corruption, and poverty. These situations often lead to social unrest, political tensions, a rise in xenophobia, extremism, organized crime, and terrorism. Therefore, the financial crisis has become the greatest threat to international security.

Key words: social security, economic crisis, national security

1. INTRODUCTION

The fundamental characteristics and features of the modern world are interconnectedness, globalization and rapid social change, and they are largely generated by contemporary science. However, addressing and solving global and local problems of

the modern world requires even more scientific research, and that is what is called “the knowledge-based society” and what the EU actually wants to achieve by 2025: “to become a society of sustainable development based on knowledge,” notably to become a safer society (Šundalić, 2012).

Today’s world, thanks to globalization and technological advancement, is integrated to the extent that global interdependence in fact has no alternative. The origin of the recent economic crisis is largely attributed to illegitimate financial procedures and behavior of large banking institutions and investment funds. This fact almost on a daily basis raises issues of control and supervision of financial trends in all countries in the world. At the 2009 G20 summit in London, the offshore banking institutions and tax havens were emphasized as an example of “the central dark spot” and serious regulatory gaps in the regulation of the global financial market. The global financial crisis jeopardized the implementation of anti-terrorism rules and numerous efforts to fight terrorism. This context encourages scientists to explore and examine in their research, projects and work various aspects of correlation between security and the economy, both globally and locally (Burns, Price, 2010).

Social security is treated as an integral part of national security achieved by the people and it is identified with the people. In literature, the notion of a nation’s security is very often equated with the concept of national security. The economic policy and national security intertwine and complement each other. The greatest national risk in many societies these days is an economic crisis.

The rate at which the financial crisis, created in the United States, spilled over to the rest of the world confirms the complexity and interdependence of the modern world. In fact, the crisis has accelerated the processes which lead towards a multipolar world. In many societies, the crisis has generated a major increase of tensions, inequalities, corruption, and poverty that often lead to social unrest, political tensions, a rise in xenophobia, extremism, organized crime, and terrorism. Thus, the financial crisis has become the biggest challenge and greatest threat to international security and in that way the threat to the national security of individual countries.

The trade collapse itself represents a major threat to the stability of society, and therefore a potential threat to security, both national and international. A global crisis may have disproportionate effects on all countries, both large and small, and especially on developing countries. It may further destabilize already unstable, but strategically important countries such as Pakistan, India, Algeria and others (Chossudovsky, Marshall, 2010).

In some way, the world has long been in the permanent global economic, ecological, demographic, moral and social-psychological crisis. All these crises are interconnected and intertwined. Even though the crises are global, every country because of its specific characteristics, has to face and deal with them in a unique way. In fact, the world is only partially global. It is often fragmented when it needs to generate, stimulate and anticipate desirable changes, and when it is necessary to quickly react and respond to some risks, challenges, and uncertainties.

Creators and holders of knowledge are the people; therefore, they are the greatest wealth of every country. The potential solutions for the current crisis effects must in no event jeopardize the people and their creative potential in each individual country. Moreover, all actions must focus and contribute to an improvement of the environment and quality of life – it is important to have active, educated, happy, and safe people.

2. ECONOMIC CRISIS AS A THREAT TO SECURITY AND DEVELOPMENT

The global financial crisis, which began in the United States in 2007 and was the first global financial crisis of the 21st century, has not only brought the typical economic problems that such crises create (such as a rise in the unemployment, a decrease in gross domestic product, a drop in production, a crisis of the economic confidence, a rise of the general feeling of insecurity and fear of the future), but it has prompted and stimulated new discussions. These discussions are essentially old theoretical, political and cultural “wars” between the advocates of the idea of market liberalization and state interventionism in the economic policy and the economic practice of the modern world. They also include debates, but to a much lesser extent, between advocates and opponents of the corporate social responsibility (Claessens, 2010).

Neither the best or most influential world economists, nor the most successful entrepreneurs, the most senior politicians, and visionaries of the future were able to reliably estimate the proportions, nature, and duration of the financial and economic disruptions by which the United States economy faced in the second half of 2007. All modern national, regional and continental economies, as well as the world economy were confronted with the same disruptions and challenges in 2008 and 2009.

The decline in the level of socio-economic security caused by the global economic crisis is a potential threat to stability within society and between societies. Social, political, and security implications and disruptions are potentially not always less severe than the financial and economic crisis (Frieden, 2009).

According to figures provided by the World Bank, global trade in 2010 declined by more than 2%. Some analysts state that the world is still going through a period of “deglobalization” implying reverse economic integration processes. In the same period, by the end of 2010, according to figures provided by the International Labor Organization, nearly 50 million people lost their jobs. A growing unemployment increased the risks of civil unrest and riots, xenophobia and restrictive migration policy. At the same time, there was the emergence of regimes of a great instability and a shift away from the free market policy. On the other hand, the policy of protectionism and “deglobalization” may exacerbate international tensions, generate changes in geopolitical systems and create new instabilities in many regions of the world. The economic crisis may become an engine of global insecurity and uncertainty in both months and years ahead. The notorious fact is that we do not know a lot about the global financial crisis (The National Security Implications of the Global Financial Crisis <http://www.nsnetwork.org/node>).

There are many questions and concerns that arise from the above mentioned findings and facts that we cannot answer with certainty at this moment. It is necessary to look at, interpret and clarify different dimensions and security implications of the economic crisis. Some of the questions that seek answers are:

- Has the crisis increased security challenges? Has economic and social security become one of the major dimensions of security threats? Are they adding or replacing the traditional focus on military security?
- How to deal with the dangers and risks such as social unrest and various forms of intolerance that the crisis and accompanying trends of protectionism growth (a “*beggar-thy-neighbor*” policy) can cause?
- Have the measures implemented by the international community in the fight against the growth of protectionism and “deglobalization” been successful? What is the impact of the crisis on the international community and development programs, including the Millennium Development Goals of the United Nations?

2.1. Causes of financial crises and rising uncertainty

Financial crises occur when there are disturbances in the financial system that causes such an abrupt increase in the problems of negative selection and moral hazard in the financial markets. Thus the financial markets become incapable to effectively transfer funds from those who save money to those with the best productive investment opportunities. As a result of this inability of the financial system to function effectively, the economic activity is rapidly declining (Mishkin, Eakins, 2005: 14).

It is necessary to explore and scrutinize factors that are representing the main cause of financial crises to understand and explain why financial crises and disturbances occur and how that reflects on the country economy and the overall life of a country and its citizens.

The most important category of factors that can cause a financial crisis are interest rate increases, increased uncertainty, the impact of market value of assets on the balance sheet, problems in banking sector, and speculative attacks on the domestic currency exchange rate. (Mishkin, Eakins, 2005: 14).

The main idea of the modern capital market is the protection of investors. There are various methods of how to protect investors. National rules provide the protection of investors by company law. The most important fact is that an investor acquires rights in a company on the ground of company's shares. Important provisions for investors' protection are also contained in rules regulating a relationship between investors and brokerage companies because investors often use services of brokerage companies to acquire company shares. These rules are often a reaction to misuse and manipulation at a securities market. It is crucial that these occurrences are penalized because they often lead to dissatisfaction of investors and investors can lose trust in the security market (Mayo, 2012: 120).

The security of financial markets is one of the crucial factors in attracting investors. There are few investors who are willing to do business in financial markets that are insecure. Only speculators and investors whose business is very questionable and suspicious are willing to do business in these markets. Such businessmen intend to achieve above-average yields in the short term which are possible only due high risk. When uncertainty is increasing at a financial market, which occurs as a result of a business failure of significant financial institutions, recession or collapse of the capital market, a position of lenders becomes difficult and the lenders have a hard time to make a distinction between good and bad loans. Therefore, the lenders act cautiously and approve fewer loans. That further causes a decline in lending, investing and a significant decline in economic activity and it creates a wide range of circumstances contributing to an increase in total social insecurity (Overseas Development Institute, 2009).

3. EFFECTS OF THE FINANCIAL CRISIS ON NATIONAL ECONOMIES

Every crisis, the global financial crisis in particular, has a great impact on the national economy with complex effects. Major global organizations such as the International Monetary Fund (IMF), the World Bank, the World Trade Organization (WTO), etc., had been indicating that the crisis would not remain local, namely only in the United States, but that it would spill over to the rest of the world. In the first several weeks after the crisis broke out in 2007, the European Central Bank in Frankfurt had injected over EUR 200 billion in the financial system.

The consequences in the United States became evident immediately after Nex Century Financial started experiencing financial difficulties. The institution placed over US\$ 50 billion on the market a year before the crisis. A sudden 78% drop of the value of stocks and the layoff of over 50% of employees indicated the complex proportions of the global crisis.

Bear Stearns, the fifth biggest bank on Wall Street, announced at the time that two major funds went bust. JP Morgan Chase then purchased the Bear Stearns shares for US\$ 1.2 billion. By injecting capital, the US Administration was then saving „too big to fail” companies such as AIG, Fannie Mae, Morgan Stanley and many others.

On the other hand, the effect of the crisis did not end in the financial system but it spilled over to other sectors. The crisis resulted in a drop in consumption, production and trade. The unemployment rate in many countries skyrocketed, which greatly affected their social stability, as well as global and national security of some countries.

Developed countries fought the recession and developing countries recorded a strong trend of slower economic growth. Developing countries recorded an enormous decline in all sectors. The main problem was the balance of payments which recorded a deficit, and a fast loan growth. In the world's poorest economies, the prices of food and oil rose which resulted in ever bigger poverty, instability and threats to security.

Table 1. GDP trends in selected countries

	2006	2007	2008	2009	2010	2011	2012
Australia	3,6	3,8	1,4	2,3	2,5	0,5	2,8
Austria	3,7	3,7	1,4	-3,8	2,3	3,0	1,3
Estonia	10,1	7,5	-3,7	-14,3	2,3	6,4	2,5
France	2,5	2,3	-0,1	-2,7	1,5	1,6	0,3
Italy	2,0	1,5	-1,3	-5,2	1,3	0,6	0,3
Japan	2,0	2,4	-1,2	-6,3	4,0	0,5	2,0
China	12,7	14,2	9,6	9,2	10,4	9,3	8,7
Germany	3,7	3,3	1,1	-5,1	3,7	2,9	1,0
The USA	2,7	1,9	-0,4	-3,5	3,0	1,7	1,5
Slovenia	5,8	6,9	3,6	-8,0	1,4	2,0	2,0
Switzerland	3,6	3,6	2,1	-1,9	2,7	0,5	-0,3

Source: United Nations (2012) *World Economic Situation and Prospects 2012*, United Nations Publications, Washington, p. 143.

In 2009 gross domestic product (GDP) dropped 3.5% in the United States, while in the European Union countries GDP dropped 4.3% the same year. Table 1 shows the trend of GDP in selected countries. The table indicates that an economic contraction occurred.

3.1. *Effects of the financial crisis on Croatia*

In showing the effects the financial crisis had on Croatia, we will make a comparison with some European Union member states. As an example we have selected some European Union countries in transition – Bulgaria, Hungary, the Czech Republic and Slovakia.

Globalization, the removal of obstacles and softening of borders, strategic orientation towards competitive advantages and equality of participants are the characteristics of modern international trade. The removal of distance obstacles, specialization in key skills and geographical dispersion of business activities are also some of the aspects characterizing contemporary global companies that dominate the international market (Lazibat, Kolaković, 2004: 8).

A majority of countries in transition have a number of common objectives, such as reducing poverty, inequality and unemployment, ensuring minimum education and health protection, building a welfare state, etc. It is a known fact foreign that trade is the oldest and most developed form of economic cooperation between countries, for several reasons. Demand is growing, GDP is rising, foreign currency effects are being achieved, overall development is accelerating, development of new products and services is being encouraged and inequalities in territorial development are being reduced (Babić, Babić, 2008: 3).

Foreign direct investment (FDI) before the crisis in the observed countries was higher than after the crisis and the watershed years were 2009 and 2010 when the crisis

was in a full swing, as evidenced by a drastic fall of FDI in some countries, including Croatia. In the period observed, Croatia attracted the least FDI of all countries analysed (EUR 20.3 billion), while the Czech Republic attracted the most – over EUR 42.3 billion, recording the fastest and best recovery from the crisis, as measured by the total amount of funds analysed.

Table 2. Foreign direct investment in countries in transition (in millions of euros)

Year	Croatia	Hungary	Bulgaria	Czech Republic	Slovakia
2004	851	2.067	2.284	3.231	2.532
2006	3.489	5.015	5.197	3.896	3.256
2008	3.231	4.197	5.762	3.972	3.501
2010	212	753	1.073	4.868	1.517
2012	932	1.607	192	6.173	1.244
2014	1.714	2.635	878	1.865	1.924
Total	20.334	31.000	28.591	42.331	21.285

Source: Eurostat-Direct investment inward flows by main investing country, available at <https://ec.europa.eu/eurostat/web/national-accounts/data/main-tables> (accessed 23.10.2018).

The unemployment rate trends before the crisis in all observed countries except Hungary were declining, and unemployment was decreasing. The break out of the global financial crisis has increased unemployment rates in all countries. However, after 2012 there has been a turnaround and a decline was recorded in the unemployment rate in all observed countries, except Croatia. In Croatia, the unemployment rate decreased in 2014.

Table 3. Unemployment rate in countries in transition

Year	Croatia	Hungary	Bulgaria	Czech Republic	Slovakia
2004	13,9%	6,1%	12,1%	8,3%	18,4%
2006	11,6%	7,5%	9,0%	7,1%	13,5%
2008	8,6%	7,8%	5,6%	4,4%	9,6%
2010	11,2%	11,2%	10,3%	7,3%	14,5%
2012	16,0%	11,0%	12,3%	7,0%	14,0%
2014	16,6%	7,7%	11,4%	6,1%	13,2%

Source: Eurostat - Total unemployment rate, available at <https://ec.europa.eu/eurostat/web/national-accounts/data/main-tables> (accessed 23.10.2018).

According to Eurostat-Real GDP growth rate data, a GDP growth in all observed countries except Hungary had an upward-moving trend before the financial crisis, and there was an increase in GDP. The break out of the global financial crisis caused a drastic decline in GDP in 2009. However, in 2010 GDP started to increase in all observed countries except Croatia. GDP has continued to achieve positive rates in the following years. The decline in GDP was present in Croatia even in 2014 while the positive growth rate of GDP for the first time was achieved in 2015.

Table 4. GDP growth rate in countries in transition in the period from 2004 to 2014

Year	Croatia	Hungary	Bulgaria	Czech Republic	Slovakia
2004	4,1%	4,9%	6,6%	4,9%	5,3%
2006	4,8%	3,8%	6,8%	6,9%	8,5%
2008	2,1%	0,8%	5,6%	2,7%	5,7%
2010	1,7%	0,7%	0,1%	2,3%	5,1%
2012	-2,2%	-1,7%	0,2%	-0,9%	1,5%
2014	-0,4%	3,7%	1,5%	2,0%	2,5%

Source: Eurostat - Real GDP growth rate, available at <https://ec.europa.eu/eurostat/web/national-accounts/data/main-tables> (accessed 23.10.2018).

After comparing Croatia with the other countries in transition, it can be concluded that the global financial crisis had a severe impact on the decline in foreign direct investments in all observed countries, especially in 2009 and 2010. But it must be emphasized that of all the considered countries, Croatia was the least attractive for the direct foreign investments in the observed period (approximately 20 billion euros). The global financial crisis has also had a huge impact on the increase in unemployment. In addition, when observing unemployment, a country with the worst results is Croatia. The unemployment is higher in Croatia than in the other observed countries. Also, Croatia showed the slowest results in unemployment reduction. The unemployment has started to decline in Croatia in 2014. Finally, when GDP growth rates are considered, the emergence of the world financial crisis in 2009 caused a strong decline in GDP growth rates in all observed countries. The positive growth of GDP for the first time was noticed in Croatia in 2015 while in the other observed countries GDP started to increase in 2010 and it has continued a positive upward trend in the following years. It can be concluded that from all the countries in transition Croatia has been recovering the most slowly and that the crisis has lasted the longest in Croatia.

4. THE IMPACT OF THE CRISIS ON THE ENERGY SECTOR

The global financial crisis could open up new ways of operating in the energy sector at a global level. At the first glance, it seems that the recent crisis is only related to the financial and economic failure. But, there is a lot more to that game. The transatlantic community bases its international leading role on the assumption that the private sector and self-regulation contribute to top-notch economic benefits. However, the recent crisis undermined that assumption. The current economic crisis is also a political crisis that is transforming into a major global gap. Structural instability will be the main outcome of these disagreements. Nowhere is this more apparent as it is in the energy field (Nye, Scowcroft, 2009).

In today's world, the dependence on energy supplies continues to grow making energy security a strategic priority. The recent economic crisis may have lowered prices and slowed down economic growth, but it is only one "party" in the line.

Countries rich with natural resources continue to use their resources and assets to enhance and improve their own interests, expand their area of influence and form alliances with countries that have similar interests. Similarly, energy transit countries and importing countries are also trying to consolidate their positions. Such attempts will change the nature of international relations. So far, unfortunately or not, the transatlantic community has not found convincing answers to all these different challenges.

4.1. Impact on energy suppliers

Russia, Iran, and Venezuela have been heavily affected by the global financial and energy crisis. Some theorists believe that “the energy of nationalism” is getting stronger. Others argue that, regardless of the price of the concession accepted by these countries, the crisis will be short-term. In addition, several analyses have indicated a growing number of unemployed migrant workers, especially in the energy sector. This could become a source of social unrest in Central Asia and some Gulf countries (Nye, 2009).

A recent analysis by Stratfor, an independent U.S. agency for strategic research and forecasting, reveals that foreigners account for 69% of Kuwait’s population (Kuwait’s share in the world oil market is 8%) and 80% of Qatar’s population (Qatar’s share in the world gas reserves is 14%). On the other hand, foreigners account for 25% of the Saudi Arabia population. Furthermore, the Saudi Arabian Monetary Authority has invested more state funds than any other Gulf country to ensure a greater financial security (Borchert, Forster 2014).

4.2. Consequences for the energy sector

The crisis has various consequences for energy companies. On the one hand, increased capital costs make investing more difficult. This is a huge problem for the renewable energy industry because investment costs are higher than in other energy sectors.

Higher capital costs are an issue and problem for companies that deal with transmission and pipelines which are examples of long-term infrastructure financing, as well as for companies engaged in oil exploitation. On the other hand, countries that supply energy tend to become more open to multinational companies because they need partners for energy projects with high costs. This could open up new possibilities for collaboration (Nye, 2009).

Some energy producers have acquired substantial international reserves, giving them more political freedom and confidence. We can see a sign of change in the fact that the United States Secretary of State Hillary Clinton persuaded China in February 2009 that China’s holdings of U.S. Treasury securities, which amounted to 740 billion dollars at the end of January 2009, remained a valuable investment. In addition, it seems that monetary energy companies are more prepared for compromises. In February 2009, China allegedly managed to buy crude oil from Russian Rosneft, which holds one-third of the usual market availability ((Borchert, Forster 2014).

4.3. Pressure on climate change policy

The climate change policy remains a complex and outstanding issue. Will the current momentum of the climate change policy continue? For strategic reasons and for the environmental protection the world must reduce its dependence on fossil fuels. However, smaller investments can slow down the development of renewable energy technologies. High costs of these investments can result in a reduction in the production of carbon dioxide.

If the current and goals objectives remain the same, manufacturers may transfer carbon dioxide production in regions and societies with lower standards. This may improve the balance of carbon dioxide in one region at the expense of other regions. Also, this may cause diplomatic tensions and disputes. Finally, subsidies for renewable energy sources may come under the pressure of the general audience and countries with great power. They have already led to trade disputes between major global stakeholders: the United States, China, and the European Union.

5. THE GROWING ROLE OF THE STATE

The role of the state can grow as a direct consequence of the global financial crisis. Governments act as financiers of investments in energy infrastructure. In many countries, governments can also re-enter the energy sector as active participants, either through state-owned companies or as shareholders. Finally, companies could encourage governments to build energy infrastructure.

It seems that self-regulation has failed in the financial area. This will have huge repercussions on multinational energy companies that prefer the policy of non-interference. One of the main issues is whether governments will continue to guarantee a preferential treatment to regulatory energy from renewable sources.

What exactly does that mean? All variables are indicating that the guarantee of energy security has become very difficult. Moreover, recent developments have shown that energy security has the potential to create a serious break in friendly relations among the EU member states, and between the EU and the United States. Countries should do everything to avoid division and conflicts over energy issues, which may be the cause of the state of insecurity of society. The security of energy infrastructure is essential and crucial for all stakeholders involved in the global energy supply chain.

The recent economic crisis has created opportunities for broad cooperation with energy producers. Scientific and technological cooperation with energy producers may boost energy efficiency and help in environmental protection.

The time of crisis is always the time of concrete action. The strategic dialogue on energy security must be more actively engaged with the Istanbul Cooperation Initiative, the Gulf Cooperation Council, the International Energy Forum, and the Organization of Petroleum Exporting Countries. These organizations should encourage dialogue on how economic prosperity, energy policy, regional stability, and environmental protection objectives and goals can be combined and achieved.

In addition, there is a need to improve direct engagements with national oil and gas companies, which may serve as a model for improving energy efficiency in producing energy in countries engaged in the energy production. This may increase the security of energy infrastructure as well. Such an initiative should bring together multinational companies and state-owned companies, investment banks, international financial institutions, state funds, and technology companies. This prospective association would analyze the most appropriate and favorable energy technologies for regional economic development plans and environmental objectives, priority infrastructure, investment projects, and it would encourage and stimulate multinational research and development (Chossudovsky, Marshall, 2010).

The number of outstanding issues is tremendous. It seems that the world has gone through another security episode of historic importance in the energy sector. The security episode impact still can't be fully considered. Serious discussions are just beginning. Therefore, the effects of the events described in this article will be felt for a few more years.

The recent global financial crisis has had a major impact on energy investments. Due to the crisis, some of the planned projects have been delayed considerably, and the economic feasibility of others has been doubtful. In addition to uncertainty regarding investment in energy projects and ensuring transit and storage of energy sources, pressure has also been increased on investments in new technologies and projects involving the use of alternative energy sources. New technologies and projects involving the use of alternative energy sources will only become economically viable over a longer period of time.

The gas crisis that occurred in January 2009 triggered a disagreement between the Russian Federation and Ukraine and had an impact on almost all countries in Europe. These events have revealed that political stability and security are highly dependent on energy security. The events demonstrated all the disadvantages and shortcomings of strong energy dependence not only on the Russian Federation but also on transit countries. Certain aspects of the gas crisis are used by the energy sector, stressing the need to overcome the financial crisis and to ensure uninterrupted investment in energy projects that would enable safe transit and storage of energy sources, and this also contributes to the energy security of the social community.

6. THE IMPACT OF THE CRISIS ON CORPORATE SECURITY

During the financial crisis and the difficulties that arise out of the crisis, many companies must cut costs in different segments of their business. Some companies reduce investments and refrain from new investments and others lay off workers. Some companies cut those corporate functions that do not contribute directly to the company's profitability. Corporate security is one of the first functions that is cut in difficult times. The corporate security sector typically consumes a substantial portion of the company's budget (substantial expenditure goes to security, access control, video surveillance, fire protection, protection at work, alarms and information security). This security is usually seen as an expense, and not as profit. For this reason, the corporate

security budget is usually perceived as an opportunity to quickly reduce costs in an effort to balance the company's profit and losses. Reducing corporate security has numerous implications on social and national security (Borchert, Forster, 2017).

A number of factors require this view on security. First, it must be acknowledged that some companies have certainly some security programs that are poorly conceived and consume a lot of the corporate resources compared to the results they provide. Secondly, there is a long tradition of corporate security and security managers who are not good communicators and who do not make an effort to educate the company's management about their security programs and their contributions to the achievement of corporate goals. However, even when a manager of corporate security has an effective program and is a good communicator, this may be an aggravating circumstance in quantifying losses that a company may have for implementing effective security measures. The lack of losses and accidents in the company due to effective security programs will be interpreted as a lack of threats and risks and thus interpreted as if there is no need to protect the value of the company and no need to have the corporate security.

In the time of economic hardship, reducing and cutting functions of the corporate security certainly leads to a variety of security challenges. Some of these security challenges are problems such as workplace violence, theft, fraud, and theft of products.

7. THE CRISIS AND PRODUCTION OF MILITARY EQUIPMENT

The global financial crisis has shaken national economies and disrupted stock exchanges from the United States to Japan. At the same time, the global market for military equipment and weapons has lived some better life. According to data provided by the Stockholm International Peace Research Institute, the sale of weapons has literally flourished. From 2005 to 2010 weapons sales increased steadily by 22% and the upward trend has continued in the following years.

Make no mistake about it: the upward trend is related mainly to the sale of the most expensive and most sophisticated models of weapons, from fighter aircraft of a new generation to submarines, ships and missile systems of all kinds. The largest weapons manufacturers are countries that appear as "*exporters*" of peace on the world political scene. These countries casually sell trains full of weapons to the countries in which they "export" the peace.

The largest weapons manufacturers are the United States, Russia, Germany, France, and the United Kingdom. According to the military magazine called *Defense News*, the largest exporters of military technology concluded new contracts worth 150 billion dollars during the period of the global financial crisis (Slijper, 2005).

The United States is arguably a leading exporter of weapons, holding 30% of the global weapon market. The largest buyers of weapons produced in the United States are South Korea, Israel, Saudi Arabia, Turkey, and new NATO members.

From 2001 to 2008, the United States has earned more than 155 billion dollars on the sale of weapons. Half of the sold weapons went to risky and fragile regions, the so-

called developing countries with tensions on the verge of an armed conflict which often becomes reality. In 2009, China and India were the biggest Russian weapon buyers that hold 20% of the trade. More than 40 countries, from North Africa to South America, acquired weapons produced in Russia (Slijper, 2005).

By purchasing the most modern aircraft, tanks, and aircraft carriers, China and India have become superpowers. It is important to notice that there was also the change and shift in the balance in the Pacific. By purchasing former Soviet aircraft carriers China and India have also become a global naval force.

8. CONCLUSION

Over the past decades, and especially when assessing the impacts of the global financial and economic crisis, global governance has become one of the most attractive issues in broad public discussions and debates. There are at least two reasons why the existing global governance no longer meets the public's expectation.

First, the world is becoming increasingly interdependent. The problems that humanity is facing range from economic challenges, financial crises, protectionism, climate change and energy security to geopolitical challenges, including international terrorism, migration, and population aging at the moment.

Secondly, the world is becoming multipolar. The emergence of new global and regional superpowers, such as China, India, and Brazil, becomes an increasingly important factor in shaping the world economic community and political agenda. Setting the new rules of the game at the international level becomes something that is "urgent." At the same time, this complicates relationships and social security more than ever before.

The existing international systems need to be reformed and redefined in many areas so that the community can respond accordingly and deal with new challenges caused by the current political, economic, social and ecological changes in the modern world.

In designing and creating the framework for sustainable development of global governance, the priority should be setting standards, rules, and institutions that can shift the balance of power and provide viable social solutions. These will increase social security and respond effectively to all security challenges and risks.

In sum, the financial crisis has great potential for creating internal political instability and uncertainty in a number of countries around the world. This can have a huge impact on the global trade. Serious protectionism like the one in the 1930's would be for the global economy as rubbing salt into the wound, and for politics, it would represent serious and unpleasant risks and uncertainty. But all this can be opposed and prevented if (emphasis on the word "if") the macro side of the existing crises can be managed and handled.

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CHALLENGES FOR WORK ORGANISATION IN THE COLLABORATIVE ECONOMY ERA

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Abstract

Collaborative economy breaks traditional boundaries between its participants. In that sense, there is no division between the trader and the consumer, the employer and the employee, the professional and the non-professional. The authors discuss the traditional relationship between the worker and the employer and his adaptation to the collaborative economy. In this respect, new forms of work have been created based on the digital platforms. Thanks to the platforms and digitalisation there is a large number of potential “employees” waiting at the customer’s request. For this reason, the new form of work embraces the on-demand economy and creates a market that suits a demand by facilitating interaction between those who provide services and those who need it. In other words, there is always a technology-based relationship, which is a link between “employer” and “worker”.

Authors in the paper give an overview of new forms of employment that go further than standard employment and typical working conditions. The analysis of different changes in roles between the employer and employee, the organization of work and patterns of work will be discussed and possible legal solutions will be given as a conclusion.

Key words: collaborative economy, worker, platform, digitalisation, labor law

1. INTRODUCTION

Croatian Labor Act (in Croatian: Zakon o radu, Official Gazzete 93/14, 127/17) gives the definition of worker as follows: „*The employee or worker is a physical person who performs certain tasks for the employer.*” When analyzing relationship in collaborative economy this definition is very often difficult to apply since the roles of the employer and employee are not strictly divided. Often in the collaborative economy workers are overwhelmingly classified as independent contractors (Tipett, 2017). This formulation of the worker as „independent contractor“ opens different questions on the legal status of the worker. However, what should be of the special interest is (i) work-protection rules that apply to the workers, (ii) self-employed workers who remain outside the scope of the labor legislation or (iii) a completely new form of work which should have a separate legal status (Bjelinski Radić, 2017).

Through digital technology „peers“ can monetise their homes, resources, time and skills to make additional money (Ravenelle, 2017). Such a simple and fast way of sharing goods or services raises the question of how often these “workers” offer their services or sell goods, but on the other hand their motive is questionable, which means that it is not known if they are doing it for profit or for some charge (Národní Vzdělávací Fond, 2017).

When analyzing workers diversity on digital labor markets workers tend to be younger and more highly educated than other population, although there are individuals on the market 55 years or older (Codagnone *et al.*, 2016). The authors also noted that women, on the aforementioned digital labor market, are more represented than men or even equally represented (Codagnone *et al.*, 2016).

According to Hatzopoulos most of the workers in collaborative economy should be considered as freelancers, since they make money from outside labor an employee-employer relation (Hatzopoulos, 2018).

2. ANALYSIS OF THE WORKER STATUS IN COLLABORATIVE ECONOMY

Authors discuss legal status of the actors in collaborative economy often arguing on service providers as „self-employed“ persons. It has been mentioned in the literature that in the absence of any special legal category specifically corresponding to the characteristics of the collaborative economy, courts apply „traditional“ rules to new realities and try to fit atypical and extremely variable tripartite contractual relations into the typically binary distinction between employees and self-employed persons (Hatzopoulos, 2018).

De Stefano (2016) also classified workers in the collaborative economy generally as independent contractors and as such, they have no access to the vast bulk of employment protection and they have no social rights, such as maternity leave, paid holidays, full unemployment benefits and etc. According to the NVF (National Vzdělávací Fund, 2017) it is also mentioned that many countries have a mixed approach when it comes to the definition of workers in the collaborative economy, but most agree that they are independent self-employed or small entrepreneurs; for example in Belgium, a legal position of a platform worker is not important if s/he earns less than a specific amount through the platforms, but if a person earns more than that amount, s/he must register as a self-employed person.

The European Parliament (2016) also defined a worker in the collaborative economy – „*Workers are effectively self-employed, and the platform’s terms and conditions generally dictate all the details (such as pay, working conditions and intellectual property).*“

In spite of this, opinion accepted (Bjelinski Radić, 2017) is that if the following essential elements characterise relationship between platforms and workers :

voluntariness to perform,
the obligation to perform personal work,

economic value and subordination.

The digital labor market enabled workers to do the job anywhere and anytime, so one of the main benefit often accentuated is that this kind of the market offers workers higher flexibility. Also, one of the characteristics of independent work is that workers use their own equipment for work. Hatzopoulos (2018) gave an example of Uber where reemployment assistance of the Uber as a company was based on: (a) the clear terms of the contract and the fact that Uber acts upon reliance (for its fiscal and social obligations); (b) the fact that drivers supply the most essential equipment of their work, their car; (c) drivers choose when and where to drive; (d) drivers are not subjects to direct supervision by Uber and (e) drivers are allowed to work for other competing platforms. On this bases in State of Florida drivers what drive with mediation of the transportation platforms (such as Uber and Lyft) are independent contractors and not employees assuming that it is clearly stipulated in their contract that they are free to choose when to work, and that they are free to work for competing platforms, or indeed, pursue any other economic activity (Hatzopoulos, 2018).

One of the main characteristic of these workers is that they do jobs that require little training which makes it easier to switch between jobs (Eurofound, 2015). Also, they are characterized by a wide diversity of tasks and activities, levels and types of required skills and relationships among workers while integrating with platforms and that is why employment is made more difficult by created criteria related to status of the workers which would be generally usable (European Parliament, 2016). In the literature, it stands out that this new market opens a great possibility to get education in a much cheaper and easier form (it refers to the easier and general skills that can be overcome through the Internet) compared to today's education, while on the other hand there are also those who are socially excluded for reasons which do not have Internet access or adequate equipment for work (NVF, 2017). Considering that the labor market is currently very demanding and his supply and demand has occasional and temporary jobs, it has created a new term called "pool" of workers where students and retirees are most included. That has been recognized also in Croatia by the newly established platform called "Today I Work" (cro. Danas radim), which in real-time, quickly and easily combines the supply and demand of seasonal, casual and additional employment for interested workers.

3. LABOR LAW REGULATION

The most widespread peer-to-peer platforms such as Airbnb and Uber are currently facing serious problems relating essentially to two main issues (Selloni, 2017): tax avoidance and deregulation of the labor market. Therefore, when a new form appears in the labor market it is important to be regulated in a timely manner. It is essential to understand how a newly formed model works and can endanger already existing subjects in that market. Likewise, it is essential that regulation and set conditions do not prevent the development of new forms of service provision and at the same time provide equal opportunities for everyone.

Regulation of the collaborative economy in the current standing, only in some countries, is fragmented, and legislative restrictions are mainly targeted at certain participants in order to reduce the impact of disruption to traditional jobs or in some cases to their particular services (Bašić and Jurčević, 2018); for example a temporary local veto on Uber by the London authorities (Kollewe and Topham, 2017). A solid legislative framework is not recommended, but calls for action within existing regulatory frameworks in the sector. Better said, many authors suggest an early, but mild regulatory intervention because the platform features can change, while regulation, when implemented, can hardly be changed (Codagnone and Martens, 2016).

The authors in their work paper mention that a new approach to bottom up self-regulation is needed in which (Codagnone and Martens, 2016):

- a) various forms of licensing should be reduced to allow private certification schemes and reputation mechanisms to evolve;
- b) regulations making it difficult for start-ups to compete for labor (contractors should not be turned into employees) should be avoided;
- c) regulation should remain general and not industry specific.

Today, there are very well known platforms that have almost the same or similar purpose of existence, only differ by some innovative mechanism of work. Czech Fund (NVF, 2017) considered that some simple and more general regulation would be more suitable and at the same time it should cover the whole width of the new forms of business and various professional activities in collaborative economy including those that can appear in the future.

According to NVF (2017), regulation should regulate conditions for collaborative economy as well as standard forms and securing the rights in the following directions:

- **protection of state and public sphere** – especially the protection of state incomes and lower administrative structures incomes, control of movement of foreigners from the third countries;
- **protection of business subjects rights** – securing equal opportunities for enterprise and removing the risks of unfair competition;
- **protection of individual rights** – especially a protection of de facto dependant work the people who participate as ‘the offering’ subjects in shared economy, securing equal opportunities for people who are selfemployed;
- **protection of consumers rights** – says that it is necessary to protect the users of these newly formed platforms.

Legislative measures should be accessed carefully, because they should encourage innovation, growth in employment and economic activities, but on the other hand, market competition must be respected and maintained (Bašić and Jurčević, 2018). New platforms, related to the concept of collaborative economy, have great potential for economic development. According to analysis by PwC (2016), total transactions for Europe’s five most prominent collaborative economy sectors (collaborative finance, peer-

to-peer accommodation, peer-to-peer transportation, on-demand household services and on-demand professional services) could see a 20-fold increase to €570 billion by 2025, up from just €28 billion since 2016.

All in all, countries should give importance to certain statutory points and legal regulations, whether it is about classic jobs or about jobs through platforms (NVE, 2017).

3.1. *Taxation*

The collaborative economy has created digital platforms and people share and use goods and services through them at a cheaper price. However, many countries have noticed the development and rapid expansion of the new market and have begun to regulate it. The main trigger for regulation was the question of taxation for this high profit industry.

Compared to the traditional business model where a legislative part is clearly defined by who is entering the VAT payment system. For example in the Republic of Croatia, a threshold of HRK 300,000.00 is applied for entering or leaving the VAT system (see Zakon o porezu na dodanu vrijednost NN 73/13, 99/13, 148/13, 153/13, 143/14, 115/16) and who is responsible for paying personal income tax and contributions to their employees, platforms in the collaborative economy do not consider their worker as a traditional employee. From this perspective the main problem with taxation occurs (NVE, 2017).

In the area of collaborative economy taxation the main issues are: income taxation and VAT since it is difficult to identify taxpayers, not least due to the fact that they may be operating in a professional or non-professional capacity and it is a complex task to precisely measure the taxable income (Guerini, 2017).

When analyzing national taxation regulation there are some interventions in the national law. For example, in France, local institutions have an agreement with Airbnb on collecting taxes. France has become Airbnb's second biggest market and new rules and regulations have been introduced for French hosts who are registered on the aforementioned platform; new rules for Airbnb hosts in France are (Johnston, 2018): (1) tax rules are for those who use the site to earn rental income and they must be treated as 'professionals' and therefore pay taxes to the French government, but those who rent out their apartments while on holiday or when they go away for a weekend should not be affected, only those who use Airbnb to rent out their property for most of the year; (2) the French tourist tax Airbnb properties are now classified under the rental category of furnished lets or „meublés touristiques non-classés“ and a charge per person per night; and (3) French government for rent allowed maximum of 120 days per year. In Croatia there are initiative from the Ministry of Tourism to introduce amendments into existing regulatory framework and introduce obligation for rentiers to notify their tax number in advertising and publishing and to introduce this obligation also for the rental digital platforms. Amendments should be introduced in Act on provision of tourism services (Zakon o pružanju usluga u turizmu, Official Gazette 130/1017) which would regulate obligations for new rental platforms (Koretić, 2018).

3.2. *Social rights / Working conditions*

When a worker in digital economy is compared to a “traditional worker” who works at regulated labor market that brings up issues of social and other rights connected with his employment status.

In this part authors give short review of existing workers’ rights such as the minimum wage, right to annual leave, labor protection, maternity leave, retirement and health care and then present the position of the worker is in at the collaborative economy market.

The Labor Act (Zakon o radu, Official Gazette No. 93/14, 127/17) define in detail- es employer and employees rights and obligations. In Article 7 of the Labor Act, fundamental obligations and rights arising from employment relationship are defined:

- (1) The employer shall be obliged to ensure work for an employed worker and pay remuneration for the work performed, and the worker shall be obliged to perform the work following the instructions provided by the employer in line with the nature and type of work;
- (2) The employer shall be entitled to determine the place and the manner of performing the work, and shall respect the worker’s rights and dignity;
- (3) The employer shall be obliged to ensure safe working conditions with no detrimental effects to the health of worker, in accordance with a special law and other regulations;
- (4) Any direct or indirect discrimination in the area of labor and working conditions shall be prohibited, including the selection criteria and requirements for employment, advance in employment, professional guidance, education, training and retraining, in accordance with Labor Act and special laws and regulations;
- (5) The employer shall be obliged to protect the worker’s dignity during the work in case of acts, uncalled for and contrary to this Act and special legal provisions, of superiors, collaborators and persons with whom the worker contacts on a regular basis while performing his tasks.

The amount of the minimum wage for the period from 1 January to 31 December 2018 was determined by the Government of the Republic of Croatia in the gross amount of HRK 3.439,80, which refers to full-time working time (Regulation on the amount of minimum wage, Official Gazette No. 122/18.); while the lowest pay for part-time is determined by the minimum wage for full-time and working hours for which the worker is reported, such as a part-time employee (half-time) of 20 hours per week, the minimum wage may not be less than HRK 1.719,90 per month.

As regards annual leave rights are quoted in Article 76 to 87 of the Labor Act:

- (1) The worker shall be entitled to a annual leave of at least four weeks in each calendar year, and the minor and a worker engaged in works involving exposure

to harmful effects in spite of the implementation of health and safety at work protection measures shall be entitled to at least five weeks of annual leave;

- (2) A period of annual leave longer than the minimum period laid down in paragraph 1 of this Article may be defined by collective agreement, agreement between the works council and the employer, working regulations or employment contract;
- (3) The first-time worker or the worker with the interruption period between two employments exceeding eight days shall acquire the entitlement to annual leave provided for in paragraphs 1 and 2 of this Article after six consecutive months of employment with that employer.

One of the most important rule is related to the protection of life, health and privacy.

According to the Article 28 of the Labor Act:

- (1) The employer shall be obliged to provide and maintain plants, machinery, equipment, tools, workplace and the access thereto, and to organise work in such a manner so as to ensure the protection of life and health of workers, in accordance with specific provisions and the nature of work performed;
- (2) The employer shall be obliged to inform the worker about any dangers pertaining to the work performed by the worker;
- (3) The employer shall be obliged to train the worker for the work to be performed in such a manner so as to ensure the protection of the worker's life and health and prevent accidents;
- (4) Where the employer is responsible for providing accommodation and food to the workers, due account shall be taken of protecting the life, health, morals and religion of the workers.

The law also guarantees the protection of pregnant workers, parents and adoptive parents, (Article 30 of the Labor Act). Except for these obligations it has to be mentioned again obligation for employer to pay off the taxes. After a short review of all the provisions of the Labor Act for traditional work, it is necessary to look at the rights of the new worker.

According to De Stefano (2016) classified workers in the gig-economy as independent contractors and, as such, they have no access to the vast bulk of employment protection even if they were classified as employees, the intermittent nature of their activity could be an obstacle to important employment or social rights, such as maternity leave, paid holidays or full unemployment benefits. NVF (2017) concludes that workers at the platform usually have lower or no work protection at all and they often do not contribute to the social rights system.

Considering that the concept of workers in the market of collaborative economy is relatively new, it will take some time for countries to adapt their legislation.

4. CONCLUSION

The collaborative economy is recording enormous growth rates, especially in tourism and the accompanying sectors. It supports a decentralized scheme with new ways of communication and business – we can say that is an entry into a whole new age of accessibility, making those unthinkable ideas possible, achievable, and offering a whole range of innovative solutions. All of this would not be possible without the development of the technology we know today. With this rapid and powerful development new business models appeared and a new perception of workers opened up. New business models go far beyond standard and typical working conditions, provide greater flexibility, freedom and independence which every man in the 21st century strives for. A worker on a newly formed market of the collaborative economy is defined as a self-employed person, but it will probably take some time for the whole regulation to be subordinated, the legal system to be regulated, and also that workers get the status they deserve.

The main question that has to be analyzed is how to adapt «traditional» regulation to the new circumstances that are growing rapidly or to invent new regulation that will follow the needs of collaborative economy. Since the time is opening up new possibilities for digitalisation and working relations are changed every day the authors consider the need for new «flexible» rules as necessity.

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REGULATION INCENTIVES IN EUROPEAN CROSS BORDER RETAILING

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Abstract

More and more consumers are looking for inclusion in online processes to meet the needs and fulfill their desires. The online channel opens up new opportunities for innovation in communication among people, and this has a significant impact on lifestyle changes, especially in shopping. A large number of consumers who are delighted and buy online regularly and feel safe, however, is also a great proportion of those who experiment, test the capabilities, reliability and security of the channel. Current task of European single market policy is how to stimulate and encourage consumers to purchase goods and services cross-border. Only 37% of Croatian consumers are prone to online cross-border purchase. Evaluation tools, exchange of recommendations and criticisms as well as ease of price comparison make value for customers. The purpose of the paper is to make a critical review of recent changes in consumer protection regulation in the context of online purchasing. Numerous disadvantages of Internet retailing are removed by regulation (e.g. cost of partial delivery, geo-blocking, ranking of bids on price comparison platforms) to protect the consumer and increase online sales, however, regulation is increasingly tighter for retailers, as it has obviously been shown to have a positive impact on increasing the number of online customers. In the multitude of documents that the European Commission has been publishing so far and which is constantly developing on the issue of consumer market position, in the context of this paper, those relating to the protection of consumers' position in online purchasing will be outlined in order to give practical guidance for retail management.

Key words: online retailing, domestic market, cross-border, geo-blocking, regulation

1. INTRODUCTION

Adapting consumer market to the digital arena is one of ten strategic goals of the European Commission. To make that possible it has adopted the Digital Single Market general strategy. Civic Consulting estimates for the European Commission that European consumers may save around 11.7 billion euros each year thanks to the larger offer and lower prices offered through online channel (Civic Consulting & European Com-

mission, 2011). Electronic commerce had a share of 7.2% in total retail sales realized in 2014 within EU, while in the United States it reached 11.6%.

In the past decade, a large increase happen in the proportion of consumers purchasing online, from 21% in 2005 to 50% in 2015. Transactions frequency also have increased. In the Union area, only 4 out of 10 retailers provide online sales service (Deloitte & ECME, 2013). The term online in regulation context includes any type of software, such as websites and mobile applications, which is managed by trader or managed in a trader account, through which goods and services are made available so that a commercial transaction with the customer can be carried out.

The general problem is a weak cross-border online purchase. According to the latest data, in 2015, only 15% of consumers made online purchases outside their domestic market, while 47% made purchases exclusively in home country (European Commission, 2016f). The same survey reveals over two-thirds of online sales revenue comes from domestic customers from a country where a retailer is registered. Therefore, it is estimated that there is a large unexploited capacity of the electronic retail channel. There are three main measures to strengthen the channel's attractiveness: put geo-blocking out of action, greater transparency of parcel delivery prices and uniformity of the rules for contracting online consumer relationships or in other words the same set of key contract law rules.

The survey shows that only 37% of European retailers have online operations, and only 12% provide cross-border transactions (European Commission, 2016c). Nevertheless traders emphasize the reasons why they are unwilling to sell through electronic channels, so 57% of them explain that shipping costs reduce their price competitiveness, claiming high costs of warranty and goods return, and almost 54% of them claim they do not know enough about terms and conditions they must comply when they sell abroad. The diversity of contractual laws among members makes it difficult for retailers and operators to deal with and also how to manage the return in the case of dysfunctional or defective products.

According to the current regulation, consumers opting for online shopping from another member state are protected by the rights that apply to the retailer origin country, however, the new proposal for consumer regulation in cross-border transactions would enjoy rights in their home country. There are obviously two directives that will regulate the area of electronic commerce in the future: a) Directive on certain aspects concerning contracts for the supply of digital content and b) Directive on certain aspects concerning contracts for the online and other distance sales of goods. Selected directives would require a much more detailed and comprehensive system of incursion into national legislation. Full alignment will eliminate the fragmentation of contractual consumer rights linked to online commerce between states, thereby reducing existing barriers for traders.

From the beginning of 2015, the so-called "Mini One Stop Shop (MOSS) started. This is a new process of taxation of the provision of digital VAT services where telecommunication and electronic service providers are obliged to calculate VAT to the business or end-user service at the rate applied in the country of the customer regardless of where

the service provider is based. If the online retailer from Croatia sells the software or video game to the final customer in Hungary then the 27% VAT rate in the retail price must be included in the retail price in Hungary. Similarly, if a Croatian customer purchases from a German online merchant a subscription to a TV channel then the German retailer at a retail price is obliged to include a 25% VAT rate.

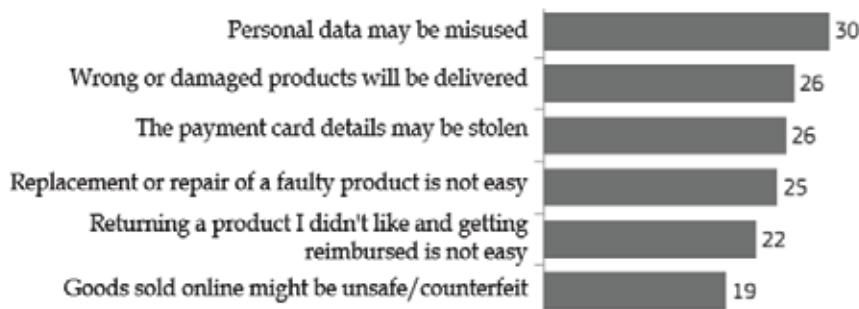
2. CONSUMER TRUST IN ONLINE SHOPPING

The lack of consumer trust and confidence in online shopping shows data from the survey carried out in 2013, where 61% of consumers feel safe if they shop at a web-shop in their home country, but only every third feels safe while buying from an online retailer in another country. Consumers are stimulated to use on line channel because they can order at any time (49% of respondents) and that gives them a better use of their own available time (42%). The price search option (49%) or the bar at a price comparison (37%) gives this channel the advantage over the other (Deloitte & ECME, 2013). Consumers consider that the choice of goods online is often broader and more attractive (36%), and some products can only be ordered online (25%). What brings value to consumers is also evaluation tools, exchange of recommendations and criticisms (21%) as well as ease of price comparison (20%).

The main factors that negatively affect consumer confidence are described in Graph 1. Obviously, misuse of personal data is the most common obstacle (30% of respondents indicated this as a reason). Consumers are not sure to what extent disclosure of personal data when ordering may compromise their social, financial and physical security.

The largest trust and confidence in online transactions exist among consumers in Denmark, Austria, Great Britain, Sweden, Ireland and the Netherlands, while Croatia and Bulgaria record the lowest confidence index in the online trade of goods and services. This area is not exception, because Croatia has poor performance in other areas of consumer policy too. Online retailers' survey in Croatia reveal that 60% of them are satisfied and have confidence in online sales of goods.

Graph 1. Main concerns about buying online in own country, EU-28, 2015.



Source: European Commission, (2015a).

Multivariate correlation analysis reveals that the segment of customers searching the internet every day shows the greatest trust in the online channel (European Commission, (2015a). Those who have financial difficulties are not prone to online shopping. It is also possible to distinguish the expected information that populations older than 65 show the least confidence for online, while the group between 25-34 years of age has the highest confidence.

Consumers who do not exercise the right or do not know they have it, are actually waiver. To be fully acquainted with his rights, the average visitor is expected to read and understand the terms of use. This often takes a lot of time and is not in line with the aspiration of quick information search on the internet, so that visitors agree to terms on “blind”. One study shows the average consumer in one year of surfing needs about 250 hours a year, which would turn 33 days, to actually read the Privacy Statement required by the websites he visits.

3. REGULATORY REFORM IN THE SALE OF GOODS ON THE INTERNET

3.1. Smoothness of online transactions

The aim of the new Directive on certain aspects of the sale of goods on the Internet and other remote-on-demand goods is to further remove barriers to online trade that are linked to consumer contract law and to assist in establishing a truly unique digital market in favor of retailers and consumers (European Commission, 2016b). It seeks to provide a better harmonized regulatory framework at Union level to create more affordable conditions for traders who plan to sell their goods in other Member States. Today, retailers often block online access so that they do not have to make efforts to tailor contractual relations with consumers that are regulated by different regulations from country to country. According to the new rules, retailers will no longer be faced with different consumer contract laws, but the key rules for online sales of goods and digital content downloads will be valid for everyone.

In the new regulatory framework, the most important aspect is removing the burden of proof. For example, if a Croatian consumer finds out that the product she bought online more than six months ago has become dysfunctional and if she asks the retailer to repair or replace it, she would have to prove that there was a shortage at the time of delivery. Under the new rules (European Commission, 2015a) the consumer will be entitled to a refund throughout the prescribed two-year guarantee term without the need to prove the existence of a shortage of delivery.

As a part of the new rules for online sale of digital content (software, video, music, video games, text content), the retailer is obliged to indicate to the consumer the interoperability of digital content with computer or software equipment for which the retailer knows or ought to know. In addition, there is an obligation to inform about the functionality of digital content, copyright restrictions, and the use of technical measures that may affect use (e.g., the term of the right to use). For example, a customer who is paying and downloading a video game that does not work immediately after instal-

lation can claim damages immediately, however, the trader in such a situation usually does not return the money but offers a discount on next purchase. Under the new rules, the consumer will be able to seek a solution to the problem, and if the trader fails to resolve it, he / she is obliged to offer the consumer the termination of the contract and return the entire amount.

Logistics of physical delivery of goods ordered over the Internet is a key element of the growth of electronic commerce. Delivery services offered by online retailers are one of the key factors that affect the consumer's decision to make purchases. Among the key barriers to the functioning of electronic commerce between consumers and retailers is the delivery and return of goods. Consumers are often not sufficiently familiar with the delivery opportunities, when and how their package can be delivered and how they can get it back if they want. Consumers are dissatisfied with the long delivery period and lack of information on the delivery process. The views expressed were that the prices of cross-border delivery delivered to rural or remote areas were too high. They complain about the delivery of the damaged products or their products, and the delivery of the wrong products. Often, they are not familiar with the available complaint and legal protection mechanisms in case of a problem (Copenhagen Economics, 2013).

Online retailers, especially those with low negotiating power, may have little impact on the price of delivery services that are potentially available to them and are limited in their choice and availability of quality and affordable delivery solutions (e.g. search and tracking functions, flexible delivery options for so-called "last mile delivery", etc.). Online or multichannel retailers work under time pressure. The success of their business depends on the capabilities of the postal and courier delivery sector that is required to deliver at a low price and in a practical way. Small online retailers cannot look for substantial discounts on logistics providers and ask for more convenient delivery options available. At the same time, they do not have the ability to invest in their own delivery network. In an environment based on volume economics, they hardly compete with big retailers.

The Consumer Rights Directive in 2011 created the first step in removing barriers to hidden costs and price transparency in online purchases, then greater rights to repatriation were regulated, and obligations to inform the trader about the costs of buying back purchases in case of a waiver .

3.2. Pre-contractual notices and obligations of online retailers

Providing clear information and notices can help users make informed choices. The research shows that users are more than limited when they need to collect and process the information retailers provide (European Commission & GfK, 2016). Sales conditions are sometimes unclear and completely understandable so that they appear to have been written for lawyers rather than average consumers. Even adopting the notice to average consumer becomes ineffective enough for consumers with weaker and slower information processing capabilities. It can help visual and audio clips that can be embedded in the text.

The retailer is obliged under regulation to respect the special rights of consumers pertaining to online channel. The underlying obligation of a retailer is to place an overriding notice on the webshop page where he provides important information prior to the conclusion of the distance contract or before being advertised with the appropriate offer. The law determines which information is to be provided to the consumer in a clear and understandable way. This information affects the bringing of purchase decision. In practice, such a pre/contractual notification commonly summarizes:

- basic retailer registration data,
- a notice of goods or services,
- retail price,
- method of payment,
- terms and conditions of delivery,
- the way of treating consumer privacy,
- the process of filing and solving consumer complaints,
- warranty and service,
- contract duration,
- notice of consumer rights and conditions for a one-off termination of a contract concluded at a distance, often accompanied by a one-off termination contract.

By confirming the order of the e-basket and by accepting the general terms and conditions of trading it is considered that a distance contract has been concluded between the retailer and the consumer if all the conditions provided by the law are met. Timely and orderly information should ensure rational and informed consumer decision on the contract that she enters into.

At the webshop, the retailer is obliged to indicate the total price of the goods and services including VAT. All possible additional costs, such as shipping costs, must be highlighted separately. Costs that occur later, after the checkout, the buyer is not required to settle. Online retailer and customer, according to the law, make a distance contract by online purchases. In such a contract, the consumer has the right to cancel the purchase within 14 days from the day he took over the package with the goods. This means that a consumer has the right to terminate a sales or service contract concluded online without giving any special explanation during that period. If merchandise is in place, consumer is obliged to return the undamaged goods to the retailer's address and the retailer is obliged to return the entire amount paid by the customer for the returned goods. It is the obligation of online retailer to inform the consumer before purchasing his / her right to a one-off termination and the right to a refund if it assesses that the goods / services are not in line with the expectations. The retailer is forbidden to point this consumer right for marketing purposes to attract the customer. There is an additional obligation for the trader to publish a unique one-off termination form unique to the EU market and which consumer has to fill prior returning the goods.

The second common misconception with consumers is related to the cost of goods return. The retailer is obliged in the contract notice to clearly indicate how the

consumer can return the goods and who will incur the cost. If the trader does not accurately give this information in the foreword notice, this means that he or she will bear the expense.

If a button on the screen or similar function has to be activated for the order, that field on the screen or similar function must be marked in an easily visible manner with the words “payment order” or similar unambiguous statement explaining that the order includes a payment obligation. At the beginning of the ordering process, the retailer’s web pages must clearly and unambiguously indicate whether there are certain limitations on the delivery and what means of payment are acceptable.

One of the reasons why consumers and smaller businesses do not participate in cross-border transactions to a greater extent is that the rules that apply to these transactions may be intricate and vague and may differ (European Commission & GfK, 2016). Having 28 different national laws on consumer protection and the same number of different contractual rights, it discourages businesses from cross-border trade and disables consumers to take advantage of the full range of online offers and to choose more competitively between them.

4. BLOCKING ONLINE SHOPPING BY GEO-BLOCKING

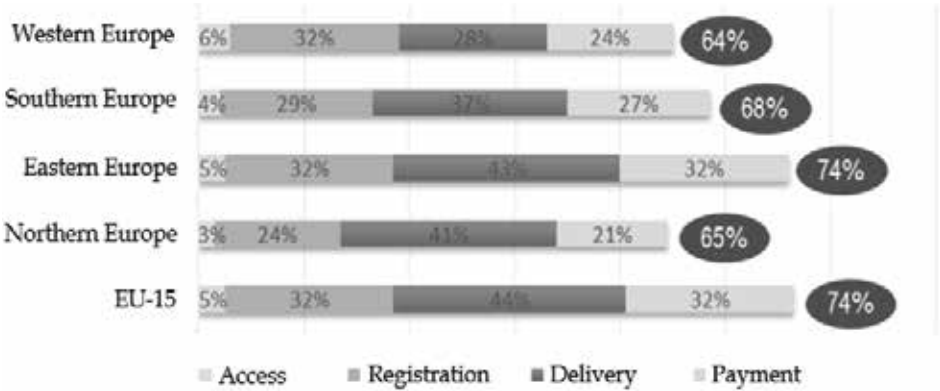
Consumers are encouraged to cross-border on-line shopping, however, there are online retailers that set certain information and transaction limits for consumers outside the home market. They thus refuse to sell goods or to adjust the terms of sale to a consumer visiting web shop from another country. The representation of these constraints based on geographical location and affiliation is investigated by mystery shopping, with the latest 2015 results of 10,296 web shops showing that only 37% of cross-border online attempts were successful until the last step, while others were blocked when accessed or at some stage of the order process (European Commission & GfK, 2016). There are reasons why retailers block: differences in contract law between countries, different VAT calculation, obstacles in distribution channels for cross-border delivery of goods, etc. (European Commission, 2016c). Despite these reasons, the regulator’s position is that most of the blocked cases are not justified, therefore a new Regulation (European Commission, 2016g) is proposed in this field.

The survey done for European Commission (2016f) reveals that only 8% of web shops allow to start shopping without prior registration, so every nine out of ten require previous registration. In such a way, the goal is to collect data on e-mail address, phone number, payment method, and in 14% of cases, activation via e-mail was also requested. Although there are several types of geo-blocking, most often, when registering or confirming an order, appears in the form of an unacceptable input of address of the delivery of goods or services (for example, in 20% of cases of a tourist service order from another country is blocked).

Geo-blocking refers to the practice of online traders that creates the effect of refusing access to a webshop from another country. This includes situations where the shopper has access to the search, but cannot access the payment system or to select

the delivery address. Geo-blocking occurs even when the shopper due to the location is not entitled to lower prices or more favorable sales conditions in comparison with customers from other countries. The regulator’s goal is to reduce the representation of geo-blocking in practice by limiting the behavior of online retailers put a special regulation into force.

Graph 2. Geo-blocking prevalence at different stages of the online shopping process by shoppers’ EU region.



Source: European Commission & GfK (2016).

Graph 2 shows the structure of representation of a particular form of geo-blocking in relation to the region where the shopper comes from. Mystery shopping shows that the majority of visitors from Eastern European countries were blocked (up 74%) while intending to buy from other countries. It can be concluded that geo-blocking is most noticeable at the delivery stage (when entering delivery address). Thus, 27% of shoppers from Southern Europe were stopped at the final payment stage, 37% visitors were blocked at one of the delivery stages, and some at the registration stage.

Another important change concerns the regulatory ban on blocking access to the webshop and automatic redirection without prior consent of the visitor. In the present practice the retailer could block access to the visitor who visit the same retailer’s website in another country where prices and conditions might be more favorable. For example, despite the fact that the customer intends to visit the Italian webshop (in the Italian domain), the system automatically redirects it to the Croatian version. By introducing a new regulation, the redemption requirement will be customer consent, and even if the visitor agrees to redirect to the second page, the access to the original page he / she intends to visit must be enabled.

The third change is related to online payment methods. Although the retailer will still be able to decide independently on what payment methods are acceptable to the webshop, it will not be permitted to discriminate between these accepted forms of payment due to the location where the financial online payment service provider is located. A retailer will be prohibited from blocking the payment if these three conditions

are met: a) the customer is paying in a currency acceptable to the retailer (e.g. EUR); b) if a retailer applies a high level of payment authorization (e.g. PayPal); and c) if payment is suitable in electronic fashion (such as a card payment).

The Services Directive (2006/123/EC) already stipulates that access conditions to the service, which are made available to the general public by the provider, must not contain discriminatory provisions regarding the nationality or place of residence of the recipient. However, in practice, no trader has been sanctioned because it violated this rule, which means that the measure was not effective.

It should be made clear that the new regulation does not impose an obligation on the online trader to sell goods and services to his webshop on the entire European market, but only more precisely defines when and in what situations the discrimination and rejection of the visitor based on the location where they live and the nationality will not be allowed. By the new geo-blocking regulation regulator does not interfere with the level and price formation. Online retailers will still be able to offer goods and services at different prices in different countries to attract customers from these countries. It is important to enable consumers to buy also under the terms that have domestic buyers in the country from which the online retailer comes.

5. NEW REGULATION OF THE SUPPLY OF GOODS PURCHASED ONLINE

In order to build consumer confidence in online trade, it is important to ensure affordable prices and high quality parcel delivery service that does not significantly differ among countries (a parcel is considered to be an object not exceeding 31.5 Kg, with the smallest dimension exceeds 20mm). Lower and near uniform prices of cross-border package delivery would increase the attractiveness of online shopping (European Commission, 2013). The lack of transparency in shipping pricing makes it difficult for traders to guarantee their customers the cost of delivery to other countries (Copenhagen Economics, 2013). Thus sending the same package from the Netherlands to Spain stands for EUR 13, and in the reverse direction EUR 32. The regulator aims to introduce control over the prices of postal delivery packages and ensure their greater transparency for traders and consumers.

Consumers of goods purchased over the Internet often do not know which delivery options are available to them, when and how they can get their package and how to get it back if they want to (European Commission, 2016g). They complain about the long delivery period and the lack of information about the delivery procedure. There were also frequent views that the prices of cross-border delivery and delivery to rural or remote areas are too high. They complain that they are being delivered damaged products or they are not delivered to the products at all and deliver the wrong products.

Postal operators with more than 50 employees and who have operations in two or more countries will be obliged to send to the national regulatory body the basic information about their operations (the volume of shipments, traffic and movement of employees). The second measure is the public announcement of basic services prices

(e.g. sending a package of 2 Kg). This is to provide online retailers with better access to information. It is important that they can be easily informed about the essential features of various delivery options (primarily information on the delivery period, tracking options, and various delivery options for the so-called last mile, delivery and return tariffs) and related tariffs.

Under such new regulatory conditions, a number of criteria is taken into account in order to determine the objective price of cross-border deliveries: domestic freight rates, distance of destinations, term remuneration (charges for transferring responsibility to another operator in another country), costs transportation and handling and quantity of consignments. Such a regulatory model will mostly affect small online retailers who cannot agree on better terms with major players, ultimately negatively reflecting their price competitiveness. By introducing supervision and transparency of the delivery price of the EU-level shipping service, a more competitive package distribution market was created, which could stimulate online traffic by 4.3% and increase the number of online retailers by 6.2% (European Commission, 2016g).

Favorable and high quality cross-border delivery services can build consumer confidence in cross-border retail sales over the internet. Stakeholders are concerned with the lack of transparency, excessive costs for small consignments and the lack of compliance among the various operators commonly involved in the delivery of cross-border shipments. All these are sources of impracticality for the consumer. Amongst companies currently not selling over the internet but intended to that soon, 62% of them suggesting that the problem is too expensive to deliver (European Commission, 2016g). It is estimated that the above-mentioned tariffs for cross-border delivery charged by national postal operators are two to five times more than domestic prices.

6. PRICING ISSUES

6.1. *The price dynamics of online shopping*

Dynamic prices of goods and services have become a common way of attracting customers. Prices at the webshop are constantly changing depending on the offer and demand, but also depending on the weather forecast, the day of the week, the offer of the competition etc. Despite the frequent changes, all the shopkeepers at one point offer the same price for a particular product or service. For example, there are cases where the product in one day changes the online price several times.

The second price technique, commonly practiced in online retailing, is to set personalized prices according to shopper's features. This means that the same goods are offered to different customers at a different customized price. The buyer who needs to attract and encourage the purchase will be offered at a lower price. The software that manages the webshop can differentiate the cost of cookie information stored on a visitor's computer, identifying the device through which the visitor accesses the site (mobile device or computer), or depending on the location from which it is accessed (zip code or IP address). In reality, it is not easy to come up with individual price examples because traders are cautious in using price differentiation and sensitive price setting

because they are responding to negative customer reactions that might be considered unfair to sell.

Shoppers using online search tools and price comparison to find the best bidder are considered to be price-sensitive buyers (80% compare prices, and only 8% searches for ratings and opinions). Thus a visitor who has been redirected to the webshop by the comparison platform is likely to be more sensitive than the one who visits the webshop directly (European Commission, 2016e). This is a prerequisite because some studies show that the price for such visitors decreased by up to 25% compared to the price offered to direct webshop visitors.

The online price dynamics and the individual price setting at the webshop are not limited and prohibited by regulations. However, it is important to inform the visitor with the way the price is determined i.e. the Consumer Rights Directive requires the trader to inform if the price is individually set up or if the mechanism of automatic dynamic pricing is used by the online platform depending on the features of the visitor. It is in fact the necessity of informing the shopper of the criteria according to which the price level is formed, for example, according to the information of other pages, location, IP address, access device, shopping history, etc. In this context it is clear that sensitive and data for which exploitation trader should seek consent. Part of this security mechanism is providing information on how the website uses cookies to track visits.

6.2. Ranking of bids on online platforms

Consumers on the Internet are so exposed to numerous bids that often make it difficult for them to make the right choices about choosing and purchasing. For this reason, they seek ways to better compare offers and facilitate the decision-making process. Comparison tools can encourage consumers and increase market transparency (Boom, 2011), and are therefore a very sensitive issue that links many of the examples of unfair business practices (European Commission, 2015b).

For example, if a visitor considers a touristic arrangement at booking.com and with the offer it comes up with the information “there are only two rooms available” - does this mean: a) that the observed hotel has only two more rooms in that term; b) to offer only two more rooms at this price; c) that only so many other agents are still available through this website; or something else? Such information acts confusing to visitors and certainly puts pressure on the visitor to shorten the time to make the decision.

Platforms can be described as business models emerging in a digital economy such as search engines (Google, Yahoo), social networks (Facebook, Twitter), rating (TripAdvisor), comparison of bids (booking.com, trivago.com), Collaborative (Uber), Marketplaces (Amazon, Ebay, Sniffer) and other online product and price comparison platforms. They altogether should contribute to strengthening the transparency of the offer so that customers can easily reach lower prices, but in practice they do not always achieve that goal because they are under the influence of commercial platform-led operators and traders whose products and services displayed on those websites (European Commission, 2016a). Some sites apply business models based on commercial conditions

so they actually show visitors misleading information about what is more beneficial. There are several such business models that break neutrality such as fee per click, pay per order, commission and promotion. Promotion payment usually appears as a reason for high positioning of products / services.

In a court case in 2015, where the hotel sued the rating platform operator who revealed the customer's critique as a "hotel room at a hotel price of 37 euros per night," the German court granted to the operator because it estimated that the role the platform is neutral and the operator's responsibility lies only in the part to make the allegations. Online platforms mediate between traders and consumers, and if, according to jurisprudence, the consumer creates the impression that the platform sells goods or services then the platform operator will be responsible for solving problems and returning merchandise as this is a result of misleading business practices.

Advertising and the results of the sponsored bid ranking must be visually separate from the original comparison. You must clearly enable the selection of ranking criteria. Consumers must be clearly informed about the relationship between the trader and the operator that manages the platform and must be allowed to choose a fair comparison and ranking method on the platform. In order to move away from unfair business practices, the platform operator should be notified if there are proprietary relationships between platform operators and traders whose merchandise or services are compared (on the FAQ page or "About Us"). If the bids are valued at the price, then the final retail price must be taken into account. Given that platforms often do not provide additional information on shipping costs, it would be useful to invest effort in collecting at standard delivery costs.

Comparison tools are expected to be neutral and objective in providing information and ranking bids or, if not, to provide true information to the user if there are other conditions to promote the position of the merchandise and services on the scale (European Commission, 2016e). Hiding these other conditions by ranking are deceiving consumers and losing their trust because positioning is not in their interest. When such impressions of consumers expand, a negative impact on the economy and on-line trade as a whole is created.

All criteria and commercial relationships that create deviation of the online platform and thus harm the economic interests of consumers, must be appropriately revealed to the visitor (i.e. easily accessible). Therefore, providers of these online services are required to indicate the criteria for ranking the bids because it affects the decision making process. There are cases in practice where an operator discretely denies criticism, and gives preference to the evaluation of goods or services, which is an act from a list of unfair business practices (European Commission, 2016d). An example is consumer persuasion as a user rating (customer rating), and is actually a false recommendation associated with the promotion. Such sponsored ratings should not be included either in the aggregate number of reviews highlighted in the offer of goods.

7. CONCLUSION

Online retailers are faced with the implementation of the more sophisticated regulation and supervision of activities related to the online trade of merchandize and services, including the regulation of parcel delivery. It is expected that new regulation package brings several benefits to European consumers and broaden their rights while shopping online in another country. It is proposed to remove barriers and equalize contractual rights in online shopping so there will be no problem if the buyer rely on his national contract law. While buying goods, an online customer will no longer be in the dilemma of treating consumer rights because transaction will always respect buyer's domestic national legislation. It will encourage them to run smoother transactions.

Regulating features of unfair business practices on web shops, price comparison platforms, and other processes such as the delivery of goods and the download of digital content are underway. The emergence of new business models in the digital economy is opening up new opportunities for e-commerce growth, but also the emergence of some that are not allowed, which will all affect the position and protection of consumers. The operations of price comparison platforms has so far confused customers because platform could follow the agreed commercial agreements between platform and goods supplier. Now any such privileged offer under such conditions will have to be clearly distinguished among others as prompt info to consumers while searching. The cost of cross-border merchandise delivery costs will be publicly announced on the official website, which will make it easier for consumers to compare the different prices of individual delivery operators and thus easier to judge the competitiveness of the offer they considering. The trader's definition will soon change under such conditions as the internet allows individual online trading with resources that is more economical and seriously competing with companies.

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ANALYSIS OF CORPORATE IDENTITY FROM THE ASPECTS OF INTERCULTURAL COMMUNICATION IN THE SPHERE OF ART

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Abstract

The purpose of this paper is to analyze and discuss the strategic positioning of corporate marketing in segment of cultural and intercultural management. The paper starts with the theory of corporate marketing, contemporary theories of brand building and cultural aspects in the field of art. The paper compares segments of culture with Balmer and Colbert's model. The behavior of employees is very important element in the expression of corporate identity. Main goal is broaden our understanding corporate branding using a model C²ITE, AC⁴ID Test and brand personality. We describe a model for managing corporate brand, cultural prototype and cultural brand. Building a recognizable corporate identity creates a desirable perception that will attract and retain talents crucial to achieving organizational goals. At the same time, the employer's image transmits to the public information on the quality of human resources management, the intent and desire of the corporation to maintain and increase the quality. The key factor in creating image in the sphere of art is the corporate identity and intercultural communication. Finally, we review corporate identity and image as key factor in building culture management.

Key words: brand, identity, culture, AC⁴ID Test, image

1. INTRODUCTION

For the last thirty years, interest has increased, both in theoretical and empirical research in the topics of corporate marketing (Aaker, 2004; Abratt, 1989; Argenti and Druckenmiller, 2004; Balmer, 1995; Balmer, 1998; Balmer and Soenen, 1999; Balmer and Gray, 2003; Balmer and Greyser, 2006; Balmer, 2012; Bick et al, 2003; Dowling, 1993; Dowling, 2004; Gotsi and Wilson, 2001; Keller and Richey, 2006; Nguyen and Leblanc, 2001; Riel and Balmer, 1997; Urde et al, 2007). The literature revealed that most models of corporate brand and corporate identity were “vision driven”(Balmer and Soenen, 1999:76). This approach to corporate identity vision has ultimately led to three key manifestations of corporate identity management: behavioral manifestations, visu-

al manifestations and verbal manifestations. All three manifestations of the corporate identity vision are shared by a positive corporate image and reputation. However, the vision driven approach is inconsistent since corporate strategy should be a key component of corporate identity.

At the same time, on the notion of culture and art, there are centuries of common interdisciplinary relationships. However, on the concept of culture and marketing, and especially from the aspect of corporate identity, there are very few common notes. The reason for this comes from the very nature of art and culture. Marketing and culture have long been excluded from the cultural sphere, although marketing in culture has become increasingly important lately. Technological development and international competition affect cultural organizations. The success of today's cultural institutions arises from a focus on consumers. It is important to emphasize the important role that culture has on society's development, although its contribution is very difficult to measure. A finished artistic, theatrical product does not serve anything if it does not realize the communication with the viewer. At the same time, a theatrical performance without the respect of the viewer has not completed the complete theatrical act.

From a production point of view, without a viewer theatrical performances represent useless resources. Art presents a personal view of society, and the work of art becomes a reflection of such a viewpoint. Dramatic elements are in essence of integrated marketing communications, although there is a stereotype that culture and marketing cannot go together. It is evident that the culture of going to the theatre appears as a result of creating cultural needs. Culture, as well as any other organization, requires adequate organization and management. In addition, corporate identity is not just a marketing area but also corporate management (Balmer and Gray, 2003; Balmer and Greyser, 2006). Identity as an organizational image represents a set of values and principles that stakeholders want to convey to everyone, including communication, employee behavior, culture and organization.

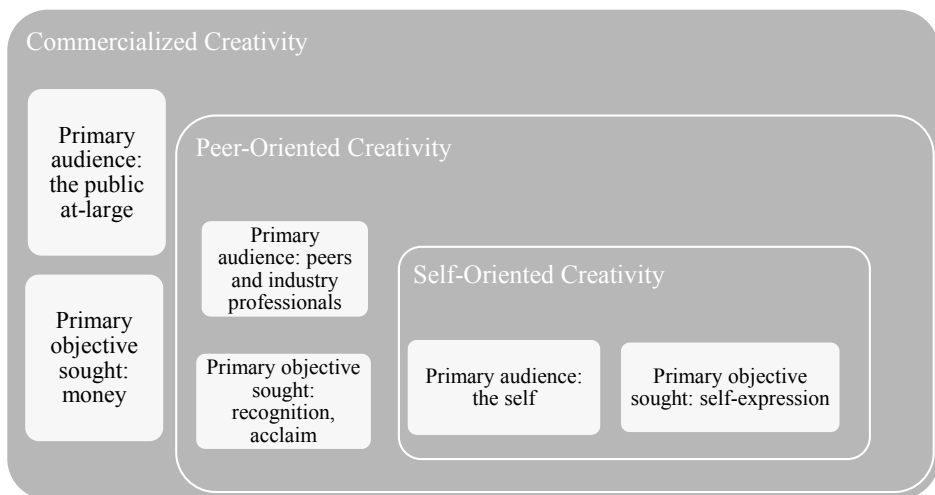
2. CULTURE AS COMMODITY

It is very difficult to define art because we enter the sphere of culture. As is well known, culture is one of the two or three most complicated words in the English language (Williams, 2015, 87). The term culture in Croatian is very versatile. It includes concepts of civilization, society, identity, and even names of school subjects. The word culture is a symptom and a solution at the same time (Eagleton, 2002:21-25). Art and culture in common symbiosis, as a consumer and market. What is Art? What is culture and how is it related to identity? Can art be goods? Is culture a brand? In order to find the answers, we must first analyze the cultural phenomenon. The best example of defining Croatian culture and art can be found at Krleža's (1933: 5-26) and especially in the famous Preface to the Podravina Motives. Podravina Motives clearly reads critically oriented and socially engaged art. This means that Krleža stands for the greatest values of the artist, the individual. Although Podravina Motives discusses many of the key issues that are crucial to determining Croatian identity in art, Krleža undoubtedly cites the foundations of today's identity culture. For Krleža (1933: 5-26) art is a certain term,

designing aesthetics. Therefore, the act of creation is the result of individual inspiration. The notion of aesthetics, i.e. art, is based on the synthesis of two components: society and artists.

Artistic expression combines creativity and skill. The artist's work is preceded by an inspiration occurring in the artist. By this act, communication between the author and the public is established. In the neuroscience sense, we find the root of art in mirror neurons (Ramachandran, 2011). With these neuron groups, consumers can experience the author's emotion. The consumer's brain is trying to put it in the position of artist to perceive art. This is very important because art is based on perception, and is closely related with the image of cultural products (Meler, 2006: 185) which is synonym for the perceived quality of the cultural brand. The Parietal lobule, essential for spatial relationships, is activated when observing the artistic image (Kawabata and Zeki, 2004: 1699-1705). Contrast is important in art. When there is no contrast, we cannot see anything. Poor contrast and design becomes neutral and too confusing (Ramachandran, 2011: 224). Mirror neurons are important in different forms of social identification, i.e. connecting consumers with the mark. The causality of artists and cultures is evident. Without the artist, there would be no cultural institutions. However, can an art and a work of art be perceived as a commodity? Yes and no. Artwork does not belong to a group of consumer goods in the classical sense of the word. It is not intended for a wide auditorium and market desires, it is created as a product of artist's worldview. On the other hand, a work of art can be a product of a particular culture and a response to demand. The art work is not ontological to the subject of creation, but depends on the culture and the public that serves as a mechanism of value and meaning. This is particularly noticeable at the time of mega culture of modern, especially postmodern (Best and Kellner, 1991: 16-20), where society is fragmented structure.

Figure 1. Segments of the art market



Source: Hirschman (1983: 49)

If we look at the relationship between artist and artwork, the finished artistic product serves nothing if it does not get the communication with the viewer. An artist creates a product that consumers accept or reject. The product is first created and then it finds the market. There are three segments of the artist as a function of creativity and its objective (Hirschman, 1983: 49). Figure 1 shows the division of the art market segments that starts with artistic creativity, the public, and the desired goal. The first market segment is the artist himself, his creativity is self-directed, and the goal is self-realization. The second segment consists of artists who are equal to the artist or are experts in the same discipline, and the aim is recognition and reputation. Finally, the third segment is an art that is facing the market that is the main product goal.

If we observe art as a commodity, a more precise cultural product, we must go from the underlying, conditional, “mistakes” to culture. Of course, this “mistake” is viewed here from the marketing aspect rather than the cultural one, that is to say, from the point of view of consumers. First of all, culture as a product, primarily starts from the service. Institutions of culture are specific to the nature of the product. In addition, cultural products are often intended for symbolic, aesthetic and hedonistic consumption. Such products are most often subjective, specific, holistic, and as already mentioned, emotionally involved. Here we are not thinking of postmodern culture (Eagleton, 2016: 38-52), although abstract painting has a major influence on liking shapes, colors and models (Kawabata and Zeki, 2004: 1699-1705). Just compare several different cultural segments like the Nutcracker opera, the painter Andy Warhol, the writer Murakami, director Scorsese or singer Cohen to see different forms of culture. As an example, let us say a theater that reveals its specificity, but in the very act of preparing to go to a play that becomes a ritual (Chytkova et al., 2016: 25-33) for the consumer.

If it is looked Figure 1, it is apparent that the first segment is the very artist whose creativity is facing himself. As Krleža (1933: 5-26) talked about identity and art, only creation is the self-realization of the work of art. When a work of art is produced as a result of creativity turned to itself, the marketing process is focused on a cultural product and thus differs from traditional marketing. Therefore, it is crucial to know the artist's institution, to find consumers who want such a cultural product. It should be noted that each institution of culture has its own brand. In order to explain the cultural brand more closely, it is necessary to include a cultural object. The cultural object is perceived as a symbolic element of the cultural tradition. Cultural products change slowly over time. The production perspective has had its critics. What is important about art, popular culture, and the other foci of the production perspective is that they provide techniques for researching the constructed nature of collective representations, values and the other aspects of culture (Peterson and Anand, 2004:327). Going to the theatre plays a symbolic value that becomes the phenomenon of a romantic symbol (Eagleton, 2002: 67) because the cultural product is offered in the form of a cultural brand experience (Acosta and Devasagayam, 2010: 165-176). Cultural objects are perceived as symbolic elements of cultural tradition, and purchasing brands represent the extension of consumer self-redemption. This is also the criticism of postmodern culture (Crook et al, 1992: 35), as there is a commodification of culture involving the transformation of products into a brand.

Modern society is entirely consumer culture. Although consumption has become a cultural process (Appadurai, 2005, Baudrillard, 1998, Baudrillard, 2017, Bordie, 1989, Douglas and Isherwood, 2005), the notion of consumer culture is a unique and specific process created in the West in modern times. Of course, when we think about consumer culture, then cultural objects (Griswold, 2013: 94) are viewed as a framework of cultural relations that starts from four relationships: social world, cultural objects, producers and receivers. In cultural terms, today's question is the question of hybridity, mixing and merging of cultural creatures. We are thus approaching the postmodern theory that goes against the limits of high and popular culture. All cultures are involved in one another, none is pure and pure, and all are hybrid heterogeneous, extraordinarily differentiated and unmonolithic (Eagleton, 2002: 15). Then the concept of culture is expanded according to the prototype culture model (Colbert, 2012: 17-19). Consumer culture is characterized by social organization in which the relationship between culture and cultural resources is merged through symbolic value into the market (Slater 2004: 7). Therefore, we can argue that the time of postmodern marketing is actually the time of the culture of a market society. Therefore, everything can become stuff. Precisely the potential for culture to become a brand, regardless of whether it is an experience, service or product, constantly puts the consumer into a cycle of consumption.

3. BRAND CULTURE VS CULTURE BRAND

The brand is not just a sign or a reputation. Abrahams states that the brand is a complex set of untouchable and touchable features that project emotional and social benefits to consumers (Abrahams, 2008: 17). The trademark is a manufacturer's guarantee in fulfilling the given promise. Specifically, the brand, conditioned, becomes a "living organism" that depends on the consumer's perception, emotion and experience (Kapferer, 2008: 12). What makes a brand a "living organism" is the brand's concept, that is, a set of touchable and untouchable values, a brand name that is an element of identity and the product itself, i.e. brand experience. The brands are successful because they meet the psychological needs that we will observe as social and emotional. When purchasing a brand, the brand is most often used by the consumer to identify the product's origin, as the consumer brand represents the fulfillment promised by the manufacturer. However, such benefits are not always achieved. It is indisputable that when there is no significant difference between the product, consumers choose the brand based on "emotional stimulation" (Temporal, 2002: 23) and not functional features. The brand represents a promise that eventually evolves into corporate reputation. By doing so, reputation becomes undoubtedly the most significant asset in modern management. An important strategic decision for each corporation is how to mark the brand (Kotler & Keller, 2008: 296): as a single name, general, or the name of a corporation.

Culture brand and brand culture, although seemingly similar and simultaneously strongly linked, are not synonyms. All brands are cultural, but there are different senses in which one can talk about "cultural brands" (O'Reilly, 2005: 582). We distinguish the concept of a cultural brand from the image aspect. Brand image results from the favorability, strength, uniqueness and types of brand associations held by the

consumer. O'Reilly shares cultural brands in three categories (O'Reilly, 2005: 582-585): cultpreneurs, commercial corporate and cultural corporates. The term cultpreneurs represents well-known artists who have adapted their marketing strategy to promoting themselves as cultural icons or brand cultures. The second group of cultural brands are commercial corporates and they are, from a sociological aspect, cult brand (Acosta and Devasagayam, 2010: 168). Finally, cultural corporates are organizations such as theaters, museums, art galleries and all organizations that incorporate culture in the wider sense of the word. Each type of cultural brand starts with a key segment of image, identity and association.

3.1. Brand culture and brand personality

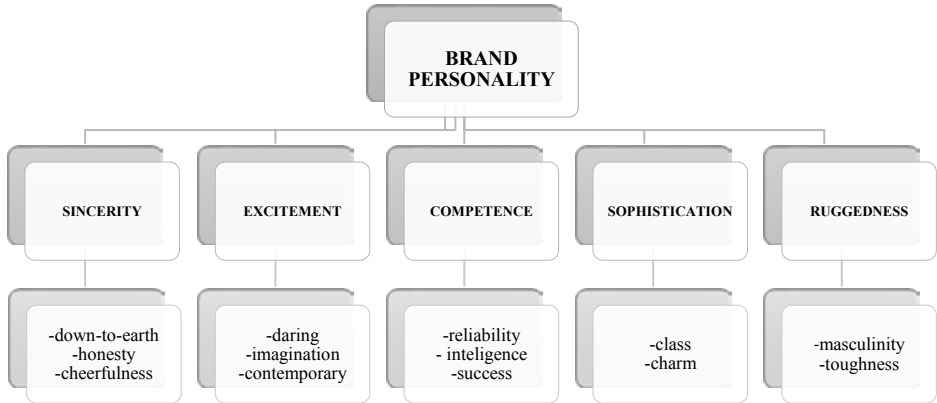
The term brand personality arises from a consumer behavioral construct according to brands, and the first time it appears in 1997. We define brand personality as a set of human characteristics associated with the brand. The brand's personality starts from the hypothesis that the consumer is perceived by the personification of human attributes. When choosing a different brand, the consumer usually chooses the brand he recognizes, and if he recognizes both brands, he chooses the one he perceives as the best. Such passive brand beliefs are based on brand image. Kapferer states that brand personality is essential in building the brand's personality prism and pointing to the role of representative who will promote the brand. However, the mark may contain different parameters that ultimately create the total consumer perception.

The brand's personality construct is understood as a form of attributing the character of the brand's human character in order to achieve distinctiveness. Such a brand dehumanization construct approaches consumer perceptions, associations and impressions by brands. The brand's personality starts from the hypothesis that the consumer is perceived by the personification of human traits. Brand personality is understood as a multidimensional construct expressed through emotional attributes of consumers, and is most often represented through five dimensions: sincerity, excitement, ability, refinement and roughness. Each dimension consists of facets that represent the character of the dimension as illustrated in Figure 2.

The brand's personality is built according to the theory of anthropomorphization (Epley, Waytz & Cacioppo, 2007: 864-886), suggesting that brands are changing according to visibility mode. Personality has proven to be useful for analyzing consumer behavior for brand choice as it reveals how consumers feel about brands. Brand personality (Aaker, 1997: 347) is defined as a set of human characteristics associated with a brand. Consumers make brand choices based on the perception they have of themselves. It is necessary to distinguish the identity from the brand image. Identity is on the side of the corporation. In the context of the communication model, it is a sender, while the brand image is on the consumer side, which is viewed here as a recipient. Identity precedes the image. Therefore, identity is understood as the desired image (message) we send to the consumer, that is, the identity is viewed as the "sender" message, and the image as the "recipient" of the message. Following this, we interpret identity as a set of all the features with which the mark represents. Imagery is the image that the mark leaves

on the consumer and is largely dependent on the elements of identity that, conditional, help to create the image in the consumer.

Figure 2. Brand Personality Dimensions



Source: Adjusted according to Aaker (1997: 347-356)

The brand image reflects the current perception of the brand and encompasses three distinct communicative features (Aaker, 1996: 180): an expanded image, enhanced and used image and a soft and widespread image. An expanded image denotes a situation where the brand identity does not match the brand image, which is most often the case in the demographic segmentation. Unlike an extended image, the enhanced and used image includes certain added associations that consumers are developing. However, the brand image itself does not need to determine the position on the market. Enhanced image improves brand personality (Aaker, 1997: 347-356). The soft and widespread image is actually the opposite of the enhanced and used image. The mix of consumer segments tells us that the brand image is not always well integrated in marketing communication. Such a move of the consumer category is actually common, as consumer trends have changed, so the brand image has to adjust. The strategy of developing brand strength begins with a clear understanding of brand identity and brand image. By creating brand strength, we must first identify strategic brand positions in the cultural industry. Imagery can be viewed as a set of brand beliefs. Such a set of beliefs is a brand image that together with brand awareness makes a set of brand knowledge. The brand image provides a mental vision of what it is and for whom it is a brand, and these visions are consumer beliefs that may vary from actual to unrealistic perceptions. The positive brand image creates strong and unique associations in the consumer's memory. The more powerful emotional impressions, i.e. the association, the stronger is the consumer's loyalty to the marks.

The brand image is closely related to associations that are so-called "carriers" of brand strength, so the associations are watched together with the image (Anderson, 1983: 19). Consumer brand beliefs can be categorized into two categories: brand attributes and brand benefits. Brand attributes represent descriptive features that character-

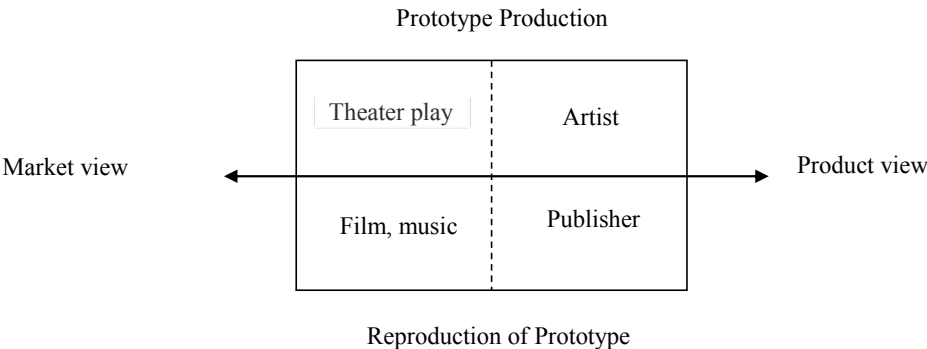
ize a product or service, and benefits indicate personal, consumer values that consumers add to brands. Therefore, the brand image must be observed in the context of trademark associations, i.e. the perception that consumers are developing. Associations are key information nodes that gives consumers meaning and can be affected.

3.2. Culture brand and cultural prototype

Art product (Colbert, 2012: 38-46) is a set of benefits that the consumer perceives. A consumer in culture does not only buy technical features of a product, but a set of real imaginary benefits. Specifically, the audience in the theater does not go to the theater just for the pleasure that the play offers but for a whole range of other features (Chytкова et al, 2016: 25-33). The same goes for book readers or music listeners who do not buy a book or CD just because of physical features but because of intellectual stimulation. Artistic product, as an archaic expression of the culture brand, is appropriate if we analyze the promotion of standard mass culture products. Cultural institutions differ in their goals, strategies and market access (Colbert, 2012: 17). The key difference is whether we are starting from an artist who creates a work in the expectation that a consumer will adapt to his product. On the other hand, from a consumer perspective, when cultural institutions are trying to respond to consumer wishes and adjust the product. Another criterion of distinction between cultural institutions is certainly a prototype model (Colbert, 2012: 17-19) that shows the way of creating an artwork.

The production of artwork consists of unique products that are not intended to be reproduced, such as artistic paintings or sculptures in museums. However, reproduction of prototypes, such as books or films, creates prototypes of culture as a product. Every piece of art is a prototype, but at the same time, the purpose of the prototype is to reproduce in multiple copies, which is specific to replicas in museums or theatrical performances. Figure 3 shows the criterion for distinguishing cultural works from the aspect of cultural organization.

Figure 3. Cultural prototype



Source: Adjusted according to Colbert (2012:17-19)

From the aspect of a cultural prototype, we first look at the original work of art reproduced, shown in Figure 3 in the upper right corner. In literature, it is a manuscript, in a museum, it is a sculpture, and in theater, it is a play or a symphony. Production or duplication can be entrusted to various art organizations, and such a distinction is made between unique products, i.e. prototype production that is not intended for serial reproduction based on prototypes. In the upper right square, we start from the artist, on the example of the mentioned Croatian writer Krleža, who speaks about identity, culture and art. His work focuses on creating a prototype of culture and is not market-oriented. On the contrary, theatrical performance in the upper left square is market-oriented and performs Krleža's plays. They depend heavily on the performances of actors, dramatists and scenes, but also their repertoire depends on consumers' interest. The lower left quadrant shows the film industry, which is also market-oriented, but with a big difference to theatrical performance because they reproduce the prototype of culture according to Krleža's plays. Finally, the lower right square shows publishers, Krleža's books, which also reproduce a prototype of culture, but they are directed to a work only.

It is important to note that there are differences within the analysis of the prototype of culture and they are not fixed. There are very frequent mixing so the publisher can point to the market of reproduction of prototypes, specifically, certain niche of literary works, music production or specialized films. The same goes for the upper left quadrant, where we have shown theatrical performances that can also be oriented to all segments, from market orientation, art, prototype or reproduction. In fact, only original, art prototypes are authentic, and the rest are models of second, third or fourth media communications between consumers. When we look at the artistic product, the culture brand, it is necessary to analyze two types of art maker (Hirschman, 1983: 46-47): artists and ideologists. Artists are defined as those who create primarily to express their subjective conceptions of beauty, emotion or some other aesthetic ideal. Artist is motivated by the need to achieve self-fulfillment via his creativity. The second type of producer is ideologist who formulates beliefs about the nature of reality and values regarding desirable states of reality. Like artists, these creators formulate ideology largely out of a need for self-expression. Ideologist view their work as intensely personal, self-revealed knowledge and derive great satisfaction from the construction of well-integrated formulations of this knowledge (Hirschman, 1983:46).

Of course, here are mixes within the manufacturer's aspects, so today we can see them as hybrid ideological, ideological and aesthetic with the two types mentioned above. This is particularly evident in moving the boundaries within art and culture. In cultural terms, today's question is the question of hybridity, mixing and merging of cultural creatures. If we accept, the metaphor of culture as a battlefield (Eagleton, 2002:67-69) then culture can be seen as dominant and popular. By the fact that popular culture should not be considered less valuable than the opposition of high culture, so called sub culture (Williams, 2015:92). Conflict between modern society, the break between classical culture and popular culture leads to postmodern marketing. Cultural turmoil takes place in three ways: between cultures as evidence of civilization, culture as postmodern and culture as identity. Such differences (Eagleton, 2002:67) between culture and culture (Williams, 2015:92) lead to postmodern marketing dominance. Let us

emphasize that marketing in culture is a component of social marketing and is a generic marketing application whose goal is to change the social behavior in favor of the target group, the consumer.

Terms such as visitors, viewers, listeners, readers are understood here as synonyms for cultural service consumers. The artistic experience (experience) starts with the service that cultural institutions offer to their visitors. Unlike physical products, services and art experiences cannot be seen, tried, felt or tested before the purchase itself. Precisely because of the inefficiency of service and experience, promotion has a particularly important role in the marketing of art. It should also be emphasized that the customer's risk is greater when buying an experience than buying a classic product that can be modified or even repaired. Another specificity of the culture brand is a large exposure to criticism. If we compare the projection of the culture prototype from Figure 2, it is apparent that direct producers create a work of art for their own artistic or ideological motifs (Hirschman, 1983: 46-47), and reproduction of a prototype is a simulation of the market of artistic and cultural needs. In other words, artists impose cultural products on the market, adapting to the cultural needs and contributing to the wider social function of culture as a whole. Art can be interpreted as a serious business (Schroeder, 2005: 1293), but only when we observe art and culture in the wider, post-modern sense, where everything is intertwined with references to popular culture. By doing so, separating culture from popular culture, it opens up to modern marketing.

All cultural enterprises share two characteristics: they represent the important role of artists and the production of creative work (Colbert, 2014: 53). The hedonic dimension of consumption is characteristic for cultural brands. It is usually related to the symbolic and emotional aspects that arise during the experience gained during consumption, since such experiences call for imagination, aesthetics and emotion with consumers. Cultural brands often require creative participation of consumers. This is very specific in the sphere of art because consumers are considered a kind of self-creator of artistic products. Consumers want to buy a creative act. Cultural products are rich in symbolic meaning that consumers use to construct, sustain, and enact identity projects (Colbert and St-Jones, 2014: 569). Consumption of cultural products is often motivated by the pleasure they provide by generating positive emotions. Therefore, it is not surprising that the painter is fascinated by his image (a prototype of a cultural brand) that an ordinary observer does not notice. From Antiquity, the notion of aesthetics has still analyzed how the beauty of an object does not only express itself to the senses.

The term *kalon* (in the wider sense of beauty) is expressed by the mind (Eco, 2004: 237). The connection between emotion and culture as well as art generally needs no particular emphasis. While, on the one hand, we understand that the aesthetically successful literary text of the product of intellectual and emotional engagement of artists, on the other hand, from literature, we expect to be "initiated" in an intellectual and emotional sense. We can argue that the emotions of theater, literature, painting and music are immanent, that is to say, art itself. As well as the conformation of the above mentioned, literary emotions (Hogan 2003a, 2003b) have become the subject of research of cognitive and evolutionary psychologists, neuroscientists, and arts, as well as other media mediating the content we spend most of their free time, trying to integrate into

contemporary cognition research programs. It is also a response to the question posed by Colbert (2014: 131) when it comes to consumers' appeal and unpleasant, sad experiences as consumers consume a cultural product, although they know that will arouse emotions, such as tragedies in the theater.

At the same time, the consumption of emotional dimension reflects more than the consumer entertainment experience. This is especially important when analyzing the symbolic value of a cultural brand. Namely, brands allow consumers to identify their desired or ideal identity and express it in front of themselves or in front of others. The relationship between the consumer and the cultural brand is an important sign of his social reputation. The social environment creates predispositions that consumer's favorite and buy for various reasons (Caldwell and Woodside, 2003: 34-50). The hedonistic dimension of spending better understands the hidden motivations that influence the choice of a cultural brand and consumer experience is in the center of the affective process. The answer to the hidden motives of consumption is found in the semiotics of brands. Since the mark is also viewed as a sign and as a symbol, as Baudrillard (1998: 31-37) suggests, we can proceed from the assumption that buying a brand is a certain social symbol for consumers, which, according to symbolic value, express consumer self-redemption. Buying a brand represents the extension of consumer self-reliance. Accordingly, consumer signs will be analyzed as brands, and in the ambient order, the signs are more important than the product itself. If we go from the hypothesis that the needs are partly inaugurated by the production system, then we can talk about the abstract spending code. The abstract code of consumption distinguishes objects as signs and not as an individual expression of need and pleasure. By such approach, not only does the consumer consume objects as signs (brands), but also relations between objects.

4. CORPORATE IDENTITY AND COMMUNICATION

Identity in psychology is an abstract, complex and dynamic concept. Identity is a reflective self-image or self-image of each person based on their cultural, family and social image (Ting-Toomey, 2005: 212). Since identity is largely a result of belonging to a group, consumers gain and develop their cultural identities through interaction with others in their cultural environment. Therefore, personal development of cultural identity is associated with the influence of school environment, social status and communication. Identity is established through communication interaction with others, it is maintained and changed through social interactions. We can conclude that the identity forms consumer expectations and motivates us to buy. During interaction with other consumers, they constantly enter and exit from different cultural identities, and with each identity, they use a series of communication behaviors that are appropriate for that identity and behavior. Thus, cultural identity is the central part of intercultural communication. Globalization of the market leads to the emergence of "intercultural travelers" (Onwumechili et al, 2003: 42). These passengers regularly change their place of residence, so they have to deal with frequent cultural changes and the need to adapt their identity.

Intercultural communication involves the interaction of people whose cultural perceptions and symbolic systems differ so much as to change the communication act.

When talking about culture within an intercultural community, we mean the dominant culture of a certain area (Samovar et al, 2007: 10). Such a dominant culture in art sets goals, transmits customs, establishes values, and makes major decisions that ultimately affect culture. Their power makes it possible to influence consumer thinking about the aspirations, needs and desires of certain cultural brands. Consumer culture, cultural objects (Griswold, 2013: 94) observes as a framework of cultural relations, i.e. as segments of culture. Status of the cultural object results from an analytic decision that we make as observers. In the context of a theater, a cultural object can be a play, an actor or a text. Accordingly, Krleža's novels can also be subjects of cultural object analysis, Scorsese's film, *Taxi Driver*, Warhol mastered images, as well as Cohen's music. Cultural objects are not simply the natural products of some social context but are produced, marketed and interpreted by variety of organizations. Cultural products change slowly over time. The production perspective has had its critics. What is important about art, popular culture, and the other foci of the production perspective is that they provide techniques for researching the constructed nature of collective representations, values and the other aspects of culture (Peterson and Anand, 2004:327).

When it comes to intercultural communication, it is important to note that the symbols in communication are arbitrary. It also means that the culture is based on symbols, and the portability of the symbol allows consumers to transmit them through prototypes (Colbert, 2012: 17-19), cultural objects (Griswold, 2013: 94) and brands (Keller et al 2008). Art is therefore cumulative and perceptive. However, although cultural symbols may appear in a variety of different shapes, one of the most important symbolic aspects of communication is the communication between the service provider and the consumer. This is very expressed in service activities such as cultural organizations. Unlike physical goods that are first produced, distributed and used afterwards, services are mainly manufactured and used at the same time. The indivisibility feature is particularly visible when it comes to art that depends on performers, such as literature, music, theater, but also in galleries, museums, since exposure to exhibits is limited by time and space. Thus, the interaction between the service provider and the consumer is a special feature of marketing in the art.

Interaction between artists and audiences implies active participation of consumers. Therefore, the consumer as a visitor of a cultural brand must be seen as an active participant who plays an important role in the overall artistic experience. Cultural organizations need to develop a clear picture that consumers perceive when it comes to experience, i.e. consumer experience. The artistic experience is characterized by variability, as it depends on those who provide services. The reputation of cultural institutions makes interaction between stakeholder's and employees over time. Ultimately, all communication in the sphere of art between employees and consumers is cultural. The way employees communicate with consumers is intercultural communication because defining it is not just a geographical, linguistic or social absence of consumers. Intercultural communication can also be between the same environments but different sub-cultures. Therefore, intercultural communication is viewed as an interactive process, which not only closely introduces consumers to the brand, but also effectively influence the corporation.

4.1. *Corporate marketing*

Corporate marketing starts with a corporate brand and identity. However, the appearance of corporate marketing occurs much earlier, but not under that name. The concept of corporate marketing as we know today (Balmer and Gray, 2003: 972-997) is not identical to the concept that emerged in the nineties of the last century (King, 1991: 43-52). The corporate brand represents a special form of corporate branding strategy where different segments of management and marketing play a very important role. Construction of a corporate brand usually implies the organizational value of corporation and added value (Urde, 2003:1017-1040). The corporate brand is a rare entity of marketing due to the unique development of the organization. Brand is an acknowledgment to a corporation that by themselves can contribute to brand development through differentiation, identity, heritage, communication and consumer relationships (Schultz et al., 2005: 9-20).

The key flaw of the “classic brand” (King, 1991: 47) is in its imitation. In order to avoid this type of imitation, the corporate brand needs to be observed multidisciplinary because its contacts are spread. It is enough to compare segments of communication, such as advertising, packaging, personification, interpersonal skills managers and mass media. The brand represents a promise that eventually evolves into the corporate reputation. By doing so, reputation becomes undoubtedly the most significant asset in modern management. Corporate reputation is the result of continuous action over time and this is the key difference between the brand name and the corporate brand. The corporate brand encompasses a wider spectrum and requires coordination of a number of elements that directly or indirectly affect the ultimate outcome. Also, a greater number of elements have a reflection on the creation of brand personality (Aaker, 1997: 347-357). The main difference between a corporate brand and a brand of product or service begins with managerial-marketing changes. The change initiator is no longer just a marketing manager but a complete management, but it is also the responsibility of all employees. This is why the corporate brand model is viewed from a holistic point of view. The focus of the corporate brand encompasses the entire organization, all internal and external factors, unlike the brand focus, which exclusively depends on consumer perception.

In order to build a corporate brand, an organization must first build a corporate culture that will encompass employee behavior. Corporate brand can be of inestimable value to an organization's human resource department. This is because an organization's corporate brand values can serve as a template against which prospective employees can be evaluated (Balmer and Gray, 2003: 986). Value as a key feature of a corporate brand is just the strength of the employee. Employees, especially in cultural activities, represent the most important segment in corporate marketing. Finding the right employees with affinity with the corporate brand suggests that corporations have multiple benefits such as brand attachment, financial strength, loyalty and reputation. There are the values that employees carry, but also to other stakeholders that may indirectly affect brand quality. Cultural brands are very specific because contact with staff, specifically, actors in the theater, concert musicians, painters in the gallery, represents a kind of brand upgrade. It is the essence of the cultural brand between consumers and prototype cultures. In order to carry out a corporate brand analysis, it is necessary to carry out a

brand reconstruction. Table 1 shows comparisons of brand and corporate brand dimensions. It is evident that the corporate brand encompasses considerably more dimensions that require coordination, because it includes a wide range of communications.

Table 1. The difference between the brand and the corporate brand

Performance	Brand	Corporate brand
Initiator	Brand manager	Chief executive
Responsibility	Marketing personnel	All personnel
Focus	Consumers	Multiple stakeholders
Values	Contrived	Real
Communications	Marketing mix	Total corporate communications
Dimension Brand alignment	Brand identity	Corporate identity
	Brand cult	Corporate culture
	Brand image	Corporate image
	Brand attachment	Stakeholders commitment

Source: Adjusted according to Balmer (2001b: 1-17)

The basic difference between a corporate brand and a brand of product or service starts with managerial-marketing changes. Personnel have a crucial role in transmitting the brand’s value and as such bring them to the heart of the corporate branding process (Balmer and Gray, 2003: 979). One of the main segments of the brand vision development is certainly in the culture of employees who believe in certain brand and manager visions that has, together with employees, knowledge of how the market functions. Dowling (1995: 377-384) introduces the term super brand, alluding to the concept of corporate reputation. Corporate identity is a symbol and a sign, in fact very similar to a trademark definition used by an organization to identify, while a corporate image, as a subordinate concept of identity, encompasses consumer beliefs and emotions, hence overall impressions. Corporate reputation represents evaluation of image that retains in consumers.

The responsibility of nonprofit organizations, galleries, theaters, museums and concerts is based on the extent of service and customer satisfaction needs. For this reason, the application of strategic marketing planning is necessary to achieve the efficiency of the exchange of services. The benefits of applying strategic marketing in cultural management are multiple: target groups are identified, user needs are identified, financial stability is ensured and quality communication is ensured between service providers. Table 2 shows the characteristics of the corporate brand C²ITE model. The model shows the characteristics of a corporate brand through five key concepts: culture, complexity, tangibility, ethereal and commitment.

Table 2. Model C²ITE

Characteristics	Performance
Culture	“cultural roots“, subculture, nationality
Intricate	integrated communication, multidimensional
Tangible	visual brand identity, consumer relations
Ethereal	style, associations, emotional impressions
Commitment	reputation, employee support

Source: Balmer (2001c: 3)

In the service sector, the brand is extremely important. Precisely because of the inefficiency of services, it is important to have a strong set of guidelines for users to distinguish between organizations. One of the most important segments is the inseparability of services because they cannot be separated from employees. This crucial influence is the backbone of intercultural communication and quality services in the arts. The artistic experience depends on employees as well as on the facts when and where the service is provided. The quality of a cultural brand often depends on the internal factors of the organization itself. The unique experience of a cultural brand not only contributes to the brand itself but to all the employees with whom the audience comes in contact. Therefore, the basic imperative of cultural creativity is precisely in the original and individual consumer experience. That is the unparalleled artistic experience, the consumer experience and the cultural brand, the key marketing benefits of culture. For cultural institutions, it is of particular importance to invest in the education and training of their employees, because this way they build the basis of a cultural brand.

It is of particular importance to monitor audience satisfaction through a system of suggestions or appeals as well as visits to exhibitions, concerts, museums and theaters. Since culture services are very specific and depend on the consumer's perception of aesthetics, education and style, some services cannot rely solely on the judgment of technical quality and even after using the service, which is very specific to the theater, galleries or museums. Therefore, Meler (2006: 174) claims that such products are subject to criticisms much more than other products. However, corporate communications can use artistic criticisms, representations and reviews just in mass communication to bring the benefits of the artwork closer. After all, cultural industries must be able to transform intangible services into concrete benefits.

4.2. Corporate identity and art

Since artistic experience or cultural experience is important for “intangible in tangible transformation” (Kotler and Keller, 2006: 405), corporations must first develop identity so that consumers may have an image of what they want. Thus, the cultural brand has two segments of consumer experience: performance and context. In particular, customer experience engineering (Carbone and Haeckel 1994: 9-19) begins with the theory that the corporation must first create a clear picture of perception of experience and create a consistent series of indications of the performance and context that will

provide them with the experience. If we compare the theatrical performance, the drama itself or the opera itself is performance, and the clothing of employees and the costumes of actors represent the concepts of context in culture are provided by employees or humanics and stuff mechanics. More precisely, there are two types of context clues. Mechanics are the sights, tastes, sounds and textures generated by things, for example, graphics, music or theater play. In contrast, humanics clues emanate from people. They are engineered by defining and choreographing the desired behavior of employees (Carbone and Haeckel 1994: 13). The best corporations know that positive employee attitudes will encourage greater consumer loyalty. Given the importance of positive attitudes among employees, service corporations such as the cultural industry have to attract the best employees. It is important to check if your employees are satisfied.

The AC⁴ID Test has its origins in earlier models of identity-alignment (Balmer, 2001a:248-291; Balmer & Gray, 2003:972-997). AC⁴ID Test approach can be of assistance to corporate marketing managers in ensuring their corporate brands remain vital and meaningful to the shareholders and stakeholders. Seven identities types comprise the corporate constellation: Actual, Communicated, Conceived, Covenanted, Cultural, Ideal and Desired corporate identity. AC⁴ID Test is a strategic, diagnostic and normative that brand identities should be calibrated (Balmer, 2012, p.1067). Sphere of art was analyzed according to the AC⁴ID Test in Table 3. As is apparent, the AC⁴ID Test is based on the model set by Balmer (2012: 1064-1092). It shows the analysis of the cultural brand in the field of art, starting from the current identity, which is a classic positioning with all the specifics of the cultural industry, and ends with the desired identity that here is the very essence of art, i.e. corporate brand vision.

Table 3. AC⁴ID Test of culture brand in sphere of art

Identity type	Culture brand	Construct cultural management
Actual	Art	Corporate identity
Communicated	Reputation	Corporate brand communication
Conceived	Image	Corporate image
Covenanted	Education	Corporate brand
Cultural	Employee quality	Corporate culture
Ideal	Efficiency	Corporate brand strategy
Desired	Pure art	Corporate brand vision

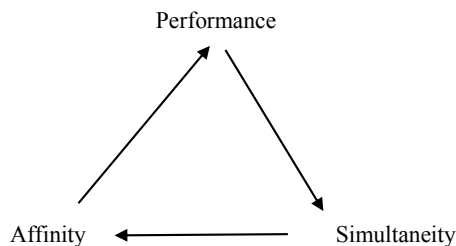
Source: author's

The first identity is current and represents a realistic positioning type that includes internal values, employee behavior and activities. In the context of a brand of culture, art itself includes the service and service provider. From the aspect of corporate management, this is a corporate identity. The communicated identity encompasses corporate image, corporate reputation and overall corporate communication. It is about a reputation of an institution that includes exhibits, repertory theaters and employees. Conceived embraces the way the brand sees, that is, the role of image and identification. This means that from the aspect of the cultural brand is the consumer's perception, impression and corporate brand impressions (Balmer, 2012: 1064-1092). This segment is

very sensitive to art criticism and creating positive brand images. Covenanted embraces the brand in the widest sense, it represents the promise that the brand fulfills. Here we think of the very essence of the brand (Keller et al, 2008: 63-65). Cultural identity is not the same as the cultural mark, but represents the role of employees, their behavior, beliefs and values. A key strategic and marketing segment is extremely important for creating internal and external impressions of the corporate culture brand of the institution. The role of employees is one of the most important in the sphere of art because employees are in the first contact with consumers. It also depends on the two types of context clues (Carbone and Haeckel 1994: 9-19). The desired identity involves the management and corporate mission of the organization. Finally, the ideal identity points to the optimal, ideal positioning strategy. From the aspect of the culture brand, it starts from the very essence of art as an educational and entertainment component to the desired art that makes art in the full sense of the word.

Since corporate identity is a means of projecting public corporation's image, we can conclude that identity is at the same time the articulation of employees. In this context, identity refers to individuality as a means by which we can distinguish one corporation from another. Therefore, the corporation is an articulation because it communicates with stakeholders at all levels, showing what and how the corporation works as well as the business strategies it applies. The basic question is whether a corporate image is being created from the very beginning or changing an existing image. Evidently, identity is preceded by an image. Tools and methods in both cases are completely different, but always start from the identity. Image as such, is an impression of an identity-based corporation. Based on corporate image, its business and services are valued. Image is created based on real and psychological components, i.e. on rational and emotional impressions of consumers. Both components of the image are influenced by intercultural communication. Image created once is not real and it is changing. At the same time, associations and perceptions of employees who create a cultural organization often directly affect the perception of quality. Figure 4 shows a corporate art identity blueprint that links the affinity and employee performance and service timeliness.

Figure 4. Corporate Art Identity Blueprint



Source: author's

All three sides are related and reflected to one another. Employee affinity represents corporate culture i.e. their communication skills, as employees are brand builders. The first image of the corporation is formed during the interaction with employees

so we can determine that they are an essential element of each organization (Balmer, 2001c: 3). Then they follow employee performance, which reflects the perception of the quality of the service. The technological intensity of the service here is exclusively on the service provider itself, i.e. cultural brands. Investing in service staff directly invests in the improvement, not just the image, but also the brand itself. Finally, coincidence implies employee behavior towards the cultural brand, but also the reputation of the corporation. It is a *punctum temporalis* (Merleau-Ponty, 2012) that is reflected in the process of viewing and in the way of seeing employees as part of the identity of the corporate cultural brand. The first part refers to the nonlinearity of the view is ultimately reflected as loyalty to the organization, or reputation, and the second part refers to the nonlinearity of the structure seen, that is, to the corporate identity. Here, the context of simultaneity mostly refers to a corporate identity that is not durable as the corporate image is not lasting, but are subject to constant changes. After all, corporate reputation has no reputation at any point in time. It has several simultaneous reputations, depending on the stakeholders. The same applies to employees because they depend on a series of variables (Kotler and Keller, 2006) as the same applies to the consumer's perception of brand image (Keller et al, 2008:42-81), but also the brand personality construct (Aaker, 1997: 347).

5. CONCLUSION

The problem of defining art will remain debatable for a long time, since it has always been a question of culture from any aspect of the artwork. So the main ontological question is: What is art? More precisely, what makes a work of art? Since the work of art enriches human culture, the question that is implied and which they say is one of the most difficult (Williams, 2015, 87) would refer to the definition of culture. Also, culture is closely related to the legacy and identity of society, and from that aspect, every society can analyze cultural components. An example of such a point of view is found in the period of modern art where the culture and art precisely defines precisely the individual values of the artist itself. The act of creating art is the result of the synthesis of the artist and artist who create a work of art.

Cultural products are often intended for symbolic, aesthetic and hedonistic consumption. Such products are subjective, specific and emotionally involved. When a work of art is produced, marketing processes are focused on a cultural product. The cultural object (Griswold, 2013: 94) is perceived as a symbolic element of the cultural tradition and it is gradually changing over time. By doing so, going to a concert, ballet, theater play, picture gallery or museum, makes the symbolic value of a cultural product. Buying such cultural brands is an extension of consumer self-reliance. In cultural terms, nowadays it becomes the merging of cultural creatures. Then the concept of culture is expanded according to the prototype culture model (Colbert, 2012: 17-19). Consumer culture is characterized by social organization in which the relationship between cultural resources merges with symbolic values in the market.

Since the brand is a complex set of untouchable and touchable features that project consumer impressions, emphasis is placed on the role of employees. Intercultural

communication of employees, looking from the aspect of customers who are not fully acquainted with cultural, aesthetic and artistic characteristics, is the essence of corporate marketing in culture. Consumer culture, cultural objects viewed as a kind of model of cultural relationships that are nurtured just in communication with employees. Employees and their interaction between service providers and consumers can be seen through the artists themselves. Interaction between artists and audiences implies active participation of consumers and therefore we are looking at them as active builders of artistic and cultural experience.

Employees are builders of cultural brands, builders of corporate identity and ultimately, they are creators of the image of the cultural brand. Value, as a key feature of a corporate brand, is just the strength of the employee. Corporations with loyal employees, who have the same corporate brand affinity, indicate that the corporation has multiple benefits. These are the values that employees transfer to themselves, to the corporation, to reflect identity and to create a positive image. Cultural brands are very specific because contact with staff is of crucial importance, especially in theaters, museums and galleries. Personnel have a key role in reducing the brand value (Balmer and Gray, 2003: 979). They represent the heart of the corporate branding process. Investing in service staff is directly invested in improving, not only the image, but also the brand itself. In addition, Corporate Art Identity Blueprint represents the causal relationship between the three sides of employees, their communication, beliefs, and behavior that brings to the image. With the existence of a cultural image, we open the way to cultural brands.

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TRANSPORTATION AND LOGISTICS

VEHICLE ROUTING PROBLEM AND ITS PRACTICAL APPLICATION IN TRADE COMPANIES

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Abstract

The main aim of this paper is to investigate the logistic system of a trading company with special emphasis on the external transport subsystem, i.e. solving the vehicle routing problems on the distribution network. Vehicle routing is one of the most important operating decisions to be made by trading company managers. The problem is how to determine the best way for a vehicle to serve a large number of customers at different locations, minimizing distance, time or travel costs. Computer-supported model as well as savings matrix method are used to solve vehicle routing problem. The obtained results could help trading companies and managers at all levels as a basis for costs minimization as well as eliminating service failures.

Key words: transport, distribution, vehicle routing problem, computer-supported model

1. INTRODUCTION

The success of every trading company is closely related to efficient transport. Nevertheless every transport decision should also be made having in mind other elements of the logistics system of the trading company, especially inventory and customer requirements. The dependence of trade companies on transport is becoming even more pronounced by the development of *e-commerce*. Therefore this paper deals with the problem of routing the vehicle on the distribution network of a trading company that uses its own distribution warehouse to supply small retail facilities in several different cities. It is an important issue in the fields of transportation, distribution and logistics. The literature on vehicle routing problems has become very rich and covers nowadays a variety of applications, modeling approaches and solution methods (Toth & Vigo, 2014). Due to their huge importance in practice, these problems have called the attention of many researchers and motivated a large number of collaborations between companies and academia (Golden, Raghavan and Wasil, 2008). The objective of most routing and scheduling problems is to minimize the total cost of providing the service. This includes vehicle capital costs, mileage, and personnel costs.

Calculation and insight in more optimal routes can significantly impact on reducing transport costs, as well as creating greater opportunities for a trading company by considering more flexible shaping of the merchandise flow structure, greater utilization of transport capacities, and thus achieving higher profits. A key factor in the planning of optimal routes is the use of relevant IT technologies and computer applications that allow the calculation of the optimal connection between the nodes (cities) and the distribution of transport relations (Pupavac, Vukmirović, Drašković, 2013). Based on experience in Europe and North America, it can be estimated that by introducing planning of distribution processes with the use of computer savings of 5 % to 20 % of total transport costs have been achieved (Carić, 2004). Due to the high complexity of these problems, we are focused on the development of computer supported model in MS Excel to solve them. The proposed model was to test two practical examples and show capability to provide good solutions to complex vehicle routing problems in real life.

2. THEORETICAL BACKGROUND AND LITERATURE REVIEW

According to Ehrmann (2003, 461), the main decisions in logistical distribution management would be: 1) **On a strategic level:** a) Determining distribution channels, b) Deciding on appointing a representative or a passenger, c) Determining a warehouse location, d) Decision about personal or outsourced transport; e) Considerations to “produce or buy”; f) Decision on the minimum order quantity; 2) **On operational level:** a) The form of execution of the order, b) Decision on merchandise transport and route planning, c) Logistics of spare parts.

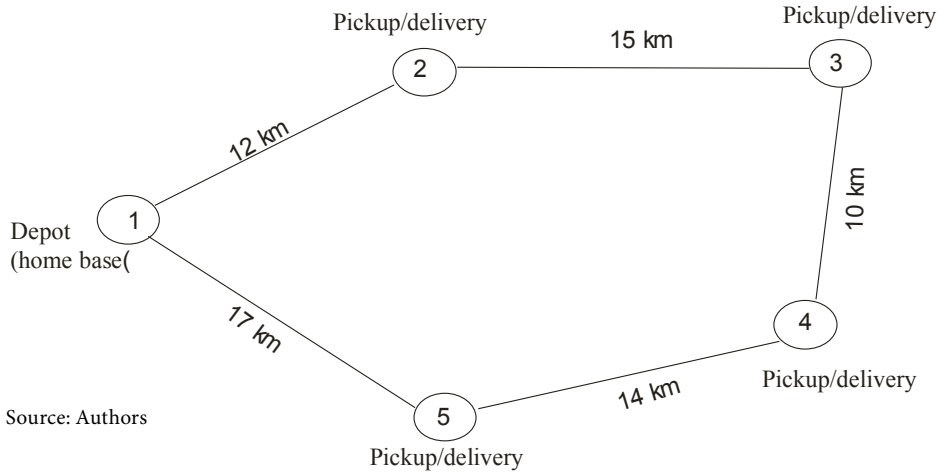
The focus of research in this paper will be on operational level decisions, i.e. decision-making on merchandise transport and route planning. Companies that deliver their products to a larger number of customers or warehouses need to plan travel tours. Every company has a plan of delivery of goods, each day delivering certain quantities of goods to a particular buyer while complying with the capacity of the delivery vehicle. Timetable planning of tours may be: 1) for daily tours and 2) for standard tours. According to Segetlija (2013; 274), when planning daily tours there are orders for a daily tour, that are scheduled the previous evening or at the beginning of the next day, while planning a standard tour can be carried out at larger intervals.

The vehicle routing problem dates back to the end of the fifties of the last century. VRP was proposed by Dantzig and Ramser in 1959. Dantzig and Ramser (1959) described VRP problem as follows: *a number of identical vehicles with a given capacity are located at a central depot. They are available for servicing a set of customer orders, (all deliveries, or, alternatively, all pickups). Each customer order has a specific location and size. Travel costs between all locations are given. The goal is to design a leastcost set of routes for the vehicles in such a way that all customers are visited once and vehicle capacities are adhered to.*

Routing and scheduling problems are often presented as graphical networks (Pašagić, 2003). If the customers being serviced have no time restrictions and no precedence relationships exist, then the problem is a pure routing problem. If there is a

specified time for the service to take place, then a scheduling problem exists. The use of networks to describe these problems has the advantage of allowing the decision maker to visualize the problem under consideration. As an example, refer to Figure 1.

Figure 1. Routing network example



The figure 1 consists of five circles called nodes. Four of the nodes (nodes 2 through 5) represent pickup and/or delivery points, and a fifth (node 1) represents a depot node, from which the vehicle's trip originates and ends. The depot node is the "home base" for the vehicle or provider. Connecting these nodes are line segments referred to as arcs. Arcs describe the time, cost, or distance required to travel from one node to another. Arcs may be directed or undirected. Undirected arcs are represented by simple line segments. Directed arcs are indicated by arrows. The small network in Figure 1 can be viewed as a route for a single vehicle. The route for the vehicle, also called a tour, is $1 \rightarrow 2 \rightarrow 3 \rightarrow 4 \rightarrow 5 \rightarrow 1$ or, because the arcs are undirected, $1 \rightarrow 5 \rightarrow 4 \rightarrow 3 \rightarrow 2 \rightarrow 1$. The total distance for either tour is 68 km.

The tour described in Figure 1 is a solution to a simple routing problem where the objective is to find the route that minimizes cost or any other criterion that may be appropriate (such as distance or travel time). The minimum-cost solution, however, is subject to the tour being feasible. Feasibility depends on the type of problem, but, in general, implies that (Heizer & Render, 2004): 1) A tour must include all nodes. 2) A node must be visited only once. 3) A tour must begin and end at a depot. The output of all routing and scheduling systems is essentially the same. That is, for each vehicle or provider, a route and/or a schedule is provided. Generally, the route specifies the sequence in which the nodes (or arcs) are to be visited, and a schedule identifies when each node is to be visited.

The classification of routing and scheduling problems depends on certain characteristics of the service delivery system, such as size of the delivery fleet, where the fleet

is housed, capacities of the vehicles, and routing and scheduling objectives (Heizer & Render, 2004). One of the earliest and also the simplest routing problem is the Traveling Salesman Problem (TSP), in which the shortest tour to visit a number of cities must be determined for a salesman who starts from and terminates at the same city. This problem was later extended to the Multiple Traveling Salesman Problem (mTSP), in which there are multiple salesmen and they all start at and return to the same city, which is referred to as the depot (Wen, 2010). If we now restrict the capacity of the multiple vehicles and couple with it the possibility of having varying demands at each node, the problem is classified as a vehicle routing problem (VRP). Alternatively, if the demand for the service occurs on the arcs, rather than at the nodes, or if demand is so high that individual demand nodes become too numerous to specify, we have a Chinese postman problem (CRP).

Another important issue in routing and scheduling involves the practical aspects of solving these types of problems. Let's, for example, consider the delivery of pallets of goods from a distribution warehouse to retail stores in a geographic area. The retail stores have different demands and the vehicles have different capacities. Each vehicle is assigned a route beginning and ending at the distribution warehouse (the depot). For a delivery with only 8 retail stores points there are 2^8 or 256 possible routings. For 13 retail stores points, there are 8192 possible routings.

3. COMPUTER SUPPORTED MODEL IN FUNCTION OF OPTIMIZING DISTRIBUTION OF A TRADING COMPANY

The computer-supported model presented in this paper is based on the application of the methods of distance savings. In order to understand the application of this method, let us assume that the trading company from the distribution warehouse supplies two retail facilities located in the place P and Q.

Distances DS-P, DS-Q and P-Q will be marked with x , y , and z . If it is assumed that the delivery at these two locations is carried out with two delivery vehicles then the distance covered by these two vehicles in a single delivery $2x + 2y$. However, if only one vehicle is used then it is possible to have a circular travel that links P and Q so that the total distance $x + y + z$. Now it can be easily noticed that savings in distance have been achieved by using only one vehicle, equals $(2x + 2y) - (x + y + z)$.

More generally, the savings formula can be formulated as follows:

$$S_{ij} = d_{wi} + d_{wj} - d_{ij} \quad (1)$$

where:

S_{ij} – the value of savings in distances by linking the delivery point x and y

d_{wi} – distance between warehouse w and delivery point i

d_{wj} – distance between warehouse w and delivery point j

d_{ij} – distance between delivery point i and j .

In order to calculate the savings matrix, it is first necessary to determine the distance matrix based on the location of the individual delivery sites, i.e. customers (see Table 1).

Table 1. A computer-supported routing model of a vehicle on a distribution network

	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X
1	Customer	x	y	Demand	Distance	1	2	3	4	5	6	7	8	9	10	11	12	13						
2	1	0	12	48	0	12	8	17	15	15	20	17	8	6	16	21	11	15						
3	2	6	5	36	1	0	9	8	9	17	23	22	17	18	23	28	22	27						
4	3	7	15	43	2		0	10	8	9	15	13	9	12	14	18	14	20						
5	4	9	12	92	3			0	4	14	20	20	19	22	22	26	24	30						
6	5	15	3	57	4				0	11	16	16	16	20	19	22	21	28						
7	6	20	0	16	5					0	6	5	11	17	9	11	14	22						
8	7	17	-2	56	6						0	4	14	20	8	7	16	23						
9	8	7	-4	30	7							0	10	16	4	6	12	20						
10	9	1	-8	57	8								0	6	8	13	5	12						
11	10	15	-6	47	9									0	14	19	7	9						
12	11	20	-7	91	10										0	5	9	16						
13	12	7	-9	55	11											0	13	20						
14	13	2	-15	38	12												0	8						
15	Total demand				666													0						
16	Car capacity				200																			
17	Delivery schedule using saving matrix mode																							
18	S12=	11																						
19	S13=	21	S23=	14																				
20	S14=	18	S24=	15	S34=	28																		
21	S15=	10	S25=	14	S35=	17	S45=	19																
22	S16=	9	S26=	13	S36=	17	S46=	19	S56=	29														
23	S17=	7	S27=	12	S37=	14	S47=	16	S57=	27	S67=	34												
24	S18=	3	S28=	7	S38=	6	S48=	7	S58=	13	S68=	14	S78=	15										
25	S19=	0	S29=	2	S39=	1	S49=	1	S59=	5	S69=	6	S79=	7	S89=	8								
26	S110=	5	S210=	10	S310=	10	S410=	12	S510=	22	S610=	26	S710=	29	S810=	16	S910=	8						
27	S111=	6	S211=	11	S311=	12	S411=	14	S511=	25	S611=	34	S711=	32	S811=	16	S911=	8	S1011=	32				
28	S112=	1	S212=	5	S312=	4	S412=	5	S512=	12	S612=	16	S712=	16	S812=	14	S912=	11	S1012=	19	S1112=	19		
29	S113=	0	S213=	3	S313=	1	S413=	2	S513=	8	S613=	12	S713=	12	S813=	11	S913=	12	S1013=	15	S1113=	17	S1213=	19

Source: Authors made a modification of: Chopra, S., Meindl, P.(2001). Supply Chain Management, Prentice Hall, New Jersey, p.285-287.

The distance matrix between two locations is determined using the following formula

$$\text{Dist}(A,B)=\sqrt{(X_A - X_B)^2 + (Y_A - Y_B)^2} \quad (2)$$

Formula (2) is glued to the address string G2: S14 and thus the distance between each position are obtained.

The savings matrix for each possible link is calculated according to the formula

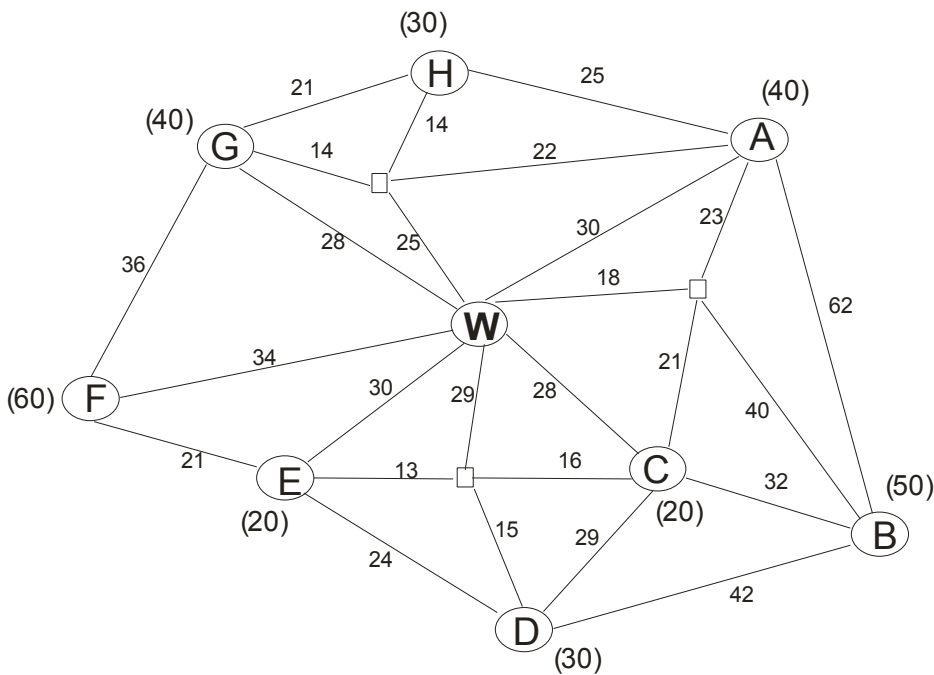
$$S(x,y)=\text{Dist}(DC,x)+\text{Dist}(DC,y)-\text{Dist}(x,y) \quad (3)$$

Formula (3) is glued to the address string A18: X29 and a savings list is provided for each possible link. After that, those links that offer the biggest savings on the route

are selected, in this example it is the connection 6-11 that saves 34 km. This link is possible because the number of researched units is $16 + 91 = 107$ lower than the capacity of the truck, which is 200 units. After that into consideration is taken the possibility of adding the following link with the greatest savings in this case 7-11 (also 34). The link is feasible because buyer 7 requires 56 units ($16 + 91 + 56 = 163 < 200$) and buyer 7 is added to route 6. Continuing the iterative procedure buyers are grouped into four groups [1, 3, and 4], [2, 9], [6, 7, 8, and 11], [5, 10, 12, and 13] which are attached specifically to each vehicle as shown in address line H17: L20. The evaluation of the efficiency of the solution obtained can be given in relation to the degree of utilization of the truck fleet capacity ($666/800 = 0.8325$ or 83.25 %).

The application of the proposed model will be tested in another example from the literature (Zlatković & Barac, 1994). The assumption is that it is necessary to supply from the distribution warehouse (S) eight small retail objects, marked with A to H (cf. figure 2).

Figure 2. Problem of selecting tours



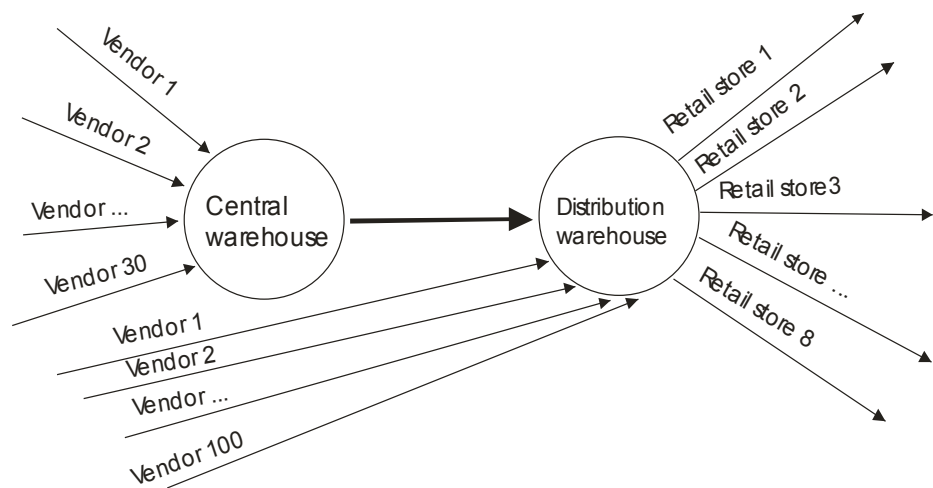
Source: Authors made a modification of: Zlatković, Ž., Barac, N. (1994). Poslovna logistika, Prosveta, Niš, p. 140.

The daily demand for small retail objects (which are in the computer model instead of letters A to H, numbered from 1 to 8 is from (20) to (60) units. For example, the demand for a small retail object F or a computer model of a retail object number 6

operating costs; 2) performance of the process - quality, duration, costs per activity. The distribution system in space is manifested as a distribution network, whereby goods flow between physical entities for distribution. The distribution network consists of: 1) manufacturing enterprises, 2) trade enterprises and 3) commercial service providers (Šamanović, 2009: 142).

The distribution network of the observed trading company which is the subject of the analysis in this scientific paper is shown in Figure 3.

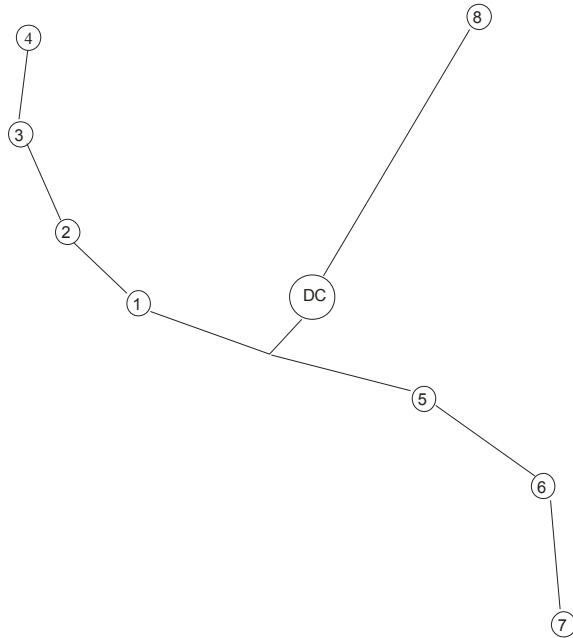
Figure 3. Distribution network of trading company „X“



Source: Authors

The distribution network is the bearer of logistics costs. The level of logistical costs depends on the degree of consolidation: procurement process, stock, internal logistics and distribution. A particular influence on the level of logistic cost is the number of logistic places on the distribution network (Dunković, 2010). Based on Figure 3 it is apparent that part of the goods is supplied through the central warehouse. From the central warehouse, goods from 30 different suppliers are distributed to the distribution warehouse, while a hundred suppliers directly deliver the goods to the distribution warehouse. From the central warehouse to the distribution center, 25 pallets of goods are delivered weekly. And the rest of the demanded goods are delivered by suppliers directly to the distribution center. The goods are then delivered from the distribution warehouse through the driver to the retail facilities located in eight places (see Figure 4).

Figure 4. An example of a network for routing a vehicle for a monitored trading company



Source: Authors

Delivery dynamics depends on the spatial capacities of small retail outlets and the speed of product consumption. The merchant company for the distribution of goods to retail outlets has a single load capacity of 10.6 tons, a loading capacity of 15 euro pallets and a single van with a capacity of 1.5 tons. The van is usually used to conduct delivery of white technical appliances to small retail customers. Weekly demand in places 1-2-3-4 amounts to 25-30 pallets, at places 5-6-7 it amounts 20 to 25 pallets and in the place 8 it amounts from 18 to 20 pallets. Routes of delivery have been formed in accordance with specific geographic positions that are served. Weekly demand is met in a way that every place must be visited twice within a week. Specifically, Monday, the driver delivers the goods to places 1-2-3-4, Tuesdays at places 4-5-6 and Wednesdays to place 8. On Thursday to the same places as on Mondays. Friday's deliveries are selected to the same places as on Tuesdays and Saturdays as well as Wednesdays. The capacity utilization rate of a truck company runs between 70 and 83.3 percent.

5. CONCLUSION

Main decisions in logistics management can be observed at a strategic and operational level. The focus of research in this paper is on operational level decisions, i.e. vehicle routing problem. Accordingly, a computer-supported model in MS Excel was developed in the function of optimum route planning. The computer supported model proposed in this paper is general and can be applied to practical routing problems

arising in many distribution companies. The model was tested on several practical examples, and the solutions obtained were evaluated in relation to the utilization of their own vehicle fleet and the number of kilometers travelled. Application of this methodological approach guarantees results very close to the optimal solution, not necessarily an optimal one. However, such solutions are quite acceptable and can be of great help in business practice of trade companies. The model can be of great use in optimizing distribution especially in small and medium-size trading companies. This conclusion is very well supported by the fact that specific geographic location of retail stores in relation to the distribution warehouse does not necessarily require a complex solving algorithm. Future research should be focused on more complex problems that involve practical constraints arising from real life.

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ROAD FREIGHT MARKET IN THE EUROPEAN UNION

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Abstract

Road transport has crucial role all around world whether it is about passenger or freight transport. As freight transport has higher share, in this paper it will be analysed only that segment of transport. Road transport has crucial role in market integration and it ensures that products are delivered to final destination. It is vital for economy, welfare, trade and tourism. Even though it provides a lot of advantages, there are some negative characteristics such as high empty run ratio, negative impact on environment and inadequate value of average loading weight, which will be analysed in the paper. Due to all mentioned above, the aim of this paper is to analyse road freight market in the European Union to reflect its importance for development of Member economies and for effective functioning of industrial sectors.

Keywords: empty runs, European Union, road freight transport, traffic

1. INTRODUCTION

If it is only to observe transport by land, in most countries, the leading role occupies the road transport. Road transportation dominates freight operations all around the world (Tob-Ogu et al., 2018). In all European Union countries, not only Croatia, the transport of freight by land plays an important role in almost all economic activities, especially those crucial for infrastructural and socio-economic welfare. Usage of road freight transport ensures delivery of products to consumers (Engström, 2016). A well-established road infrastructure is one of the key prerequisites of economic growth, and road transport is seen as crucial for the development of any society (Ivanova and Masarova, 2013: 263). The importance of road transport to every economic system lies within its essential role in connecting production and final consumers. Nevertheless, it is important to note that road transport, besides common benefit to society, also implies certain costs regarding pollution.

Due to crucial role that road transport plays in the freight transport, the aim of this paper is to analyse road freight market in the European Union. The paper is divided into four chapters. After the introduction, in the second chapter the importance of road transport in the economic development is analysed. Main characteristics of road freight market in the European Union will be presented in the third chapter. As the impact of road transport on society and environment cannot be ignored, negative impact of road

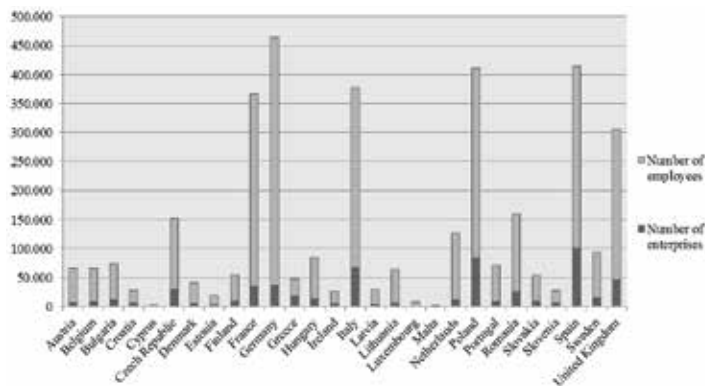
freight transport on environment will also be addressed within the third chapter. Conclusions are presented in the fourth chapter.

2. THE IMPORTANCE OF ROAD TRANSPORT IN ECONOMIC DEVELOPMENT

The traffic system directly contributes to the activation of all economic potentials in a country, and it is becoming a prerequisite of the successful economic growth. Road infrastructure is the key sector and an influential factor in gross domestic product and employment (European Union Road Federation, 2013). Road transport plays an important role in all economic activities, especially those crucial for the infrastructure and socio-economic welfare. It is an important economic component which influences the entire growth and benefits the population (Khan, 2013). Transport development implies the development of other industries and commerce. Transport is essential for economic life of any community, and its role has been long growing and recognized in the modern world. Entire industries rely on transport, where raw materials or finished products are easily sent from one point to another (Fenelon, 2017: 10).

Road industry represents an extremely important sector in the European Union. In road freight transport industry alone, there are 3.07 million employees, without taking into account those working in vehicle production, insurance, services, road building and maintenance and traffic control. Those employees are divided among 571.046 enterprises that are registered for road freight transport (European Commission, 2018). Most of those companies provide this service as their main business activity (European Commission DG for Mobility and Transport, 2017: 8). Chart 1 shows that Germany, with 427.100 employed, is the leading country in employing workers in the road freight transport industry. Road transport has a leading role in almost all EU members if the modal split of freight transport on land is observed. In 2016, the average share of road freight transport for EU-28 was 72.8%. On the individual level, the lowest share (21.8%) was in Latvia, while in Cyprus and Malta the share was equal to 100%. In Croatia, road transport also has crucial role in freight transport, so, in 2016, its share was 65.6%.

Chart 1. Number of employees and enterprises in the road freight transport industry in the EU members in 2015

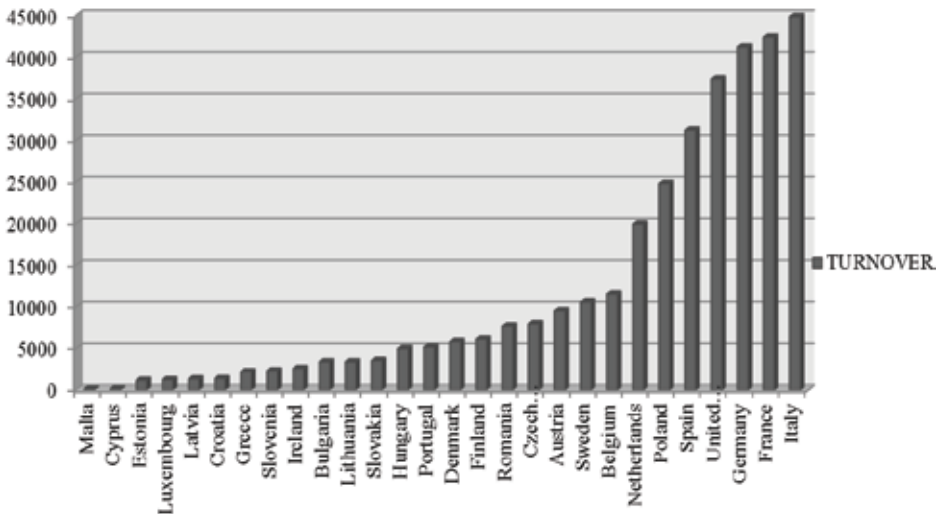


Source: compiled by the author based on the data from European Commission (2018). *EU transport figures. Statistical pocketbook 2018*, Luxembourg: Publications Office of the European Union, p. 24-25.

The main purpose of the trade development is creating wealth, reducing poverty and maintaining growth. All types of transports are crucial here, but the road transport has the most direct influence on poverty, for it employs millions of people and generates a significant portion of the gross domestic product, especially in the underdeveloped and developing countries. In the globalized economy, road freight transport has a key role in production and distribution of goods, and in encouraging economic, social and ecological progress. In short, road freight transport is the backbone of the economy worldwide (Londoño-Kent, 2009). It enables the delivery of goods throughout Europe quickly and efficiently (European Commission, 2012).

Road transport is a vital economic sector which generates approximately 2% of the gross domestic production of the European Union (European Commission, 2015). The importance of road transport is also reflected in the value of its total turnover, which, in 2015, equalled 334 billion of Euros in the EU-28. Road freight transport had a share of 22.40% in turnover of all transport modes, while the higher share (35.70%) was only achieved by the warehousing activities. In Chart 2, it can be seen that Croatia, with the turnover of just 1,373 million of Euros is almost at the very bottom, if compared to other Members based on the total income in the road freight transport industry. The highest turnover in this industry in the last few years belongs to Italy, which had the turnover of 44.862 million of Euros in 2015.

Chart 2. Turnover in road freight transport industry in the EU members in 2015 (mil. €)



Source: author compiled according to the data from European Commission (2018). *EU*

Source: compiled by the author based on the data from European Commission (2018). *EU transport figures. Statistical pocketbook 2018*, Luxembourg: Publications Office of the European Union, p. 26.

A well-established road network is an important precondition for economic growth (Demurger, 2001). Road freight transport in urban areas is crucial for the devel-

opment of society (Bouhours and Basbas, 2012). The value of road transport is best seen in its contribution to the gross domestic product and employment (Sulaiman, 1997). The share of railway transport has been declining over the last thirty years on behalf of road transport. This is the case in most countries in Europe and Asia – road transport is dominant in the transportation of goods (Santos, Behrendt and Teytelboym, 2010).

Most countries consider traffic as a vital activity of general social interest, for traffic, and especially its infrastructure, form a physical basis of society and it is also a prerequisite for its development. For this reason, government wants to keep as much control as possible over the development of traffic, which is evident through (Padjen, 1996):

1. Administrative regulation of certain traffic branches;
2. Government measures for encouraging growth and development of traffic branches;
3. Investments and operation monitoring;
4. Taxation of certain transport vehicles and
5. Different forms of regulations which protect public interests.

Boylaud and Nicoletti (2001: 231) have remarked that road freight transport is the key sector in almost all world economies and that it plays a crucial role in market integration. Road freight transport occupies a unique socio-economic position by connecting supply and demand and many industrial sectors. As a type of transport which delivers the most goods to their final destination, it is vital for tourism, trade and any economy's welfare (Londoño-Kent, 2009). Exactly for this reason, road infrastructure is being used more and more and there is often the case of traffic congestion. In order to prevent this, the use of intelligent transport systems, i. e. control with informational and communicational system upgrade of the classical traffic system, should be applied. The use of transport systems shortens the duration of the transporting process and thereby reduces negative environmental influence (European Commission, 2011).

The impact of road transport on society and environment cannot be discarded or ignored. We can differentiate direct and indirect influences of the road transport on economy. Direct influences relate to the availability of changes with which traffic provides a simple access to larger markets within a short period of time. Thus, seen in ways of time and money, it ensures advantage. Indirect influences can be connected with the fluctuation of prices of goods and services (Khan, 2013). Investing in road infrastructure is the key element of the economic growth in the developing countries (Santos, Behrendt and Teytelboym, 2010).

3. CHARACTERISTICS OF ROAD FREIGHT MARKET IN THE EUROPEAN UNION

Road freight industry includes transportation of freight between companies and between companies and consumers (Boylaud and Nicoletti, 2001: 230). When freight

transportation by the mode of transport in EU-28 is observed, it can be seen that road transport plays the leading role. Table 1 shows that in 2016, of the total 3,661 billion of tonne kilometres¹, 1,804 billion of tkm have been transported by road, equalling 49.27%. Its role is even more dominant if sea transportation is excluded; then, it increases to 72.8%.

Engström (2016) implies that road transportation constitutes a fundamental part of transportation system, be it passenger or freight transport. Importance of road transportation is very high as road transportation is involved in almost all freight transportations that are a part of door-to-door freight chains. The significance of this industry has been increasing in the last four decades. Its importance is best reflected in the fact that in 2016, in the EU-28, road freight transport had the output of 1,804 billion of tonne-kilometres (European Commission, 2018). The major part of this is transported by companies that offer road haulage services for hire and reward. In 2015, just 14% of all tonne-kilometres have been transported by companies that were carrying their own goods. Situation is different if observed on the individual level by a Member State. For example, in Luxembourg, Cyprus and Greece more than a third of all tonne-km has been transported by the own-account transporters. Just 6% of the total tonne kilometres have been transported by the own-account companies in Estonia, Latvia, Lithuania, Spain and Slovakia (European Commission DG for Mobility and Transport, 2017: 7).

Table 1. Freight transport in EU-28 by mode of transport, 2010-2016 (billion tkm)

	Road	Railway	Inland waterways	Pipelines	Sea	Air	TOTAL
2010	1710	394	156	121	1079	2	3462
2011	1699	422	142	118	1104	2	3488
2012	1645	407	150	115	1075	2	3394
2013	1671	407	153	112	1089	2	3434
2014	1677	411	151	111	1128	3	3480
2015	1714	415	147	114	1110	3	3504
2016	1804	412	147	115	1181	3	3661

Source: European Commission (2018). *EU transport figures. Statistical pocketbook 2018*, Luxembourg: Publications Office of the European Union, p. 36.

Table 2 shows the annual growth rates in EU-28 for passenger and freight transport during the period from 1995 - 2016. It can be seen that passenger and freight transport had equal annual average growth rate of 1.2% for the period. In 2016, freight transportation, compared to 2015, achieved much higher growth rate which was equal to 4.5%.

¹ Tonne-kilometre (tkm) is a unit of measure of freight transport which represents the transport of one tonne of goods by given transport mode (road, rail, air, sea, inland waterways, pipeline etc.) over a distance of one kilometre.

Table 2. Annual growth rates in EU-28, 1995-2016 **PAZI FUSNOTA!!!!!!**

	1995 – 2016 annual percentage	2000 - 2016 annual percentage	2015 - 2016
GDP at year 2005 prices and exchange rates	1.7%	1.3%	1.9%
Passenger transport (pkm ²)	1.2%	0.9%	3.2%
Freight transport (tkm)	1.2%	0.8%	4.5%

Source: European Commission (2018). *EU transport figures. Statistical pocketbook 2018*, Luxembourg: Publications Office of the European Union, p. 21.

Road freight market in the European Union is characterized by small enterprises that have usually less than 10 employees. The average number of employees in 2016 in EU-28 was 5.36 persons. In Croatia that number is lower, 4.03 persons. The highest average number of employees had Germany, where the average number of employees in road freight enterprises in 2016 was 11.56 persons. The lowest value had Greece, with just 1.65 persons.

National haulage in EU-28 in 2016 counted 1.173,6 billion of tonne-kilometres and international haulage 657.2 billion of tonne-kilometres (European Commission, 2018: 38-39) National and international haulage increased compared to 2015, but international haulage had higher growth of 6.2%. The trend of the EU road transportation market becoming more international has continued. In 2005, the share of international road haulage activities was 31% (European Commission DG for Mobility and Transport, 2017: 8), while in 2016, it was 35.9% (European Commission, 2018: 39). If it is observed the haulage performed within the territory of each Member, conducted by any vehicle, than it can be seen that Germany, with 447.7 billion of tonne-kilometres is the leader. That reflects that almost a quarter of all tonne-kilometres was realised in Germany. In the second place there is France with 258.1 billion tkm (European Commission DG for Mobility and Transport, 2017: 41).

Table 3. Average loading weight by type of operation and type of operator, 2015 (tonne)

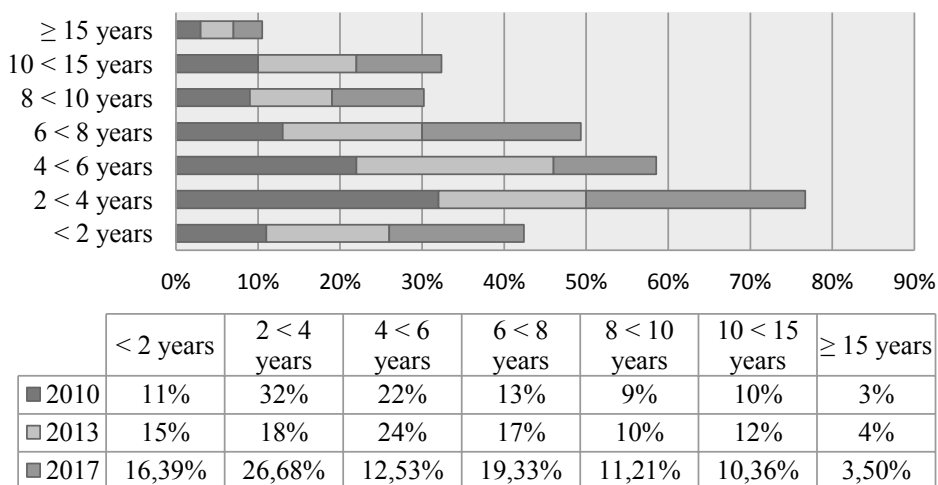
	Own-account	For hire and reward	Total
NATIONAL	8.6	14.4	12.7
INTERNATIONAL	13.0	16.1	15.9
TOTAL	8.9	15.0	13.7

Source: European Commission DG for Mobility and Transport (2017), An Overview of the Road Transport Market in 2015. Available at: <https://ec.europa.eu/transport/sites/transport/files/mobility-package-overview-of-the-eu-road-transport-market-in-2015.pdf> (accessed 22.10.2018.), p. 16.

² Passenger-kilometre (pkm) is the unit of measurement representing the transport of one passenger by a defined mode of transport (road, rail, air, sea, inland waterways etc.) over one kilometre.

The average loading weight in road transportation in 2015 was 13.7 tonnes (see Table 3). But if it is observed by the type of operator, then it is evident that hauliers that operate for hire and reward are trying to use their full capacity. Due to that, their average load weight in 2015 was 15.0 tonnes, while own-account operators had, on average, 8.9 tonnes of the loaded capacity (European Commission DG for Mobility and Transport, 2017: 16). In the following years, through different measures, the increase of the average load weight factor should be ensured. On the other hand, the EU has been trying to reduce the number of empty runs. Empty runs represent the waste of resources and it also has unwanted negative impact on environment. During 2005 and 2015, empty runs were reduced from 23% to 21% (European Commission DG for Mobility and Transport, 2017: 17). 21% of empty runs is still a high percentage, as it reflects that more than a fifth of all vehicle-kilometres was achieved by empty vehicles.

Chart 3. Structure of road freight transport by age of the vehicle in EU-28



Source: author-compiled according to the European Commission data (2018) Road freight transport by age of vehicle, EU 28, 2013-2017. Available at: https://ec.europa.eu/eurostat/statistics-explained/images/5/53/Road_freight_transport_by_age_of_vehicle%2C_EU-28%2C_2013-2017_%28million_tonne-kilometres%29.png (22.10.2018.); European Commission DG for Mobility and Transport (2011). Road freight transport vademecum 2010 Report, p. 18.

Chart 3 displays the structure of road freight transport by age of the vehicles in EU-28 in 2010, 2013 and 2017. It can be seen that only 13.86% of the freight vehicles is older than 10 years. If it is compared the structure in 2010 and in 2017, significant reduction in share of the vehicles between 2 and 4 and 4 and 6 years of age is evident. But, it is also evident that the share of vehicles between 6 and 8 years increased. Their share grew from 13% in 2010 to 19.33% in 2017. If we are to compare the value of a vehicle fleet which is less than 2 years old, it can be seen that in 2017, their share increased by 5.39 percentage points. That can also be the result of the age structure of vehicles of the new Member states. For instance, in Croatia, which became the Member of the Union on 1st

July 2013, the average age of vehicles in 2012 was 12.9 years (Vukadinovic, Tomasovic, Kolak, 2014: 63). Positively, in 2017, compared to 2016, the number of new registered freight vehicles increased by 3.1%. On the individual level, the highest increase was in Spain, where the number of new registered freight vehicles in 2017 was higher by 17.8% than in 2016, while Ireland had the highest decrease of 13.8%. Croatia achieved a slight increase of 1.8%, as in 2017, there were 8,500 new freight vehicles registered, and in 2016, 8.316 (European Commission, 2018: 93).

Road transporters within the EU use newer vehicles more in the international than domestic freight transporting. Newer vehicles pay much lower tolls for having reduced environmental impact (European Commission, 2014: 22). In order for the transporters even to consider the decisions about the fuel cost rationalization, they need to have a good method of tracking the vehicle fleet’s activities, along with filing all necessary reports. Objectively, the bigger the transporting company, the bigger the possibility of inhomogeneous vehicle fleet based on several parameters (type of the vehicles, shape of the vehicles’ body, set bearing capacity, age of the vehicles, the level of ecological quality), which further makes harder the decision- making regarding the fuel costs (Banelli, Kolak and Vukadinović, 2009).

Table 4. Greenhouse gas emissions³ and CO₂ emissions from transport, by mode, in 2016 (%)

	Green house gas emissions	CO ₂ emissions
Civil aviation	13.3%	13.38%
Road transport	72.0%	72.00%
Railways	0.5%	0.51%
Navigation	13.6%	13.63%
Other transportation	0.5%	0.48%

Source: author-compiled according to European Commission (2018). *EU transport figures. Statistical pocket-book 2018*, Luxembourg: Publications Office of the European Union, p. 137 & 150.

Besides empty runs and low value of average loaded weight, the main disadvantage of road freight transportation is its negative impact on environment, which is reflected through greenhouse gas emissions. In 2016, the transport sector had the share of 26.7% in total greenhouse gas emissions in EU-28. The major transport pollutant is the road transport, which held the share of 72% (see Table 4).

The EU plays the dominant role in reducing negative effects of the road transport through formulating policies and stimulations for research, development and implementation of the activities, especially through these four key areas (Winder and Morin, 2009):

- Competitiveness and road transport efficiency;
- Interconnection, availability and road transport quality;

³ The emission of any of various gases into the Earth’s atmosphere, esp carbon dioxide, that contribute to the greenhouse effect

- Road safety;
- Environmental influence, including greenhouse gas emissions.

The influence of road freight transport on the environment can entail costs for the society in many ways, through the noise, exhaust gases and greenhouse gas emissions (Sulaiman, 1997). The monitoring of environmental pollution caused by the road freight transport is an important element of most national and European development policies over the last years (Litschke and Knitschky, 2012). Streimikine, Baležentis and Baležentienė (2013) state several main approaches for reducing greenhouse gas emission caused by the road freight transport:

- Improving fuel consumption by the use of hybrid electric vehicles.
- The use of fuel low in carbon, like bio ethanol or biodiesel.
- Substituting one part of the oil with electrical energy used for power supplying the plug-in hybrid vehicles.
- Upgrading road infrastructure, better traffic management, smart transportation behaviour or eco-friendly driving.

The goal of the European Union is to create conditions where road transport sector will be able to be efficient, safe and have minimal impact on environment. Road transport sector in the EU faces numerous challenges. The drivers deal with more and more traffic congestion and as mentioned before, one in five road freight vehicles drives empty. The pollution does not represent an obstacle only for those involved in the traffic, but it also causes the loss of large quantities of fuel and drop of productivity. Pollution costs take 1% of the GDP in the European Union. Traffic safety, safe rest stops and good working conditions are also of great importance. Europe needs transport that is cleaner and less dependant on oil, whose prices will apparently remain high in the medium and long run (European Commission, 2012).

Governments worldwide persist in implementing policies that will establish sustainability in various areas (from energy to urban planning, transport etc.). Reduction and elimination of pollution with CO₂ in the transporting sector requires a broad implementation of sustainable transporting policies, including economic instruments, technological innovations, but without endangering the mobility of people and goods (Santos, Behrendt and Teytelboym, 2010).

Decision-makers have been lately more and more aware how significant it is to connect ecological and health policies with the transport (Stead, 2008). Information systems have a growing role of practical application in the road freight of goods, regarding they contribute to the optimization of the transporting process and higher levels of environment protection (Banelli, Kolak and Vukadinović, 2009). Many studies have shown that physical road maintenance has a positive (descending) influence on greenhouse gas emissions. First and foremost, fiscal measures play an important role in securing the stability of public finances, but they can also significantly impact the emission of CO₂ in traffic. Likewise, they can lead to reduction of CO₂, for example, through stimulation of the production and purchase of eco-friendly vehicles, and

through encouraging more efficient fuel consumption (Streimikine, Baležentis and Baležentienė, 2013).

4. CONCLUSION

Under the influence of globalization, the importance of road freight transport is growing, regarding the fact that it plays a crucial role in production and distribution. Road freight transport connects supply and demand and many industrial sectors and it is hard to imagine any economy functioning without it. In almost all the Member countries it plays a major role in freight transportation. Bearing in mind that road freight transport represents a more significant part of road transport, this research has focused on this segment alone.

The purpose of this paper was to, based on the analysis of the secondary data, highlight the importance of the road freight industry in the European Union, along with its most important characteristics. Road freight transport employs over 3 million people and generates around 2% of the GDP in the European Union. Road freight transport industry in the EU is highly fragmented; the market consists of a large number of small companies (the average number of employees is 5.36), where neither one influences the industry's profitability on a larger scale. Road industry brings many advantages in relation to other forms of transportation, but it is also characterized by an extremely negative influence on the environment. The paper displays the GHG emission according to types of transport, and it is evident that road freight transport, with the share of 72% is dominant. On the other hand, one limiting factor, besides inadequate height of the average load weight freight vehicles, is the empty-run criteria, which shows that almost one in every five freight vehicles drives empty. In the future, it is crucial that empty-runs are brought to minimum, and to influence the reduction of harmful gases from road freight transport with appropriate innovative measures.

The European Union has already recognized the significance of the necessary improvements of energy efficiency of road freight transport, but it is also important that those who make decisions within the Member states recognize the importance of the above-mentioned facts. Many newer Member states possess considerably older vehicle fleets in relation to older Members. Older vehicles pollute more and for this reason pay more tolls in some countries. Stimulations would definitely encourage companies to renew their vehicle fleets with more acceptable, eco-friendly vehicles.

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THE IMPORTANCE OF SPECIFIC ENTITIES OF THE REVERSE LOGISTICS PROCESS MANAGEMENT ON A GLOBAL SCALE

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Abstract

While segregating the direct and reverse logistics flows, due to the complexity of the returns process management, there have emerged specific entities unique only for these flows. Regarding the organizational aspect, these entities can be formed by the participants of the direct flows, but can also be engaged as specialized external aid. The analyses carried out in practice concerning this topic show that the biggest number of entities involved in managing the reverse logistics processes are within the category of specialized business subjects, which only perform this type of work and which are independent from the actors of regular flows. The subject of this paper is to analyze in depth the specifics and types of entities specialized in managing the reverse logistics flows, such as centralized return centres, 3PL and 4PL providers for reverse flows, as well as various business entities of the secondary market. The aim of the paper is to indicate the complexity of tasks performed by specialized entities involved in the reverse logistics process, their scarcity in numbers on a global scale and thus the huge unexploited business potential lying in this market segment which is a unique chance not only for regional, but also global business milieu.

Key words: Reverse logistics, Centralized return centres, 3PL and 4PL providers, Secondary markets

1. INTRODUCTION

The segregation of direct and reverse logistics flows, necessary due to the complexity of the returns realization, creates a need for specific entities which are unique for these flows. Contemplating the issue of organization, the mentioned entities can be formed by participants of the direct flows, but can also be engaged as specialized, external aid (Dudin *et al.*, 2017). The practical analyses concerning this issue have shown that the greatest number of entities involved in the returns process are mainly in the category of specialized performers, which only do that type of job and which are independent from the entities of the regular flows. That only confirms once more the complexity of the realization of activities of the returns process. Of course, there are those entities of

the reverse flows which are traditionally organized by the regular flow members. Mostly, such participants are a minority (Trebilcock, 2001).

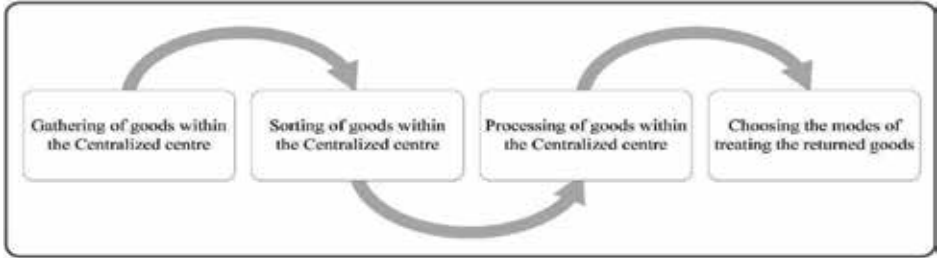
Besides the organizational specifics, the entities engaged within the reverse logistics process are characterized by a significant number of other peculiarities, which are presented within the following analysis. Continuing we shall revise in detail the role and importance of the following participants of the reverse logistics process: Centralized return centres, 3PL and 4PL providers and different participants of the secondary market.

2. CENTRALIZED RETURN CENTRES

The centralized return centres represent entities devoted to quick and efficient processing and management of returned goods. Although in the developed western economies these centres have been in use for a number of years, only recently have they additionally gained importance and popularity. The reason for this lies in the fact that more and more retailers and producers are deciding to dedicate specialized premises and work force exclusively for management and processing of returns (Fleischmann *et al.*, 1997). Out of the stated it can be concluded that the centralized return centres precisely represent those rare entities which are dominantly, i.e. in the majority of cases organized by the same market participants as the regular flows. Within the centralized system, all goods in the reverse logistics channel are gathered at one point, at which they are sorted, processed and then sent off to the following destination. In that manner, the greatest possible quantities of returned goods are created and the need to be replace on the market again, opening up the space for serious potential earnings. The increase of earnings within these centres has been enabled due to the engagement of specialized personnel for sorting, with the expertise within the area which significantly facilitates the placement of every product towards a certain destination (Fleischmann *et al.*, 1997).

Generally seen, the centralized return centres function through a set of activities grouped in several standardized steps. At the beginning, the retail object sends the product back to one or a greater number of centralized centres. If it is a great retailer, national or a multinational company, there shall probably be more of these centres. For example, the American retail chain Kmart has four, while its competitor Sears has three centralized return centres (Roggers and Tibben-Lembke, 1999). After the returned goods have been accumulated in a certain measure, the next step is their sorting and processing, which are considered very important steps of the flow. Within it, the employees make decisions in which state it is possible to sell a returned product or if that is not an option, how to most easily send it to waste. Obviously, the selection of the best channel for goods placements is of critical importance for the maximization of income within the reverse logistics flow. Finally, the decision about the suitable mode of treating the good the centralized centers make based on guidelines which have been set by the retailer or producer. Figure 1 shows the graphical illustration of the mentioned activities:

Figure 1. Activities carried out within Centralized Return Centres



Source: Rogers, D., Tibben-Lembke, R. (1999), p. 51.

The forming of the centralized return centres, as a specific entity of the reverse logistics process, brings numerous benefits for participants which organize them most oftenly, i.e. for retailers or producers. The main benefits of establishing such centres are given within Table 1:

Table 1. The main benefits of establishing the centralized return centres

The consistency about the decisions on treating the returned goods
The rationality in using space
Workforce cost savings
The decrease of transport costs as a part of the logistics flow due to the
Improving customer service
Time savings needed for the realization of the chosen option of product
The positive influence on generated profit

Source: Rogers, D., Tibben-Lembke, R. (1999), pp. 52-54

The analysis of particular advantages points out several relevant moments. First of all, sending all returned goods through the centralized return centres results in increasing the concordance of decisions concerning their treating. Since in that manner, the process is standardized, the errors are identified and avoided more easily. The quality of processing returns is generally improved by passing onto the system of centralized return flows (Baumgarten *et al.*, 2004).

Second, the retailers most often possess a limited space within their objects which can be dedicated to returned goods. Usually, the best exposed parts are reserved for new and returned products which sell quickly, and not for the returns which nobody wants. Because of that, forming of the centralized return centres, where precise sorting and processing of products is performed, brings as one of the main benefits for retail the rational usage of their space, since only those products which can be quickly placed on the buying market shall be returned (Dowlatskhani, 2010).

Third, centralizing the return centres one more advantage for the retailer is the minimization of labor force costs in order for the return to be processed. Namely, once adequately trained, the employee of the centralized centre can perform more activities in a shorter time period, then the employee in retail, which realizes both regular activities as well as the coordination of the reverse logistics flows (Dowlatshahi, 2010).

Forth, due to consolidation, transport costs within the reverse logistics flow decrease. Within the centralized model, using the mixed cargo of different suppliers, the usage of mutual pallets increases and the usage of individual package decreases, which brings to the unification of shipments and the consequential reduction of transport costs. However, it must be remembered that the centralized system of return can act completely opposite, i.e. increase the costs of manipulation and transport. That happens because all products, i.e. goods get to be transported from their retail locations, regardless of their distance to the centralized centre.

Estimating the fact that a legitimate and often return option is waste disposal, its transport up to the centralized centre facility in order to be set aside as waste afterwards exclusively increases costs, without any positive influence onto the income. However, the positive effects of implementation of the centralized return centres, expressed in the general costs savings, shorter time needed for the treating of returned products as well as the increased income, more than compensate the occurred transport costs for those goods which would be set as waste upon the finishing of the returns process (Haas *et al.*, 2003).

Fifth, regarding from the perspective of the producer, the centralized return centre can improve the customer service. That can be seen in the speeding up of certain administrative procedures, setting the paper work in order, especially the one connected to the issuing of the returns permit, as well as offering relevant information for the management. Due to the consolidation of the returns, the producer can easily become aware of trends connected to the returned goods. Also, the adequate management of the return flows can be a good strategy for retaining the clients loyalty. The mentioned loyalty is achieved by quicker processing of the transaction and giving credit to the clients. Finally, establishing the return centres is also a proof of the dedication for the incorporation of the returns management into the general strategic company orientation, which is additionally positively valued by the client (Hall *et. al.*, 2013).

Sixth, the introduction of the centralized return centres speeds up the flow within the reverse channel. Before establishing such a system, retailers would accumulate the returned goods within objects, and then they would send them back to the producers in uneven, unorganized and bulk tours. Since the returned goods were not the first priority of the retail object or the distribution centre, they would usually pile up. The explained inefficient management of the returned goods would leave to the loss of their value and to physical damaging. For products such as personal computers, such situation is defeating, since the goods lose value during every day that they are not used (Hall *et. al.*, 2013).

Finally, the formation of the centralized return centres has an evident positive influence onto the realized profit within the developed western economies. According

to the research carried out concerning this topic, it has been proven that there is a bigger positive influence onto the achieved profit by the centralized return centres which have not been outsourced, i.e. organized by the same entities as well as the regular product flows (Roggers and Tibben-Lembke, 1999). Returning to the beginning of the analysis, the conclusion is that this is one of the main reasons why these entities are better to be organized by conventional participants, then to be realized by specialized performers.

3. 3PL AND 4PL PROVIDERS

The conventional participants within the supply chain, as has already been expressed, often do not have the needed level of expertise in order to be actively involved within the process of product returns, which is by itself, very specific. Even in the case of previously analyzed centralized return centres and their coordination by participants from regular goods flows, the locations and labor force engaged within them is separated from the conventional flows. In those circumstances, the external providers, which have a more and more significant role when it comes to outsourcing the most different activities of logistics management, most often assume the role of organizer and activator of the reverse flows. A very special place within that process is dedicated to 3PL and 4PL providers.

3PL providers represent companies which offer multiple logistics services to clients. The concept of 3PL providing has been developed during the 80-ies of the XX century, by introducing deregulation into the sphere of truck transport within USA. That enabled companies which up to that moment performed other logistics functions (for example warehouse management or supply management) to enter the sphere of transport and thus enrich their package offer. Today, it is also a custom for the providers to perform the mixing, i.e. combining the services which form their package offer. These companies facilitate the product flows, from the supplier of raw materials to producers and further on the distributors, retail and final clients, but also in the reverse order (Bianchini, 2018).

Services offered by 3PL providers include transport, warehousing, supply management, goods reloading and similar. Often, the unification of the system and the service scope enables providers to fulfill useful functions, such as fitting in with the regulation within the area or determining the total costs of delivered goods for sale (Hertz and Alfredsson, 2003). Since the beginning of the XXI century till now, almost 2/3 of companies from the list Fortune 500 depend on some sort of 3PL support within the supply chains, thus increasing the income of these providers in the double amount compared to the last decade of the XX century (Trebilcock, 2002). In practice, the companies which are decision makers about engaging 3PL providers most often decide to outsource entire functions, rather than partial activities.

The increase of importance of the reverse logistics flows has lead to the appearance of 3PL providers which exclusively process the returns of goods. Among numerous companies of this type there are most different mode of offer. Some 3PL providers are connected to reverse logistics, offer only the services of physical organization and

returns realization. These are the old, traditional 3PL providers such as GENCO, USF Processors, Universal Solutions and similar companies, who have been processing returns for years for the pharmaceutical, cosmetics, clothing and electronic industry (Lai, 2004).

The second option of providers are those with the combined offer, which besides the physical services in the real world and time, offer the technological and service platform for managing the return flows in a form of specialized software. In this category we can include companies such as Newgistics, ReturnBuy and similar.

Finally, there are those providers, such as Return Exchange, which do not offer at all the service of physical nature, but exclusively offer technological and software solutions as a support for the realization of the return flows (Meade and Sarkis, 2002). Based on the stated categorization, and bearing in mind that outsourcing most often assumes the integration of the entire function, it is logical to conclude that it is best for the provider to offer integral solutions, both regarding the technical and software support, as well as precise realization. In that manner the process is unified, and the costs intended for these purposes are decreased, since it is not needed to engage several 3PL providers, but only one.

The basic shortcoming of engaging the 3PL provider is within the realization of the logistics flows, and is connected basically to the shortcomings of the 3PL category. That means the functional role of these companies is very limited. Namely, even if they offer unified service, 3PL providers dominantly focus on the function, rather than the way how to outsource a certain process. For example, these providers can specialize in transport, but are no longer able to master the entire process of transport management. Due to that reason, the leading edge is passed on to 4PL providers (Perotti *et al.*, 2012).

The concept of 4PL providers has first been defined in 1996 by the consultancy company Accenture, as a way of using this type of company in order to integrate and manage the company logistics resources. 4PL providers usually do not have their own funds, i.e. business resources, but rather specialize in managing the resources of others. In order to achieve that, 4PL logistics providers combine the skills of process, technology and management (Dyczkowska, 2018). These providers are neutral and can manage the entire logistics process regardless of the intermediaries used within the process- transporters, warehouses and similar. Consequently, 4PL providers have become a logical alternative to outsourcing business processes, offering visibility and integration for a greater number of participants within the supply chain. Those companies which use the services of 4PL providers can without problems focus on own key competences and resources, such as supplies or employees (Mukhopadhyay and Setaputra, 2006). 4PL providers are treated as a strategic partner and an integrating factor within the supply chain, which manages resources, abilities and technology of own organization with the complementary provider elements of other services, in order to deliver comprehensive solutions within the supply chain.

Differing from the usage of 3PL providers in the realization of the reverse logistics flows, the involvement of 4PL providers in this process is still of pioneer nature. It is possible to identify three models of organization of 4PL providers in the function of return flows. The mentioned models are jointly explained within Table 2.

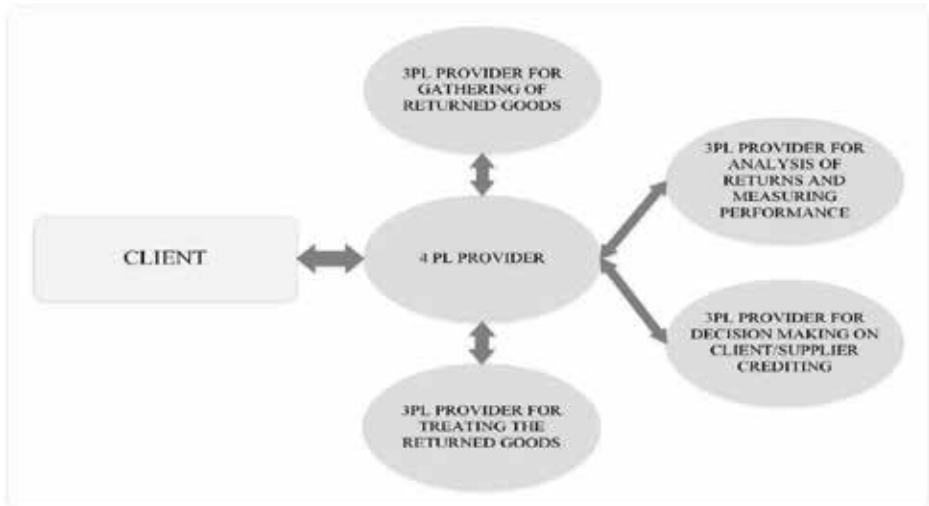
Table 2. Models of 4PL providers in the organization of the reverse logistics process

4PL Model	Model explanation
The leading logistics provider	The 4PL provider acts as an in-house organizer of the process of reverse logistics. It can, but it need not take on the role in the selection of the 3PL partner. Its basic obligation is an efficient and effective process organization and the monitoring of all participants.
Solution integrator	4PL provider acts as an integrator of different 3PL partners engaged within the returns process as well as their coordinator in the name of the client.
Industrial innovator	4PL provider uses the expertise and resources connected to return flows in order to create a solution not for any specific client, but for a greater number of potential clients which belong to a certain industry.

Source: Mukhopadhyay, S., Setaputra, R. (2006), pp. 716-730.

Based on presented model, the conclusion is that the degree of involvement i.e. connection of the 4PL provider to a particular client is lower and lower going from the first until the third solution. Which option shall be chosen is decided by the precise situation and company-client thoughts which initiate the provider engagement. As an illustration, Figure 2 shows the graphic review of the model 2, i.e. the role of 4PL provider as a solution integrator.

Figure 2. 4PL provider as a solution integrator



Source: Mukhopadhyay, S., Setaputra, R. (2006), pp. 716-730

Based on the analysis of predicted specifics of the two categories of providers, it can be concluded that 4PL partners have a wider scope of action and a higher level of

expertise compared to 3PL providers, both in general logistics operations, and in the case of the realization of the reverse logistics flows. That does not further mean that one partner category excludes the other. On the contrary. While 4PL providers have the leading edge in general management and the organization of the reverse logistics channel, at the same time individual 3PL partners represent experts in the realization of independent activities and process functions, creating in that way a complementary whole. Finally, by passing by the realization of the reverse logistics onto these partner categories, there is a definite segregation of regular and reverse flows, since 3PL and 4PL providers can carry out all the phases of the reverse process independent from the conventional participants within the supply chain. Therefore, their role in the flows of reverse logistics is more than significant and unique.

4. SECONDARY MARKETS AND THEIR ACTORS

The secondary market represents a mutual term for a group of wholesalers, retailers, liquidators, brokers and barter companies which sell products that have not been placed through the primary channels of sales for some reason. The companies that do business on the secondary market sell both new, and used, returned goods. It is an often situation in practice that goods be directly placed from the supplier to the secondary market, skipping the other entities within the supply chain. From the analysis performed up to now, it is obvious that these markets are not exclusively connected to the flows of the reverse logistics process. However, since they certainly form an important part of the reverse goods flow, the detailed analysis of several important aspects of the secondary markets enables better understanding of the very reverse logistics, and that is why it is being carried out at this instance. Figure 3 shows certain regular flows and the relations of entities with the secondary market. In order to make a methodological differentiation between the reverse logistics activities and those generally connected with the secondary market, the return activities have been depicted with a dotted line, while the regular activities have been presented by a full line:

Figure 3. General and reverse activity flows of the secondary market



Source: Rogers, D., Tibben-Lembke, R. (1999), p. 60

Based on the presented illustration, it is obvious that there are generally four reasons for placing goods onto the secondary market directly by the producer. The first case is connected with the situation where there is a change of product package. The change of product package most often occurs due to the reason that the design is either too old or when the size of the product changes. This especially refers to food or cosmetics products (Fiksel, 1996). Within the second case, the introduction of the new product version speeds up the clearing of the stocks of the old model. Up to the moment of complete sales of the old model, it is most usually sold with a certain discount. If the sales are quickly realized, the product does not need to be placed on the secondary market at all. In case of realization of important changes within the product, the producer can enable the retailer significant incentives in order to sell the remaining products. If bigger modifications are in order, there is a bigger possibility that the product shall surely be placed onto the secondary market (Fiksel, 1996). The cancellation of a greater amount of ordered goods creates significant amounts of stocks and is identified as the third, characteristic case. In those circumstances, the producer is usually ready to sell the mentioned surpluses to any entity which is willing to pay the amount sufficient to cover the costs of product production. Finally, the fourth case refers to the situation where the producer is confronted with solving issues of a greater quantity of piled up, unsold goods created based on wrong, too optimistic sales projections.

Instead of keeping on stock a great quantity of goods which need a lot of time to be sold, the producer can decide to pass over the entire quantity to the liquidator, at a lower price. Besides the general costs which refer to the secondary market, the next segment of analysis is connected exclusively to its role within the reverse logistics process, by explaining the activities which specific actors of this market need to realize within it. Namely, the participants of the secondary market secure products for the growing group of retailers, which for example specialize for sales of unwanted returned goods, used products, surplus returns and similar. Since this is a very diversified market, developed exclusively within the developed western economies, it is needed to perform its certain classification. Table 3 shows the main participants of the secondary market with their summed up basic specifics:

Table 3. Key of the secondary market connected to the reverse logistics process and their roles

Liquidators of returned unwanted goods	They operate with goods arrived from the centralized return centres. They physically managed stocks, sort and consolidate.	Liquidators of returned seasonal goods	They operate with returns of I class quality, usually shoes and clothes. They negotiate directly with sales departments of big retailers about procuring goods which are still on regular sales.	Brokers	They operate with all types of returned products. They find clients for the returned goods, which they resell further on.
Liquidators of insured returns	They primarily work with products which have been declared a loss in order to collect the insurance. They offer the services and estimates for supply losses due to natural accidents or disasters.	Barter companies	They work with the returned goods surpluses. Arrangement are made in order to trade with surpluses of goods of one company, for the surpluses of another company.	The grey market	They work with products which do not have the company guarantee. The new products are sold by re-sellers unauthorized by the company.

Source: Roggers, D., Tibben-Lembke, R. (1999), pp. 92-93

Analyzing in detail every of the actors listed within Table 3 several conclusions can be drawn. *The liquidators of returned unwanted goods* operate on products for there is no more existent demand within retail shelves. Namely, the product may no longer be profitable at the original price, but with its reduction performed by the liquidator, it can become profitable again. These product categories appear due to several reasons: the product is a seasonal good, such as inflatable pools or snow shovels; there is a new, improved version of the product, such is the case with mobile phones; the product has not answered the expectations of the sales department, for example a chips of a certain flavor. Although the goods can be obtained in direct contact with the producer, it is mostly delivered via centralized return centres, as a last solution for its disposal. The liquidator delivers further on the goods to flea markets, pond shops, internet stores, processing centres, wastelands etc. The liquidators of returned unwanted goods take into consideration any category of products for which they expect the achievement of a certain profit. It is interesting to mention that the practice has shown that the three most difficult categories to market are: clothes, toys and electronic equipment. The reason for that lies in the specifics of their size (toys), the quick changes of features and character-

istics (electronic equipment) as well as expressed seasonal character (when it comes to clothes).

The liquidators of returned seasonal goods usually work with products of I class. However, regarding the structure of goods that are being operated with, it is obvious that it dominantly refers to seasonal returns, and not the products for which there is no expressed demand or a surplus in the process of supply. This category of secondary market participants most often specializes in the returns of clothes and shoes. Consequently, compared to the liquidators of returned unwanted goods, this category has the tendency to focus more narrowly on specific goods, as well as to develop the production expertise and long term relationships with retailers. Another specifics of the liquidators of returned seasonal goods is the unique way in which they gather the given returns. Usually, but not always, these participants negotiate with the sales departments of big retail stores about goods delivery which at that moment is still being sold in retail objects. In this manner, a certain degree of planning the returns in advance is possible. Upon the completed job, the liquidators completely independently organize the returns process, so the goods are finally placed to similar categories, as with the first analyzed entity.

Brokers represent a category of the secondary market participants which operates with all types of returned goods (seasonal returns, unwanted goods, surpluses etc.) which are at the end of the life-cycle for any reason. These are entities which are willing to pay symbolic amounts of compensation for the goods which nobody else wants. It is not unusual for brokers to agree arrangements with retailers, where the retailers sell any kind of goods and in any state, of which they have to get rid of, even for the marginal refund. Besides the payback of returns, the brokers usually do not realize the following phases of the returns process, but only resell the goods to other entities (for example the liquidators of returned unwanted goods) who shall decide upon the destiny of the goods.

The liquidators of insured returns are specialized in operating products which have been declared a loss with the purpose to collect the insurance. For example, if there is a car accident in which a truck full of load goes off road, all products contained within it came declared a loss, even in the case that the major part of the delivery has remained intact. In this case, the sender of the goods has two options. The first option is that the transporter who has been engaged for the operation and who is responsible for the accident should pay in full the created loss. In that case, the transporter sell the given goods onto the secondary market to the entity such as the liquidator of insured returns, who buys the content of the truck and further resells it at the most favorable price. If the sender does not wish for the goods to be sold on the secondary market, the other option is to receive a partial compensation for the damaged goods and to return them. In that case, there is no engagement of any participants of the secondary market.

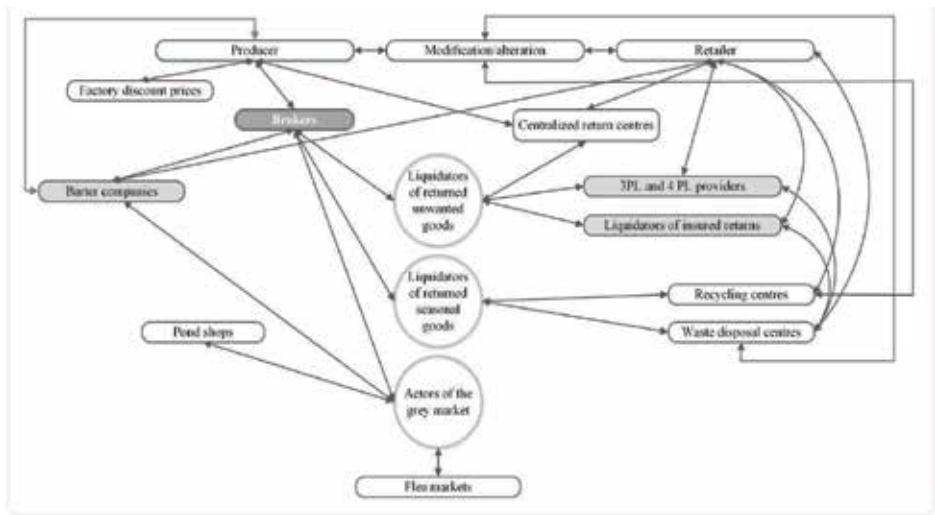
Barter companies aid other companies to free themselves of surplus products, and in return to gain the desired goods. These actors of the secondary market usually have big warehouses which are accumulated as the result of the previous trade arrangements. The barter companies gain from different participants within the supply chain

the undesired supplies of goods in exchange for goods for which these participants estimate to be needed, and is present within the warehouse of the barter company. Usually, the barter companies trade with any category of returns for which they make an estimate that it can be profitable. If a certain return is harder to sell, the exchange of such a product shall be much more complicated. The specifics of some barter companies is that they use universally valuable products, such as airplane tickets, as a unique currency of exchange.

The companies of the grey market sell new products outside of regular flows, usually as re-sellers not approved by production facilities to perform such an activity. The product can be placed onto the grey market in case when a registered re-seller has the need to generate capital, so it decides to discretely sell still new products to the unauthorized reseller for a small profit. The companies of the grey market usually have far lower costs of operations compared to official resellers, so they are able to profitably sell products at far lower prices compared to those suggested to the retailers by the producers. The typical representatives of the grey market are the so-called flea markets. Since such entities are not retailers officially approved by the producers, they have not got its production guarantee. Concluding, it can be stated that even though the companies of the grey market sell dominantly new products, due to the specific way the goods are delivered to these entities, as well as due to the fact that they often represent the final destination for certain used, returned goods, they still have not got a significant role in the reverse logistics process flows.

Based on the analysis of role and engagement of different specific entities of the secondary market, but also other participants of the reverse logistics process, the conclusion is that the organization of such a process is rather complex, so that every participant within it has a particular importance. The degree of complexity of total return flows and the multitude of entities engaged within this process is best depicted within Figure 4:

Figure 4. The complexity of the reverse logistics process and entities engaged within it



Source: Rogers, D., Rogers, Z., Lembke, R. (2010), pp. 133-160

5. CONCLUSION

The differentiation of the reverse logistics process can be expressed both by steps out of which the process is comprised of, but also regarding the participants engaged within that process. This differentiation depends on the degree of recognition and practical implementation of the reverse logistics within some industry or within the entire national economy. Namely, all stated analyzed entities which have been the main preoccupation of this paper (centralized return centres, 3PL and 4PL providers and secondary market participants) exist within the markets of the developed countries, such as western European countries or USA, where the management of the reverse logistics flows is a reality, i.e. where the importance of this group of activities has a full affirmation within the market competitive battle. Unfortunately, globally seen, there is a much greater participation of those countries where due to insufficient estimate of importance of the reverse logistics flows, the process is not adequately developed, nor the specific entities with their roles and interpersonal relations have been completely differentiated. Thus, the importance of specific entities of the reverse logistics process management on a global scale yet remains to be fully promoted and utilized.

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IMPORTANCE OF AIR TRAFFIC FOR THE DEVELOPMENT OF TOURISM: EMPIRICAL EVIDENCE FROM CROATIA

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Abstract

Tourism and traffic are interrelated, connected phenomena of exceptionally strong mutual influence. Due to significant impact in the Republic of Croatia, as well as numerous other countries, they are defined as one of the leaders of the country's economic development. It is of great importance that traffic and tourism are aligned on the basis of sustainable development, with an emphasis on preserving the environment so as not to undermine performance tourism. In response to the phenomenon of mass tourism, new trends in air traffic are emerging, eliminating the insurmountable obstacles thus far and making travels more economical, faster and more accessible. Air traffic and tourism interdependence is remarkably strong and of great importance to the economy of each country. In order for traffic to support tourism, it is necessary that, within the observed economy, there is uniformity in the development of all transport branches. The aim of the paper is to analyse the state of air traffic, its connection with tourism and to determine how air traffic can make a contribution to the development of tourism in the Republic of Croatia.

Key words: traffic, air traffic, tourism, Republic of Croatia

1. INTRODUCTION

Traffic, being one of the drivers of the economy in every country, basically represents transport of people, goods and information. However, with its growth, traffic has also played an important role in the development of mass tourism. Transport is an integral part of tourist industry, and tourism has developed over the last years mainly because of the improvements made in passenger traffic (Virkar and Mallya, 2018). Air traffic, as the youngest traffic branch, plays an important role in tourist traffic flows all over the world. Although being the youngest, the significance of air traffic has been growing considering it provides the possibility of fast and affordable travel and therein enables visits to numerous tourist destinations. Air traffic and tourism have always been

interconnected, and over the last decades, this interconnectedness has become stronger. So, the advancement of air traffic has been followed by development of new tourist products and partnerships (Stoenescu, 2017).

In the framework of this paper, the theme of the influence of air traffic on tourism and the phenomenon of interdependence of tourism and traffic has been researched, with the focus on the role of air traffic in tourism. Tourism, being a complex socio-economic phenomenon, is in correlation with many economic activities, and so is the case with traffic. On the other hand, traffic and its infrastructure make the foundation of every economy, for without traffic, there are no conditions for the development of any other branch. In line with that, traffic precedes tourism, although tourism undoubtedly influences traffic, presupposing the development of traffic capacities. The main goal of this paper is to investigate the role of air traffic in the development of tourism in the Republic of Croatia.

2. TRAFFIC AND TOURISM DEVELOPMENT INTERDEPENDENCE

It is a well-known fact that, in the past, tourism and traffic have been two interdependent and interconnected phenomena. Namely, tourism represents an area where traffic holds an important role and is crucial to the economic development of any country. While traffic influences tourism, at the same time, tourism impacts traffic by stimulating traffic system modernization, generating growth of the traffic means in use and creating the need for introducing new forms of traffic. Interdependence of traffic and tourism is complex and dynamic, and it includes a number of mutual benefits, as well as limitations. Today, much attention is given to the negative influence of traffic on tourism regarding pollution. Traffic generates noise, emission of greenhouse gas and other harmful substances and requires big surfaces for the infrastructure. This limits the development of tourism, but also creates other issues for the society and economy in general. Besides the negative influence, like pollution, traffic and its infrastructure bring some other limitations for tourism. In some areas, due to poor traffic regulation, tourist traffic is diminishing, as well as tourist demand in general, which brings multiple negative effects not just on tourism, but the economy in general. Because of the modernization, changes in construction and signalling elements, traffic infrastructure with its dimensions often visually deforms the space and takes up a lot of the surfaces which could be put to better use (Gašparović, 2011). Availability and quality of transport at the destination have remarkable influence on the tourists' experience, as on the level of their satisfaction. It is the satisfaction that is considered the most important factor in the attraction of the tourists and the length of their stay, and it is indisputable that traffic has major influence on the tourist satisfaction (Virkar and Mallya, 2018). Gržinić (2018) points out that traffic is becoming the place of maximum comfort in tourism, and at the same time, of the valorization of the travel time and the experience big tour operators offer.

On the other hand, as traffic negatively influences tourism, i.e. bears evident limitations, tourism, in some respects, also limits the development of traffic in tourist

areas. In order to reduce limitations, a planned development of the traffic infrastructure leading to the tourist destination is necessary, since, in that way, possible traffic routes and the density of the infrastructure are set. For certain destinations to be ecologically preserved and to prevent spatial complementarities of the areas, often, more expensive, longer and, in some other respects, more unfavourable roads are built. By influencing traffic development with its emergence, tourism can bring negative effects as well, like organizational and security issues, and discrepancies between capacities and traffic dimensions (Mrnjavac, 2006).

In the analysis of the interdependence between traffic and tourism, it is certainly important to point out the model of sustainable development of tourism and its principles that contribute to the sustainable development of the economy in general. The model of sustainable development of tourism implies development that satisfies all the needs of the tourists, tourist destinations and other participants, while simultaneously preserving tourist resources in the future, without putting in danger the possibility of their use by the future generations. Likewise, the model entails the growth of the quality of life for the people living in the area, as well as the right to tourism and the freedom for tourist mobility, satisfaction of economic, social and esthetic needs, with retaining natural and social characteristics and cultural and historical heritage. This model of sustainable tourism enables tourists to satisfy their needs, enhance the quality of life and undergo the experience without limitations. Tourist attractions draw tourists to the specific location, and traffic is the one that enables the arrival to the destination. Traffic, therefore, has an important role in the relation between the sustainable tourism and traffic, making these two phenomena interdependent. For these reasons exactly, if the traffic infrastructure is well-organised and regulated in the specific area, that area becomes more attractive for the tourists. Not all concepts of tourism are applicable to all potential cases, and for this very reason, the model of sustainable tourism provides adjustment of specific areas to specific conditions (Lumsdon, 2000).

2.1. The role of air traffic in the development of tourism

Air traffic and tourism are two interconnected fields with significant interdependencies. The intensive development of air traffic has enabled globalization of tourism, i.e. it has provided availability and connection of all parts of the world, and quick and comfortable transport even at the longest distances. Without air traffic, some areas would not be categorized as tourist destinations, considering that air traffic is often used as a form of tourist offer. As early as in the second half of the 20th century, air traffic started generating the development of tourism, especially due to introduction of commercial jet planes (May and Hill, 2002). Air traffic and tourism are interconnected, so tourism is, in fact, the leading factor and the stimulator of the changes in the air traffic. Tourism particularly influences the development of new business models in the air traffic. For the strategic development of tourist destinations, an adequate air policy is of extreme importance (Bieger and Witmer, 2006). Air traffic is the one that contributes greatly to the global tourist mobility. Liberalization has enabled it to become available to the greater masses, which has positive effects on the development of tourism in certain countries (Gržinić, 2018).

Air traffic is a very dynamic sector, and its development over the last years has encouraged significant changes in tourist industry as well. First, air traffic is the key generator of economic growth, and, on the other hand, it is strongly connected with the development of tourism. As tourism develops in certain areas, so air lines become interested in providing their services in that area (Stoenescu, 2017). Airports oriented towards tourism can achieve much more efficiency than those not tourism-oriented. There is a very strong connection between the airport business model for attracting tourists and the efficiency of such an airport. Airports where many services are provided by low-cost airlines are, in general, more efficient (Fernández, Coto-Millán and Díaz-Medina, 2018).

Air traffic is in fact most deserving for the development of international tourism. High prices of the air transport have long put off passengers, but charter lines development, i.e. low-cost airlines, have made air travel available to almost everyone. Charter lines offer air travel at much more affordable, lower prices, and they operate almost everywhere in the world. The development of tourism in certain regions largely depends on the availability of the location and the costs of travelling there. The emergence of low-cost airlines has significantly affected the development of international tourism because air traffic is steering more and more towards mass tourism in order to utilize the capacities to the fullest. Low-cost companies influence the flow of tourism worldwide (Santos and Cincera, 2018). They offer low ticket prices and attract more passengers, and this can be done due to the savings in other business aspects. Low-cost airlines generally use smaller, secondary airports, have fewer crew members, use one airplane type and offer the possibility of booking the tickets online. This all has influenced the forming of such an affordable, low price of their transport services. One of the most famous and successful low-cost companies is by all means Ryanair, an Irish low-cost airline with its headquarters in Dublin which, in 2017, became the first European airline that carried over 1 billion passengers (Ryanair.com., 25/07/2017). Besides Ryanair, some of the low-cost airlines that fly from Croatia are: Germanwings, Wizzair, easyJet, Norwegian, AirBerlin, TUIfly, Aer Lingus, Vueling, Jet2, Smartwings, Transavia, and many of them fly only during the summer months. Croatia is best connected with Germany and Great Britain. However, in the winter months, airline companies stop operating because the lines are not so cost-effective as during the summer when tourism is at its peak. Generally, low-cost carriers have certainly contributed to the development of international tourism by making the travels to certain destinations more affordable to many passengers. Because of the success of the charter initiator, every day there emerge new low-cost airlines on the market, trying to secure their share of the passengers. Such a market situation definitely agrees with the passengers, because, in this competition, lower price is usually used as the differentiator.

For the strategic development of a tourist destination, it is necessary to have a clear strategy of the air transport and the strategy of the access to the air transport. On the other hand, for the airline companies, evaluation and understanding of the business models of the tourist destinations is very important. Mutual development of air traffic and tourism can be divided into 4 phases (Bieger, Wittmer, 2006):

1. Tourism as a neglected trade.

A planned and regular air transport began after the World War I with postal services and services that focused primarily on the business people. But, as early as in the 1930s, with the emergence of bigger planes like DC2 and DC3, free time and tourism became an element of the passenger portfolio.

2. Tourism as an extra trade.

After the World War II, airline companies began to rely more and more on the income from the passengers that relate to tourism.

3. Specialized in tourism.

With the development of larger planes, there appeared a new dimension of tourism and air traffic development. The new generation of the airplanes allowed lower ticket prices due to the realised savings, and the airliners had to focus more on the free time and tourist market to fill new capacities.

4. Tourism and traffic interdependency.

The last phase of the development happened based on the deregulation of the air traffic industry in the 1980s in the United States and in the 1990s in Europe. There appeared a new business model of the airline companies, the charter companies, i.e. the low-cost airlines. With their flights, sometimes using secondary airports, at very affordable prices, this type of air transport attracted a huge number of traffic flows. New forms of tourism, like individual, short-stay tourism, city tourism or visits to friends of family, became the groundwork for the development of new offer in the airline industry.

Also, air transport can be structured according to the business models of the airline companies. Generally, business models of the airline companies can be classified into classic (traditional) carriers, regional, low-cost carriers, and new, specialized carriers for business users. The influence, i.e. the contribution of the air transport to tourism changes in line with the business model of the airline companies. Classic airline carriers mostly generate tourists with the middle-class purchasing power, which is usually a combination of the tourists that travel on business and those who travel for recreational reasons or entertainment. These carriers generally cover large geographic areas and offer many services that differ substantially in price and quality (Tatalović, Mišetić and Bajić, 2012). Regional carriers very often fly at smaller distances. Because of smaller planes they use (20 to 100 seats), they are limited by the number of passengers, but for relatively higher prices of their services, they attract higher-class purchasing power passengers. Low-cost airline companies operate more and more at middle and long distances. This leads to a quantitatively powerful growth of the number of passengers, and consequently the growth in the number of tourists. The appearance of new quality classes on charter planes attracts new passenger segments. Low-cost carriers bring intensive, very flexible and very mixed types of passengers.

Comparing business models of tourist destinations and air carriers, it seems that all business models do not correspond with each other. Researches show that desti-

nations with significant landmarks, like big cities or areas rich in interesting nature resources, mostly use services by classic air carriers. On the other hand, destinations intended for vacation only, without many famous landmarks, provide a good market background for low-cost carriers, like smaller towns in northern Italy (Bieger, Wittmer, 2006). It is important to note that classic airline companies still enjoy the benefits of government subsidiaries and access to large airports (Gržinić, 2018).

2.2. *The analysis of tourism and traffic movement in the Republic of Croatia*

According to the data displayed in Table 1, in the Republic of Croatia, most passengers use road transport. In the period from 2006 - 2016, the domination of the road transport can be explained with a highly developed and wide-spread road network in relation to other types of transport.

Table 1. Carried passengers and traffic of passengers in seaports and airports, 2006-2016 (000)

Year	Railway transport	Road transport	Seawater and coastal transport	Air transport	Traffic of passengers in seaports	Traffic of passengers in airports
2006	46.212	63.576	12.079	2.148	24.535	4.404
2007	63.131	63.144	12.723	2.288	26.296	4.895
2008	70.961	62.064	12.861	2.329	28.282	5.179
2009	73.545	58.493	12.550	2.053	28.257	4.839
2010	69.564	56.419	12.506	1.861	27.565	5.136
2011	49.983	52.561	12.926	2.078	28.292	5.585
2012	27.669	52.293	12.474	1.961	28.095	5.960
2013	24.265	54.292	12.770	1.812	28.791	6.304
2014	21.926	54.000	13.029	1.860	24.711	6.703
2015	21.683	52.126	13.082	1.919	28.513	7.176
2016	20.742	50.423	13.525	2.102	30.983	8.111

Source: Croatian Bureau of statistics (2017). *Statistical Yearbook of the Republic of Croatia 2017*, Zagreb: Croatian Bureau of statistics, p. 351

Likewise, during the period from 2006-2016, there was a drop in all types of transport, which reflected the poor market situation. The least passengers were transported by air carriers, which is a consequence of still not affordable prices and the type of transport. Besides air traffic, a smaller number of passengers used maritime/coastal transport.

In the transport of goods, road traffic is also ahead of the others, which can also be seen in Table 2. Seawater and coastal traffic is the second in line when it comes to transport of goods, but its share dropped significantly in the observed period. On the other hand, during the observed period, the share of transport in the inland water routes increased. Seawater transport, as well as transport in the inland waters certainly

should be areas of development in the future of Croatian traffic, along with the need for connecting road transport with other transport branches.

Table 2. Traffic of goods by mode of transport in Croatia, 2006-2016 (000 t)

Year	Railway transport	Road transport	Seawater and coastal transport	Inland waterway transport	Air transport	Traffic of passengers in seaports	Traffic of passengers in airports
2006	15.395	107.753	31.423	1.509	6	26.326	13
2007	15.764	114.315	32.420	1.468	6	30.097	13
2008	14.851	110.812	30.768	6.415	5	29.223	10
2009	11.651	92.847	31.371	5.381	4	23.377	10
2010	12.203	74.967	31.948	6.928	3	24.329	8
2011	11.794	74.645	30.348	5.184	3	21.862	8
2012	11.088	65.439	25.636	5.934	4	18.972	8
2013	10.661	67.500	24.744	5.823	3	19.366	8
2014	10.389	66.146	20.335	5.377	3	18.603	8
2015	9.939	66.491	21.376	6.642	3	18.930	8
2016	9.985	72.503	20.951	6.409	3	18.551	8

Source: Croatian Bureau of statistics (2017). *Statistical Yearbook of the Republic of Croatia 2017*, Zagreb: Croatian Bureau of statistics, p. 352

Road traffic plays an important role in the transport of goods, and road transport in the Republic of Croatia is also the dominant traffic branch based on the contribution to the development of tourism.

Table 3. Air passenger and cargo traffic in Croatia, 2006-2016

Year	Total passenger kilometers (mln)	Passenger kilometers in international transport	Total cargo carried (t)	Cargo carried in international transport (t)
2006	2.148	1.698	5.637	3.769
2007	2.288	1.796	5.648	3.572
2008	2.329	1.775	5.136	3.369
2009	2.053	1.561	3.828	2.542
2010	1.861	1.418	3.197	2.148
2011	2.078	1.571	3.347	2.230
2012	1.961	1.460	3.567	2.612
2013	1.812	No data	3.246	2.504
2014	1.860	1.373	3.095	2.376
2015	1.919	1.428	2.732	2.112
2016	2.102	1.579	2.591	2.025

Source: Croatian Bureau of statistics (2017). *Statistical Yearbook of the Republic of Croatia 2017*, Zagreb: Croatian Bureau of statistics, p. 361

The data from Table 3 points to the fact that total air passenger transport is dynamic. In other words, air passenger transport from 2006 -2016 dropped by 2.15%, which can be explained by the crisis that emerged in 2008 and 2009, but also by unaffordable prices of this type of transport. In the period from 2013–2016, the number of passengers was rising, which probably correlated with the appearance of low-cost carriers and the growth of their popularity in the Republic of Croatia. Similar situation happened in the international air transport. Table 3 also contains data on air transport of goods in tons in the period from 2006 – 2016. In the observed period, air traffic was declining and, compared to road transport of goods (Table 2), it is evident that the quantity of the transported goods by air transport was drastically less than in the road transport. In 2016, 72,503 thousand tons of goods were transported by roads, while only 2,591 tons were transported by air.

2.3. Influence of low-cost airline companies on tourism

The strong connection of tourism and air traffic suggests that there is also a connection between tourism and low-cost airlines. Low-cost airlines have affirmed themselves on the market as successful exactly because of their capability to adjust to the market. Low-cost carriers entered the European market in the 1990s, after the deregulation of the European airline market, and this meant a dramatic change of the European airline market. Today, there are almost 50 low-cost carriers in Europe flying different routes, and it all started with Ryanair in the summer of 1995. (Reisinger, 2018). Namely, low-cost airlines play an important role in tourism development, since they offer low prices and enable price-sensitive passengers to travel all over the world more often than usual. Air charters have been lately more and more replaced by low-cost carriers. Low-cost carriers are trying to adjust their business models to longer flights, so they could cover all-inclusive travels air charters offer (Rodriguez and O'Connell, 2017). Due to affordable prices, low-cost carriers have provided accessibility to some destinations that could not be accessed before, and in this way, they have directly influenced the development of tourism in those areas. Many customers are attracted by low ticket prices, and it is possible for some low-cost carriers to offer this because they have cut their administration costs by providing only credit card payments (Reisinger, 2018).

Low-cost airlines influence tourism development through three basic characteristics (Vojvodić, 2006):

1. **opening of new markets** – low-cost carriers have enabled access to otherwise inaccessible destinations, and so directly influenced the development of tourism in those areas.
2. **lowered tourism seasonality** – low-cost carriers provide flexibility regarding the travelling period, unlike classic, traditional airlines that have operated mostly during the usual seasons, which has certainly influenced the development of tourism.
3. **traffic stimulation** – low-cost carriers stimulate the use of air transport due to low prices of the service, access to new or stimulated demand, and in so

doing, they influence the growth of tourism directly. They do not relocate tourism from one region to another, but rather create and stimulate its development within the region.

To conclude, tourism has multiple benefits from low-cost airline companies, and by continually lowering the prices due to the competition, low-cost airlines further influence the promotion and development of tourism in certain regions.

3. RESEARCH ON THE ROLE OF AIR TRAFFIC IN THE DEVELOPMENT OF TOURISM IN THE REPUBLIC OF CROATIA

3.1. Overview of the existing research

The topic of the influence of air traffic on tourism in the Republic of Croatia is not enough represented in domestic scientific literature. The first significant paper on the similar subject (Bukvić, 2003) is based on the analysis of the influence of air traffic on tourism development of Dubrovnik area. The paper analysed the number of overnight stays in Dubrovnik area before and after the Croatian War of Independence and the relation of the number of passengers in Dubrovnik airport. Also, the author investigated the structure of the existing tourist capacities as the basis for the evaluation of potential demand in air traffic. By using a simple linear regression model, a positive linear connection between the overnight stays of foreign tourist and international arrivals by plane was established. The Muir model was used to predict future traffic in Dubrovnik airport. With the analysis of the origin of foreign tourists, the issue of decrease in the number of international arrivals was emphasized, as well as the need for connecting with more remote emissive markets that were dominant before the War of Independence.

Gašparović (2011) investigates the topic of interconnectedness of air traffic and tourism in the area of Primorska Hrvatska (coastal Croatia) based on the analysis of the data on the number of passengers in airports and airfields, correlating them to the number of tourist arrivals and overnight stays. The findings confirm the correlation between the number of transported tourists and the the number of arrivals, i.e. the number of overnight stays during the year. Likewise, the existence of high seasonality in the number of passengers in airports and maritime ports was confirmed, along with the fact that most passenger traffic happens during the summer months. The author precisely analyses the data for 2008, 2009 and 2010, when the number of passengers in airports and airfields differentiates by the months in 4 categories: passengers on conventional airlines, low-cost carrier passengers, air charter passengers and general airlines passengers. The paper highlights the growing importance of low-cost carriers in air traffic of coastal Croatia, holding them deserving for expansion of emissive tourist markets. Using the statistical method of linear correlation, the author sees statistical correlation between traffic and tourism, and concludes that air traffic in coastal Croatia is mostly directed towards servicing tourist needs.

Besides the above-mentioned, other authors (Happ, Vidović and Krpan, 2001; Prebežac and Jurčević, 2001; Pašalić, 2001; Perić, Šantić and Perić., 2003; Jurčević, Ma-

dunić and Tolušić., 2006; Mrnjavac, 2006; Horak, 2007; Horak 2014) mainly deal with this topic only partially, i.e., they analyse the topic of interdependence between tourism and traffic only in general terms, without a detailed analysis of the influence of air traffic on tourism. However, most authors point out the existence of interdependence of air traffic and tourism, globally, and in the Republic of Croatia.

Unlike domestic literature, foreign scientific papers often analyse the topic of air traffic and tourism interdependence. One of the most important books is „Aviation and tourism“, edited by Graham, Papatheodorou and Forsyth (2008), which covers the theme of air traffic and tourism correlation. In the book, the authors analyse mutual influence of recreational tourism and influence of air traffic on the environment. The contribution of air traffic to tourism is a topic generally covered by Papatheodorou (2002) and Graham (2006), while other authors (Abeyratne, 1993; Sainz-Gonzalez, Núñez-Sánchez and Coto-Millán, 2011) also analyse the prices of the airline tickets and fees. Furthermore, Lumsdon (2000) studies the sustainable tourism development model and investigates the ways in which negative travelling influences, including air traffic, on environment can be minimized. As an ideal model, he highlights the cyclical, circular tourism for relaxing holidays in a natural environment that does not imply the overuse of means of transport.

There are many authors that deal with the research on the interdependence of air traffic and tourism with the accent on the growing contribution of low-cost carriers (O'Connell and Williams, 2005; Bieger and Wittmer, 2006; Dobruszkes, 2006; Duval, 2007; Davison and Ryley, 2010; Costa, Almeida and Conceição, 2017; Spasojević, Lohmann and Scott, 2017; Stoenescu, 2017; Santos and Cincera, 2018; Pan and Truong, 2018; Virkar and Mallya, 2018).

Bieger and Wittmer (2006) analyse the interdependence of air traffic and tourism, and, due to the appearance of low-cost airlines, define tourism as the stimulator of the changes in air traffic, while air traffic is seen as the carrier of development of new destinations and new forms of tourism. In his paper, Dobruszkes (2006) analyses European low-cost carriers and their networks at the beginning of the 21st century. According to his research, low-cost carriers already occupied a significant place in Western Europe in that period, especially easyJet and Ryanair, and the accession of the 10 new member states to the EU in 2004, automatically opened new air routes, since those are countries with lower living standards, lower salaries and weak representation of low-cost carriers. The accession of the 10 new members will have a great impact on the low-cost airlines' operations in Europe, and their offer will be attractive to the migrants in Northern Europe area. Likewise, from the example of Luton and Stansted airports, the author concludes that the effect of European liberalization bears most significance to the airports, where airport managers no longer have to plan in line with the government guidelines, but rather their goal is to attract airlines to generate profit. The paper also shows the contribution of low-cost carriers in „point-to-point“ travels, which have, since their emergence, been almost neglected by conventional airline companies. O'Connell and Williams (2005) start with the fact that low-cost carriers have changed traditional business model of airline companies and influenced the dynamics of the very industry. Their research of the two contrasting markets, liberalized Europe and non-liberalized

Asia, points to the fact that there are differences between passengers flying with low-cost carriers and conventional airlines, but the attitudes and perceptions of the passengers on both continents are identical. The research findings show that the price-sensitive group of passengers is of younger age and that it is them who are prone to more often choose low-cost carriers for their travels. Furthermore, the results show that reputation, the image of a low-cost airline company, is exceptionally important to the passengers when they choose the airline. Santos and Cincera (2018) analyse demand, low-cost carriers and the role of specific European institutions on the example of Brussels based on the data on the landings in Brussels for the period from 2000 - 2015. European institutions influence the reduction of the air fare costs, especially for business people. The authors have come to the conclusion that low-cost carriers have more modest effect on tourists travelling for business purposes than on the specific case of Brussels. Pan and Truong (2018) have conducted research on passengers' intentions to use low-cost carrier services. The research was conducted on 596 passengers in the two main airports in China. The findings show that the price is the critical factor for decision-making on which low-cost carrier to choose, while the second place is reserved for the quality of the service. The respondents pointed out that low-cost carriers should work on improving marketing activities and service offer.

In his paper, Stoenescu (2017) investigates a new perspective of the relation between air traffic and tourism. He emphasises the existence of several dimensions of the air traffic and tourism relation, those being:

1. Transport represents a significant part of tourism, and so it follows that air traffic represents a significant part of the tourist product.
2. There is a strong connection between air traffic and development of destinations. Low-cost carriers have enabled the arrival of international air transport to regional and secondary airports.
3. Air traffic has significantly influenced the changes in the conduct of a modern tourist.

Spasojević, Lohmann and Scott (2017) made an overview of the existing research for the period from 2000 – 2014 on the interaction of air traffic and tourism. Principally, they emphasise the lack of attention given to the study of their interaction and the fact that many existing researches focus on the analysis of low-cost carriers and tourism correlation, passenger satisfaction and the implications of the long-distance flights. Costa, Almeida and Conceição (2017) analyse the relation between airports and evolution of international peripheral tourism, mostly on the case of international airport in the north of Portugal -Oporto. The results show that Oporto airport has, over the last years, recorded a significant increase of the traffic, which has largely affected the development of international tourism in the nearby area. It was confirmed that the airport itself was the key element of attractiveness in forming this part of Portugal an attractive tourist region. In their paper, Virkar and Mallya (2018) give an overview of key factors of tourist travels that influence their satisfaction. In their conclusion they state the following:

1. Transporting services available to the tourists are generally adapted within the existing public transport offer.
2. Most of the previous researches have in their analysis primarily highlighted the relation between public transport and tourists, while the analysis of the relation with other transport possibilities has been neglected.
3. It is recommended that future researches include motivational variables in their analysis.
4. It would be necessary to also pay attention to measuring important travelling characteristics like time, expenses and ways of choosing means of transport.
5. In literature, there are researches of the relation between the quality of public transport service and tourist satisfaction, but there is no research on satisfaction with other types of transport. It is also necessary to broaden the factors through which the quality of public transport service is evaluated, and it is recommended to observe it through the staff quality, vehicle cleanliness, vehicle fitting and equipment and availability.

3.2. *Methodology of the research*

3.2.1. Research instrument

The respondents filled out the *Survey on the importance of air traffic in the development of tourism in the Republic of Croatia*, created for the purpose of this research, following the conducted foreign and domestic scientific research. The survey comprised of three parts: the first part related to 4 close-ended questions, the second was comprised of 12 statements about airports and air traffic in the Republic of Croatia, where the respondents had to express their level of agreement or disagreement on the 5-point Likert scale (1 = strongly disagree, 2 = disagree, 3 = neither agree nor disagree, 4 = agree and 5 = strongly agree). In the third part, the respondents filled out their socio-demographic characteristics (age, gender, nationality, city and state where they live and the level of education).

The survey was used as the research instrument and the primary research was conducted in September 2017. The survey was posted and filled out online, at the SurveyMonkey platform, and was distributed via social networks and e-mail.

3.2.2. The goal of the primary research

The goal of the research was to establish:

- Ad 1.* the principal reason for travelling within the territory of the Republic of Croatia;
- Ad 2.* most common used means of transport for travelling in the Republic of Croatia;

- Ad 3.* airports in the Republic of Croatia that the respondents have visited on their travels;
- Ad 4.* the respondents' perceptions on air transport in the Republic of Croatia;
- Ad 5.* advantages of air transport in the Republic of Croatia;
- Ad 6.* whether there are differences in the attitudes of the respondents on airports and air transport in the Republic of Croatia according to the socio-demographic characteristics of the respondents.

3.2.3. Respondents sample

194 respondents participated in the research and their structure is presented in Table 4 in more detail.

Table 4. The structure of the respondents based on their socio-demographic characteristics

Socio-demographic characteristics of the respondents		N	%
Age	under 18	74	38.1
	18 to 25	72	37.1
	26 to 35	28	14.4
	36 to 45	15	7.7
	46 to 55	5	2.6
	over 56	0	0.0
	TOTAL	194	100.0
Gender	male	48	24.7
	female	146	75.3
	TOTAL	194	100.0
Level of education	no school qualification/unfinished primary school	0	0.0
	finished primary and secondary education	0	0.0
	finished vocational school, higher vocational school, a three-year secondary school	5	2.6
	finished higher vocational school or gymnasium (4 years)	38	19.6
	student	49	25.3
	higher expertise (college), high expertise (university)	92	47.4
	Master's or Doctoral degree	10	5.2
	TOTAL	194	100.0

Source: own research

In line with the acquired answers, most respondents, 38.1%, are younger than 18, 37.1% are between 18 and 25, and 14.4% are between 26 and 35, which shows that the respondents were mostly from the younger age group. Table 1 also displays the gender structure of the respondents;

75% of them are female, and 25% male. Regarding educational level, most respondents, 47.4% of them, have higher education (a college or a university degree). Likewise, a significant percentage of the respondents, even 25.3%, are still studying, while the share of the respondents with a finished three-year secondary school is only 2.6%.

3.3. Research results and discussion

3.3.1. Research results on transport behaviour

The survey opened with a group of questions that give insight into the most common reasons for travelling inside the Republic of Croatia, the most commonly used means of transport on those travels and what airports the respondents had visited in the Republic of Croatia.

The first question aimed at establishing the most frequent motif, i.e. the reason why the respondents opt for travelling within the territory of the Republic of Croatia. According to the findings, most respondents, almost 74.7% travel to go on holiday or for entertainment, while the fewest respondents, only 2%, travel for some other, subjective reasons, like conferences, university obligations etc. Furthermore, only 5.7% of the respondents travel for work. The findings point to the fact that in Croatia, people travel the least because of work, which can be correlated with the poor situation on the labour market. The second question related to establishing the main means of transport for travels inside the Republic of Croatia. Most respondents, 77.8% answered that they most often use automobiles for those travels. After the automobiles, most commonly used means of transport, according to the research, is the bus (20.1% of the respondents). These answers only confirm the fact that the road transport in the Republic of Croatia is the most dominant, the most developed and the most used traffic branch, but it is also the most affordable to all. 1.00% of the respondents travel by train; while the fewest respondents answered they travelled by plane or a ship, only 0.5%. The share of respondents travelling by plane within the territory of the Republic of Croatia is disappointing, and it suggests that this type of transport is still well under-used and poorly accepted, which is probably a consequence of the discrepancy between the price of the transport and the standard of living. An equally low percentage of respondents that travel by ships can be explained with the fact that most respondents use ships in the summer months to reach the islands, i.e. tourist destinations on the Adriatic coast.

With the third question, the researchers tried to establish which of the seven Croatian airports is most frequented. The findings show that respondents often use more than one airport; most frequented is Zagreb airport, visited by 88.1% of respondents, then there is Dubrovnik (19.1%), Split (16.5%) and Zadar (13.4%). The smallest number of respondents visited Osijek airport, only 1.5%. The acquired results point to the fact that the assumption on the correlation between tourism and air traffic is correct. Namely, airports that have been visited by most respondents are situated in the most developed and important tourist destinations of the Republic of Croatia. Zagreb airport is absolutely the leading one, and besides being the capital city of Croatia, it is also the country's most prominent continental tourist destination.

3.3.2. Research results on the perception of respondents about the importance of air traffic for the development of tourism

Table 5 shows the descriptive statistics of the statements about the importance of air traffic in the development of tourism in the Republic of Croatia.

Table 5. Descriptive statistics of the statements

Statements	x	SD
If the prices of the airplane tickets were lower, I would use this means of transport more often.	4.45	.987
If the competition for a specific destination would be higher, ticket prices would be significantly reduced, which would motivate me to travel.	4.20	1.004
The number of the subsidized tickets should rise in the future.	4.11	1.048
If there were more low-cost carriers in Croatia, I would use this means of transport more often when I travel within the territory of Croatia.	4.08	1.028
I find it justified that some tourist destinations subsidise the plane tickets for their residents.	4.05	1.012
If there were more airline companies in Croatia, I would use this means of transport more often when I travel within the territory of Croatia.	3.54	1.166
I think that reintroduction of seaplanes would influence more frequent air travels for getting to the tourist destination.	3.53	1.003
If there were more airfields on the islands, I would visit the destinations I would otherwise probably never (due to very long distance or high prices).	3.44	1.283
If airline companies in Croatia would offer transport by the most modern and safest airplanes, I would use this means of transport more often when I travel within the territory of Croatia.	3.28	1.202
If there were more airline routes in Croatia, I would more often use air transport when I travel.	3.11	1.257
If airline companies in Croatia paid more attention to protecting the environment, I would use this means of transport more often when I travel within the territory of Croatia.	3.01	1.178
If there were more airports in Croatia, I would more often use air transport when I travel.	2.75	1.313
TOTAL	194	

Source: own research

By observing the Table, it is evident that respondents expressed their highest level of agreement for the statements relating to the airline ticket price: *“If the prices of the airplane tickets were lower, I would use this means of transport more often ($x=4.45$, $SD=.987$); “If the competition for specific destinations would be higher, ticket prices would be significantly reduced, which would motivate me to travel” ($x=4.20$, $SD=1.004$); “The number of the subsidized tickets should rise in the future” ($x=4.11$, $SD=1.048$); “If there were more low-cost carriers in Croatia, I would use this means of transport more often when I travel within the territory of Croatia” ($x=4.08$, $SD=1.028$) and with the statement “I find it justified that some tourist destinations subsidise the plane tickets for their resi-*

dents” ($x=4.05$, $SD=1.012$), and the lowest level of agreement with the statement “*If there were more airports in Croatia, I would more often use air transport when I travel*” ($x=2.75$, $SD=1.313$). In order to ascertain the respondents’ estimates in more detail, a factor analysis was conducted by the method of the main components with the *Guttman-Kaiser* criterion and a varimax rotation. With the data analysis, three factors with the characteristic root over one (*Guttman-Kaiser* criterion) were extracted, which together explain 66.232% of the variance. It is important to note that the lowest and the highest results of all particles ranged from 1 to 5. Table 6 shows the matrix of the factorial structure.

Table 6. Matrix of the factorial structure

FACTORS AND PARTICLES	FACTOR LOADINGS		
	1	2	3
1. AIRPORTS AND AIRLINE COMPANIES			
If there were more airports in Croatia, I would more often use air transport when I travel.	.856		
If there were more airline routes in Croatia, I would more often use air transport when I travel.	.790		
If airline companies in Croatia would offer transport by the most modern and safest airplanes, I would use this means of transport more often when I travel within the territory of Croatia.	.775		
If there were more airfields on the islands, I would visit the destinations I would otherwise probably never (due to very long distance or high prices).	.690		
If airline companies in Croatia paid more attention to protecting the environment, I would use this means of transport more when I travel within the territory of Croatia.	.684		
If there were more airline companies in Croatia, I would use this means of transport more often when I travel within the territory of Croatia.	.598	.499	
I think that reintroduction of seaplanes would influence more frequent air travels for getting to the tourist destination.	.527		
2. AIRLINE TICKET PRICE			
If the prices of the airplane tickets were lower, I would use this means of transport more often.		.865	
If there were more low-cost carriers in Croatia, I would use this means of transport more often when I travel within the territory of Croatia.		.820	
If the competition for a specific destination would be higher, ticket prices would be significantly reduced, which would motivate me to travel.		.799	
3. AIRLINE TICKET SUBSIDIES			
I find it justified that some tourist destinations subsidise the plane tickets for their residents.			.933
The number of the subsidized tickets should rise in the future.			.902

Source: own research

As evident in Table 6, the acquired factors could be best described as: (1) *airports and airline companies*, (2) *airline ticket price* and (3) *airline ticket subsidies*. The reliability of the obtained subscales, tested with Cronbach's Alpha coefficient, is satisfactory. The reliability for the statements relating to the factor *airports and airline companies* is .856. The statements that relate to the 2nd factor, i.e. *the airline ticket price factor*, have the reliability of .828, while the reliability for the statements relating to the 3rd factor, i.e. *airline tickets subsidies*, is .873.

3.4. *Limitations and recommendations for further research*

From the analysis of the research conducted on the sample of 194 respondents of younger age, mostly female and with high level of education, it is possible to conclude that it is a highly price-sensitive group of consumers regarding the price of airline tickets when travelling within the territory of the Republic of Croatia. The research has also shown that the respondents use air transport possibilities very rarely for their travels inside the borders of Croatia, and that they would change that if the airline ticket prices were lower and if the low-cost carriers would have more presence on the Croatian market. Observing the results of the research, the existing limitations should be certainly taken into account. The main limitation of the research relates to the sample of the respondents. Namely, the research was conducted on a random sample of respondents, which, as it has proved, do not use air transport often on their travels within the territory of Croatia. Likewise, the acquired results cannot be generalized on an international level, since the research had the goal of establishing the role of air traffic in the development of tourism in the Republic of Croatia. Due to the established limitations and shortcomings of the conducted research, future research on these and similar topics should be conducted on a targeted sample of respondents who use air transport more often on their travels within the territory of Croatia.

4. CONCLUSION

Interdependency of traffic and tourism is indisputable, and therefore, today, it is widely believed that they are, analytically, two inseparable phenomena. In the Republic of Croatia, traffic and tourism are initiators of economic growth, so there are attempts to coordinate them on the basis of sustainable development in order to eliminate potential drawbacks.

Likewise, traffic and all its branches can also be seen as influential factors in the tourism development of every country, the Republic of Croatia alike. Air traffic, being the youngest traffic branch, plays a very important role in tourist flows worldwide and its significance is continually growing, since it provides people with the possibility of a quick and affordable travel, which enables them to visit a number of tourist destinations. In other words, air traffic is responsible for the development of international tourism and globalization process in tourism. But, in order for the traffic to provide tourism with all its benefits, it is necessary to ensure a balanced development of traffic branches within a specific economy.

Based on the conducted research, it has been established that in the Republic of Croatia, road traffic still is the dominant branch for those who plan the trip in the country. Air traffic for travellers within the country is not so popular for different reasons. Namely, due to poor living standard, high unemployment rate and poor development in general, the population is very price-sensitive and is primarily guided by the lowest prices possible when choosing the means of transport. Air traffic undoubtedly contributes to tourism development in the Republic of Croatia, especially in the coastal region, however, this contribution can be intensified with the presence of more low-cost airlines and with lower ticket prices and/or more subsidies for the airline tickets.

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RESEARCH OF THE CUSTOMER SATISFACTION WITH RETAIL PETROL STATION SERVICES

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Abstract

The purpose of the paper is to investigate total customer satisfaction with petrol station services. Through a literature review, a theoretical framework has been provided to help create a survey questionnaire aimed to addressing the determinants of total satisfaction when purchasing at petrol stations. Customer satisfaction is a long-term process founded on thorough research on customers' problematic, behavioral and customer preferences, as well as quality-led customer relationship management. The research was conducted in April, 2015, at two anonymous gas stations, and the respondents were exclusively Croatian speakers. The questionnaire survey included 990 respondents, and the survey results show that 93% of respondents were extremely satisfied during their purchase at the observed petrol stations. Further results point to the deficiencies of certain determinants such as customers' dissatisfaction with prices, working hours of the petrol stations and impolite staff. The foregoing findings are the basis for creating practical implications that will help shape a business strategy whose goals are to fully meet customer needs and capture new market segments.

Key words: Customer satisfaction, customer relationship management, quantitative research

1. INTRODUCTION

One of the business activities of an anonymous petrol station is the retail trade of petroleum products through the retail petroleum chain stores. In today's markets, it is hard to retain customers, and the petrol retail industry is no different from other examples. The core of quality of service needs to be examined through the scope of switching costs (Blut et al., 2014).

In today's market of increasing competition, quality of service is still fundamental and hidden opportunity and source of competitive advantage as well (Ostrom et al., 2015). Many agree that excellent customer service is the right way to increasing the market segment, increase revenues and profits, and thus the foundation for a long-term success (Ostrom et al., 2015; Blut et al., 2014; Tipurić and Markulin, 2002). On the other hand, only 4% of customers complain about some form of service if they are not com-

pletely satisfied, but in average they share their dissatisfaction with as much as 20 other customers.

Those dissatisfied customers engage in the process of searching for a new product or service provider (Blut et al., 2014). They are only limited by the switching costs which, according to Blut et al., can be divided in three categories:

- 1) *Financial switching costs* – most common case is the fee one must pay to break a contract,
- 2) *Procedural switching costs* – the amount of time, effort and uncertainty which are needed to locate, adopt and start using a new provider, and
- 3) *Relation switching costs* – which take into consideration the emotional aspects such as personal relationships and identification with a brand and employees.

Also, customers report that the most common reason for the termination of further purchases is dissatisfaction with the sales staff behavior. This is true in 68% of cases.

So, the purpose of this paper is to analyze and present customer satisfaction level of the Croatian speaking customers at the observed petrol station. Furthermore, some other satisfaction features will be questioned in order to try to analyze which of these features trigger total customer satisfaction the most. For this purpose, the quantitative data analysis will be conducted. The customers will be questioned during their time at the petrol station, and will be approached while paying.

Survey will collect data on the quality of service provided and the behavior of the retail staff at the petroleum retail chain stores of the anonymous company observed in this research paper. The aspects included in the service quality questionnaire were adopted from various researchers (Terpstra and Verbeeten, 2014; Fornell et al., 1996; Anderson, Fornell and Lehmann, 1994; Barsky and Labagh, 1992), and were translated into Croatian language.

2. CUSTOMER SATISFACTION

2.1. *Defining the customer satisfaction*

Since the customer satisfaction is a term in the domain of subjective nature, it is necessary to define it more closely. Following previous statement, we can assume that the process starts with the opinion that customers have about the company, and that they compare that opinion to their expectations while using a particular product (Anderson, Fornell and Lehman, 1994).

Every company tries to achieve the highest level of customer satisfaction as possible which ultimately results in customer loyalty towards the company, brand and product itself. Loyal customers then tend to re-purchase companies' products which leads to repeatable business model (Osterwalder and Pigneur, 2010).

Customer satisfaction can be directly related to the quality of the product, the relationship between the enterprise and the customer and the price of the product as

well. A very important factor in the product price definition is overestimation and underestimation of the product prices due to the non-elastic feature of the product of the price itself (Cronin Jr., Brady and Hult, 2000).

The customer satisfaction research is one of the most important segments of the market research, and it is considered as the highest echelon of the market research, primarily because of its result applications. Customer satisfaction can be observed as (Fornell et al., 1996). :

- **A *strategic asset*** which helps determine how the companies' resources have to be allocated in order to achieve competitive advantage
- **An *operational tool*** which helps determine business processes and answers how to improve them
- **A *public relations tool*** which helps company create a positive communication and content about the quality of their product and customer satisfaction
- **A *means of motivation and leadership*** that empowers employees and gives them firm and tangible feedback which then gives them strength and incentives in their further efforts
- **Auditing** for company's performance evaluation features such as customer orientation, which ultimately effects the financial result and market position.

The client satisfaction research project can be presented as a process consisting of the following stages (Ismail et al., 2006):

- Defining the dimension of satisfaction value
- Defining features for each dimension of value
- Measuring the performance of features for each dimension of value
- Determining the meaning of particular features for each dimension
- Determining the meaning of individual dimensions in context of customer satisfaction
- Defining the customer satisfaction index.

Customer satisfaction Index (CSI) is the most popular customer satisfaction measure:

- Many companies present this feature in their financial reports because of its importance
- It is a cumulative customer satisfaction indicator measured by the company and tracked over defined period of time
- CSI is easy to understand and similarly to some financial indicator it is presented as a rate in a percentage format
- The justification lies in continuous monitoring and presentation, which enables higher probability for a long-term success (Johnson et al., 2001).

2.2. Customer relationship management

Customer relationship management has been widely regarded as a set of methodologies and organizational processes to attract and retain customers through their increased satisfaction and loyalty (Coussement, Benoit and Van den Poel, 2010; Gibbert, Leibold and Probst, 2002). The main CRM processes involve acquiring customers, knowing them well, providing services and anticipating their needs (Gebert et al., 2003). From a technological perspective, CRM systems are information systems that enable organizations to contact customers, provide services for them, collect and store customer information and analyze that information to provide a comprehensive view of the customers (Kardaras Karakostas, and Papathanassiou, 2003). CRM systems mainly fall into three categories (Kardaras Karakostas, and Papathanassiou, 2003):

Operational CRM systems aim to automate CRM processes to improve their efficiency and productivity. Customer service and support systems (e.g., call centers), sales force automation (e.g., point of sale systems) and marketing automation belong to this category.

Analytical CRM systems provide a better understanding of individual customers' behaviors and needs. They facilitate customer behavior predictive modeling and purchase pattern recognition. This category incorporates various analytical tools such as data mining, data warehouses and online analytical processing.

Collaborative CRM systems manage and integrate communication channels and customer interaction touch points. Company websites, e-mail, customer portals and video/web conferencing are examples of collaborative systems.

Customer relationship management (CRM) is a business strategy based on the "*Customer is the king*" philosophy which indicates that the customer is placed in the center of process. With the development of information technology in the past twenty years, customer relationship management has undergone through some major changes. Today, it is formulated that the customer is a modern dictator to whom the company constantly adjusts its operations due to the increasing availability of information, growing competition, and negotiating power of customers in the sales process. The most important task of the company is to satisfy the needs of the customers, which ultimately results in customers' long-term loyalty to the company. High revenues and profits are only possible if customer needs are completely met (Chen and Popovich, 2003).

Other uses of CRM were also explored by various authors, such as Karakostas et al. (2005), and they studied the CRM as a system in which everything evolves around analytics. They described how such systems were used to acquire customer knowledge internally, about existing customers, and externally, about prospective customers. Karakostas et al. (2005) studied CRM from the strategic perspective, where the fundamental contribution comes through process improvements. The aforementioned authors also addressed the question of how those tools support communication and business-to-customer interactions.

2.3. Implementation of the customer relationship management

Customers' needs cannot be assumed, they must be systematically monitored and researched in order for the company to gain the necessary inputs for customer satisfaction improvements. The most important role in this process is customer relationship management. CRM creates business practices and processes that increase business performance, identifies value parameters for existing and potential buyers, and offers tools to develop a business culture focused on providing maximum value to customers. In today's business practices, employees and customers represent the company's most valuable assets. They are not a homogenous bunch that only generates company revenue. They are smart, informed, and they know very well what kind of quality of product and services they want. All of it results in high expectation during every product purchase (Bull, 2003).

The implementation of enterprise technology, such as CRM, requires changes to organizational culture (Al-Mashari and Zairi, 2000). While both technology and business processes are critical for successful CRM initiatives, the individual employees are the ones who are the building blocks of customer relationships. There are several underlying dimensions surrounding management and employees that successful CRM implementations require.

Top management commitment is an essential element for bringing an innovation online and ensuring delivery of promised benefits. Top management commitment, however, is much more than a CEO giving his or her blessing to the CRM project. Customer-centric management requires top management support and commitment to CRM throughout the entire CRM implementation. Without it, momentum quickly dies out.

Furthermore, top management should set the stage in CRM initiatives for leadership, strategic direction and alignment of vision and business goals (Herington and Peterson, 2000). META Group Report (1998) singled out top management support and involvement as a key success factor for CRM implementations.

Management involvement is far more critical since the human-centric approach in developing every product or service specifies that each of enterprises customers is an individual with specific set of needs and expectations, and the success of the company's relationship with its customers is reflected in the fulfillment of their desires at the right time, through the right channel and with the right offerings. That success depends on the successful functioning of business philosophy and culture. CRM is basically a company's business strategy that is implemented through people, processes and information technology. The tool used to achieve the goals of this strategy is CRM technology. Companies that do not possess smart, continuous and active CRM system have difficulties accessing complete customer profiles, recognition of customer demands and challenges, and ultimately the fulfillment of their needs (Bull, 2003). CRM integrates marketing, service and sales strategies that requires the synergy of all operating departments of the company.

The CRM core consists of the following processes (Teo, Devadoss and Pan, 2006):

- Identification of customers,
- Differentiating customers according to their needs and values they create for the company,

- Efficient and effective interaction with customers,
- Customization of some of the products and services offered to customers.

3. EMPIRICAL RESEARCH ON CUSTOMER SATISFACTION

3.1. Procedure and application

In preparing this research, in order to answer hypothesis and present the main objectives, different methods as methods of analysis, comparative methods, methods of description, as well as methods of secondary research and empirical research will be used.

Selected literature will include domestic and foreign authors who are experts in the customer satisfaction research domain. The empirical research will be conducted on primary data. It will be designed as descriptive analysis of the data, formulated in the simple table of absolute and relative frequencies and graphical analysis (structured columns) of the frequency distribution.

The sample size will be large, over 1.000 randomly chosen buyers at petrol retail station, and it will be applied the language criteria, so the customers which do not speak Croatian will not be included in the research.

Data for measuring customer satisfaction information will be collected during customers purchase in the petrol retail store. Their satisfaction preferences will be examined, such as politeness of the personnel working at the petrol station, design of the workspace of the petrol station, speed of service, tidiness etc.

Furthermore, information in the form of gathered data will be analyzed in various ways according to the needs of the company's research department or the decision maker. Customer satisfaction is measured through methodologically conducted questionnaire survey in order to find out if the product or service provider (company) meet the customer requirements and whether there is a need for improvements.

In the preparation of the customer satisfaction questionnaire, it is necessary to include several dimensions of companies' core business. Top level management must be the driving force in addressing needs to measure customer satisfaction. They make key decision in customer satisfaction measurement, and they also approve the final version of the questionnaire. Companies which aim to satisfy the needs of their customers and set that as their priority goal can significantly increase their customer loyalty and customer retention rate.

The most important thing in measuring customer satisfaction is the involvement of all employees of the company, so that every employee is involved in the customer satisfaction improvement process. Also, the information about customer satisfaction measurement must be communicated to the customers directly and indirectly throughout all the channels in order to address the company's ambition to improve its products and services for their respected customers.

For the above-mentioned purposes, the questionnaire survey was conducted for data gathering. The questionnaire consisted of 10 statements, nine of which presented

each satisfaction segment for themselves, and then conclusively was measured the cumulative service satisfaction.

3.2. Research application

The research was conducted during April of 2015 and 1.550 customers were successfully approached by the sales personnel for the purposes of filling out the questionnaire. Respondents were Croatian speaking people buying all types of gasoline and diesel fuels. 63.9% of 1.550 respondents filled the questionnaire completely, which was the total sample count of 990 customers. After they were collected, the data were analyzed for the purposes of this research paper using the SPSS v. 21 software.

3.3. Research hypothesis

Customer feedback retrieved at the petrol retail chain stations will help in detecting strong and weak points of customer service at the petrol retail stations. Since customers cannot quite distinguish between good and bad service at the petrol stations, and since they go there only if necessary, we will try to find out the minimum satisfactory level for customers when buying at petrol stations.

For those purposes, the first hypothesis is listed below:

H1... At least half (50%) of the respondents is very satisfied with the cumulative service at the observed petrol station.

Following, since general satisfaction doesn't reveal all the information, customers were asked about some specific customer satisfaction segments. The authors' attitude was that the customers would most likely be unsatisfied with the politeness of the staff and with the working hours of the petrol station. The authors' attitude comes from everyday engagement in business operation of the petrol station, so those were the segments mainly observed and underlined as potentially low scored segments in the research.

Therefore, the hypothesis addressing the above-mentioned concerns are listed below:

H2a... At least half (50%) of the respondents is very unsatisfied with the working hours of the petrol station.

H2b... At least half (50%) of the respondents is very unsatisfied with the politeness and kindness of working staff at the petrol stations.

With regard to the defined research objectives and hypothesis, an instrument in the form of research questionnaire for the following content and format was created. The instrument is shown below.

Dear Customers, please rate the intensity of your perception for the following statements. 1 – Indicates that you are completely unsatisfied with the segment within the statement; 5 – indicates that you are completely satisfied with the statement regarding the quality of service and customer experience.

Table 1. Survey questionnaire

	NOT SATISFIED AT ALL		COMPLETELY SATISFIED		
Location of the petrol station	1	2	3	4	5
Design of the petrol station	1	2	3	4	5
Working hours of the petrol station	1	2	3	4	5
Staff politeness	1	2	3	4	5
Staff tidiness	1	2	3	4	5
Speed of service	1	2	3	4	5
Supply of products in the petrol station	1	2	3	4	5
Product prices	1	2	3	4	5
Product quality	1	2	3	4	5
Cumulative service satisfaction	1	2	3	4	5

Source: Authors’ work

3.4. Research results

After conducting the research, the data analysis focused on the descriptive statistic segment was conducted. Main results were presented in the percentage distribution frequency table in order to determine the acceptance or rejection of the previously formed hypothesis.

The values were grouped in three sections, ‘not satisfied at all’, ‘nor dissatisfied nor satisfied’ and ‘completely satisfied.’ The table 2. shown below sums up the percentage frequencies of the conducted research.

Table 2. Relative frequency distribution table of the empirical research

	NOT SATISFIED AT ALL	NOR DISSATISFIED NOR SATISFIED	COMPLETELY SATISFIED
Location of the petrol station	4%	5%	91%
Design of the petrol station	2%	4%	94%
Working hours of the petrol station	6%	12%	82%
Staff politeness	5%	4%	91%
Staff tidiness	1%	4%	95%
Speed of service	5%	4%	91%
Supply of products in the petrol station	2%	5%	93%
Product prices	4%	15%	81%
Product quality	5%	1%	94%
Cumulative service satisfaction	3%	4%	93%

Source: Authors’ work

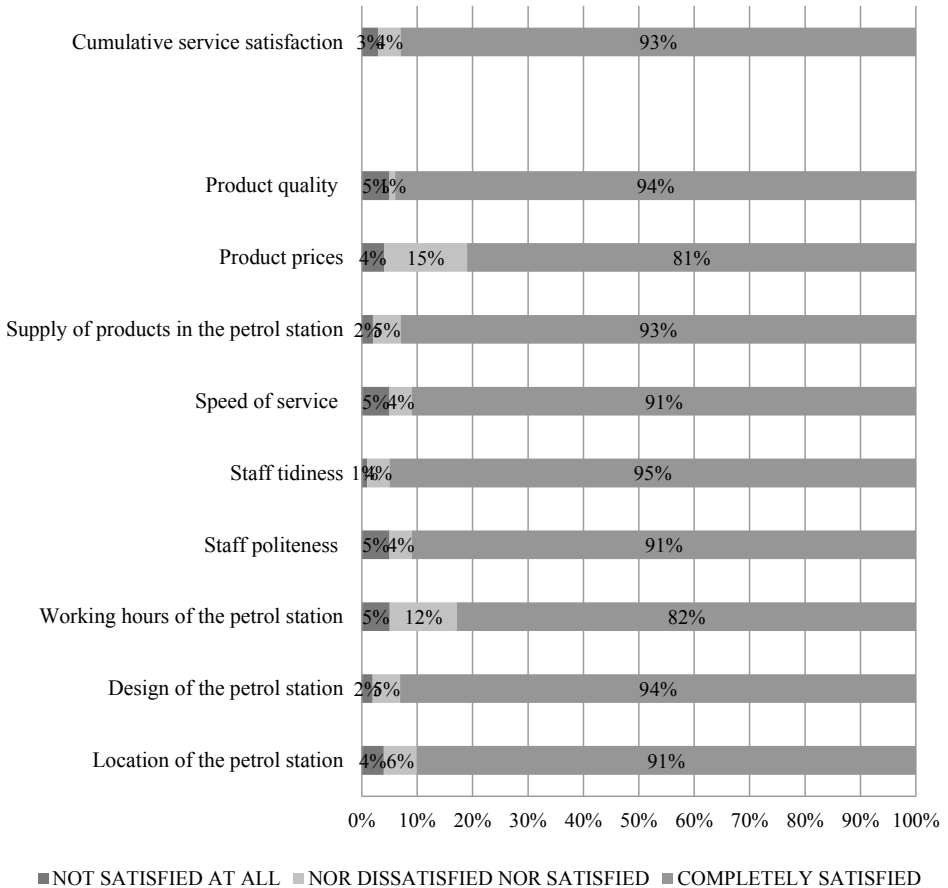
The research analysis points out that 93% of the respondents was completely satisfied with the cumulative service at the observed petrol stations. These results point out that there is enough evidence to support the hypothesis H1.

Also, more than 80% of the respondents stated that they were very satisfied with the working hours of the petrol retail station. These results were not expected, but supply enough evidence to reject the hypothesis H2a.

When questioning the politeness of the staff, more than 90% of respondents was very satisfied with the staff politeness and kindness, which provides evidence to reject the hypothesis H2b.

The highest satisfaction rate was the one concerning the tidiness of the working staff at the petrol stations, followed by the design of the petrol stations. The least satisfaction segments were the price range of the products and services at the petrol stations.

Figure 5. Percentage columns of the customer satisfaction segments.



Source: Authors

3.5. *Success Matrix*

The dimensions of the values concerning the customer satisfaction such as staff service and product supply on the petrol stations of the company are listed below:

1. Staff kindness;
2. Price of the products;
3. Working hours of the petrol stations;
4. Design of the petrol station.

Priority I = Staff kindness (The staff has shown the required level of kindness and courtesy, although, further improvements of the quality of sales staff services can be achieved through internal and external workshops and seminars).

Priority II = Product prices (The perceived customer satisfaction with the price of the products is relatively low. The main reason for the fuel price rise over recent weeks is the rise in oil prices on international markets, resulting in increased fuel prices at retail gas stations on the domestic market).

Priority III = Working hours of the retail chain petrol stations (Possible higher impact on the value dimensions of customer satisfaction. At a certain point, the company plans to extend the working hours by initiating another shift on Sundays and holidays).

Priority IV = Design (appearance) of the retail chain petrol stations (Assumed lower impact on value dimensions of the customer satisfaction. Satisfactory degree of layout and the orderliness of the sales points have been detected by analyzing customer satisfaction questionnaires, so the company should try to maintain and improve this level of satisfaction with the design (appearance) of the retail chain petrol stations.

4. CONCLUSION

The main purpose of this research paper was to measure customer satisfaction with sales staff and product quality at retail chain petrol stations of the company. By using several methods of statistical analysis, the research goals were achieved and the hypotheses were also tested.

The analysis of the research results shows a high degree of customer satisfaction among some segments of service, as well as with the cumulative service satisfaction at retail chain petrol stations. Respondents are most satisfied with kindness and courtesy of the staff, quality of the product and the design (appearance) of the petrol stations. Least satisfaction segments are product pricing and working hours of the petrol stations. These results reflect the specificity of sales at petrol stations, characterized by the price of the product (fuel). Dissatisfaction with the product prices lies in the economic situation of the petrol market. Petrol prices have risen in recent weeks due to the rise of prices on international markets. Compared to the end of January, when fuel was at the lowest price, new petrol market trends now indicate that the tank price of 50 liters of

Eurosuper 95 fuel has increased by HRK 88.5. Petrol prices in the world have been stagnating over the last two weeks (ranging between \$65 and \$66 per barrel). At the same time, US dollar to Croatian kuna exchange rate is expected to decrease in the following period of time, which will affect petrol market prices in the next few weeks, decreasing the prices for a few Croatian lipas per liter.

On the other hand, the positive characteristics of the petrol station supply need to be furtherly developed and improved, which means that it is necessary to invest in staff because their speed, neatness and courtesy are the basic elements of customer satisfaction at the retail chain petrol stations.

5. LITERATURE

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E-COMMERCE

GENERATION Z: THE NEW ERA OF BRICK-AND-MORTAR STORES *

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Abstract

Unlike the earlier generational cohorts of Baby Boomers, Generation X, and Generation Y, the Generation Z (known as post-millennial generation) is still under-researched topic in the context of their retail-related behaviour. Although there are notable distinctions between the generations, it can be argued that each generational cohort affects the way traditional brick-and-mortar retailers do business. In addition, traditional retail is facing increasing competition, particularly from online retailers. Furthermore, shopping habits strongly reshape the retail industry, so brick-and-mortar retailers need to adapt their strategies to meet the requirements of today's rapidly changing consumers. Drawing on the previous literature, the purpose of this paper is to identify the main features of the post-millennial generation in brick-and-mortar retail settings. Furthermore, the paper develops a framework that can both guide future research and help traditional brick-and-mortar retailers to better target the post-millennial generation. As far as traditional retailers are concerned, approaching properly Generation Z cohort seems to be essential to capture this market segment more effectively and to improve their overall in-store shopping experience.

Key words: brick-and-mortar retailers, Generation Z, consumer behaviour, smart technologies

1. INTRODUCTION

It is generally accepted that experiences shape our behaviour and influence our personality. In that context, generational cohort theory posits that each generation is characterised by somewhat predictable traits directly attributable to events in their formative years (Benckendorff and Moscardo, 2013:135). Similarly, Parment (2012) notes that generational cohorts are distinguished by different events and experiences that produce a change in their values, attitudes and predispositions in a society. More specifical-

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ly, Lantos (2011) emphasizes that a generation experiences a common social, political, historical, technological, and economic environment as well as a similar significant, defining, or formative life events. As a result, such an environment together with accompanying events affect their consciousness and collective behaviour (Martins et al., 2012) and create values that remain relatively unchanged throughout their lives (Schewe and Meredith, 2004).

Consequently, Glass (2007) states that members of all generations experience defining events between the ages of 5 to 18, which affect their outlook on life and work. Moreover, Cohler and Hostetler (2003) stress that these events may change their outlook on life due to subsequent historical and social change taking place across the adult life. Furthermore, Benckendorff et al. (2010) emphasize that this distinctive and unique pattern of values, attitudes and behaviours has important implications for how a generation will respond to, and create changes in, social and economic context. According to McCrindle (2014), many of generational labels can be applied globally because generational commonalities cross global boundaries.

Although there are notable distinctions between the generations, it can be argued that each generational cohort affects the way traditional brick-and-mortar retailers do business. Increasingly, Generation Z is emerging as a topic of interest in the recent academic and practitioner literature. As stressed by Moschis et al. (2000), age groups must be understood for their specific needs and situations as consumers, and this is particularly true for Generation Z. However, contrary to other generational cohorts, not much is known about Generation Z in the retail context. Therefore, it is crucial for retailers to develop a solid understanding of Generation Z members and to communicate with them.

To advance understanding of Generation Z consumers in the retail environment, the paper presents the results of an extensive review of the recent literature on Generation Z members and their consumer-related behaviour. The purpose of this paper is to explore the concept of generational cohort referred to as Generation Z and its implications for the brick-and-mortar retail and to determine a framework for classification and analysis. To this end, the paper is structured as follows. Following the introduction, Generation Z is defined in the second section. The third section examines Generation Z in the physical retail environment. The fourth section deals with directions of future research on Generation Z, particularly in the context of smart innovative technologies. Finally, some conclusions are drawn in the last section.

2. DEFINING FEATURES OF GENERATION Z

Although there is no consensus about the precise boundaries of Generation Z, this generational cohort is made up of individuals born between the years 1995 and 2010 (White, 2017) and therefore can be aged ranging from 8 and 23 years old today in 2018. However, scientists have also indicated other time intervals associated with post-millennial generation, e.g.:

- 1992-2008 (Talbott, 2013),
- 1994-2004 (Pollack et al., 2013),
- 1995-2012 (Aird, 2015),
- 1996-2010 (Fromm and Read, 2018; Monaco, 2018),
- 1995-2004 (McDonald, 2011),
- 1995-2009 (Madden, 2017; Kuijer, 2011), and
- 1999-2010 (Patranabis, 2012).

A number of terms have been used to describe the last generation of the twenty-first century such as:

- “I” *Generation* (Fyock et al., 2013),
- *Digital Generation* (Singh, 2012),
- *Pivotals* (Fromm and Read, 2018),
- *the Über Generation* (Koulopoulos and Keldsen, 2014),
- *Digital Natives* (Patranabis, 2012),
- *the “text generation”* (Murgatroyd, 2011),
- *the September 11 generation* (Pollack et al., 2013),
- *the post 9/11 generation* (Neckermann, 2015),
- *the net generation* (Kuijer, 2011),
- *the virtual generation* (McLaren et al., 2011),
- *Generation V* (Tharp, 2014),
- *generation me* (Glass, 2007),
- *the “adaptives”* (Beckwith, 2004),
- *the Google Generation* (Gunter et al., 2009),
- *hyper-connected generation* (Haddouche and Salomone, 2018), and
- *instant-gratification generation* (Rota, 2017).

Apart from birth years, generation cohorts are influenced by different events that took place in their early childhood. Likewise, Rees Jones et al. (2008:33) outline that exposure to key historical events that take part during each cohort’s transition to adulthood provides the markers for each generational field. In that sense, Pandit (2015) argues that the role of economy and, in particular, the role of the Great Recession of 2007 to 2009 has influenced the attitudes of Generation Z. Similarly, Herring and Thompson (2012) underline that the fall of the World Trade Center and the crash of the financial markets have shaped their generational profile. Therefore, White (2017) stresses that Generation Z members develop their personalities and life skills in a socioeconomic

environment characterized by chaos, uncertainty, volatility, and complexity. As a result, Generation Z cohort is focused on stable careers, security, safety, and privacy (Lanier, 2017). Apart from global terrorism and economic uncertainty, Chaston (2012) raises the issue of school violence surrounding Generation Z.

Post-millennials are the first generation to enter adolescence with smartphones already in their hands (Twenge, 2017). Moreover, using smartphones is the most important part of their life (Ozkan and Solmaz, 2015a). Not surprisingly, Generation Z is often referred to as “*the first true digital native generation*” (Lanier, 2017). Consequently, Stillman and Stillman (2017) emphasize that Generation Z is “*the first generation born into a world where every physical aspect (people and places) has a digital equivalent*”. In addition, they are snappy and live in the age of impatience and an emoji-onal visual generation (Van Den Bergh and Behrer, 2016). They are intuitively mobile (Pollack et al., 2013) and they prefer using information technology to face-to-face interaction (Herring and Thompson, 2012). Besides communication by text and voice, they communicate with each other by video or movies using mobile phones (Takahashi, 2011). Thus, Schawbel (2013) points to the fact that face-to-face communications are sometimes a challenge to Generation Z members.

Further, Generation Z students are open-minded, value honesty and embrace diversity (Seemiller and Grace, 2016). Although they share many habits, Generation Z is more responsible, smart, tolerant and inclusive than the millennial generation (Van Den Bergh and Behrer, 2016). Furthermore, they are ambitious in achieving their goals (Chillakuri and Mahanandia, 2018) and multitaskers to the point of distraction (Hawley, 2014). Moreover, they perceive their self-organization in the future as very dependent on the availability of smart technologies in both institutional settings and their personal lives (Roblek, 2018).

Despite turbulent environment, Chaston (2012) point out that Generation Z individuals are confident and optimistic, embracing traditional beliefs, valuing the family unit and self-control. Likewise, Ozkan and Solmaz (2015b) stress that they are self-confident and want to secure their financial future. As far as Generation Z members are concerned, peer acceptance is very important (Chaston, 2012). One of the greatest influences on post-millennial generation is social media. However, Issa and Isaias (2016) raise the issue of Internet usage by Generation Z in the context of threats and obstacles to their cognitive, social and physical developments. Similarly, Knapp et al. (2017/2018) alert that Gen Z’s tendency to be always plugged in makes them one of the unhealthiest generations both physically and emotionally.

3. GENERATION Z IN THE PHYSICAL RETAIL ENVIRONMENT

In contrast with other generational cohorts, little research has been conducted on Generation Z and their retail-related behaviour. According to Duffett (2017), Generation Z consumers are the lucrative and technologically advanced, but capricious. Furthermore, Schiffman et al. (2014) draw attention to the fact that Generation Z members can be characterized as spenders not savers. Consequently, their consumer behaviour

might lead to long-term debt and have negative implications for their long-term well-being and quality of their lives. Additionally, Gutfreund (2016/2017) argues that they are savvy consumers and do not trust brands.

In March 2018, the National Retail Federation (NRF) and IBM's Institute for Business Value released a report entitled "What do Gen Z shoppers really want?" (<https://nrf.com>). The survey was conducted on 15,600 Generation Z members from 16 countries. Although they are "*truly digital native generation*" (Chicca and Shellenbarger, 2018), the report revealed that they most often choose to shop in the physical store. More specifically, 98 percent of survey respondents globally said they typically make purchases in a store some or most of the time. The main findings of the report are summarized in Table 1.

Table 1. Generation Z shoppers

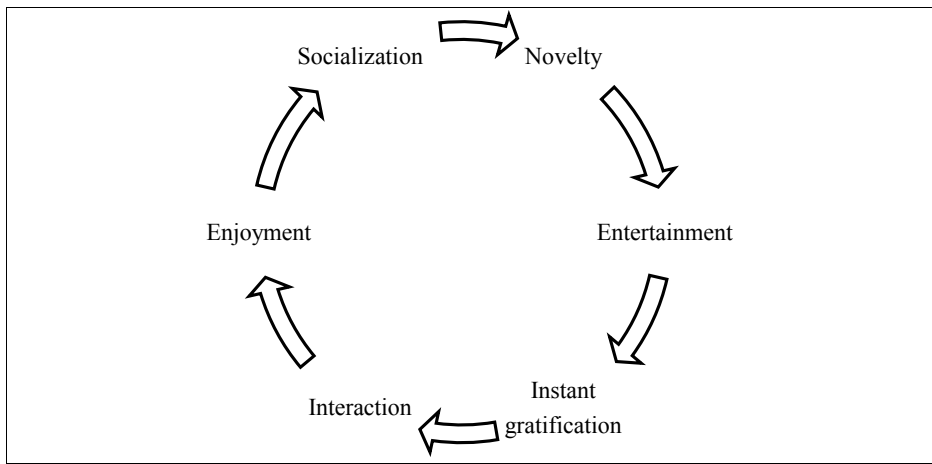
Generation Z shoppers	Key elements	Main characteristics
	General features	<ul style="list-style-type: none"> • Full of surprises • Looking for reliability and consistence whether they shop in a store, through an app or on a website • 47 percent of Generation Z customers use their smartphones when shopping in a store
	Store attributes	<ul style="list-style-type: none"> • Wide product choice • Proximity of store location • Product availability
	Technology	<ul style="list-style-type: none"> • Technology for easier, more rewarding shopping • Adding value and enhancing shopping experience • Little patience for technology that is unresponsive or prone to errors
	Brands	<ul style="list-style-type: none"> • Actively collaborating and co-creating with brands • Engaging with the brand on their terms • Social media interaction with the brand
	Shopping experience	<ul style="list-style-type: none"> • Desire for unique shopping experiences • Make and co-creating shopping experience
	Expectations	<ul style="list-style-type: none"> • Customization, robotics, augmented reality (AR) and virtual reality (VR)

Source: Based on the report "What do Gen Z shoppers really want?", National Retail Federation (NRF) and IBM's Institute for Business Value (available at <https://nrf.com>)

Similarly, Skinner et al. (2018) notice that the emphasis should be put on desire for social interaction, involvement and co-creation of experiences. As for customer services, they like it personalized and efficient and expect companies to customize their shopping and buying experience, both online and offline (Gutfreund, 2016/2017). Razum et al. (2017) analysed the sustainable consumption patterns of generation Z in fashion industry and the factors influencing buying of fashion garments produced in line with the notion of sustainable development. The results revealed that the media, family and peers positively affect sustainable consumption of fashion.

It can be noted that the generation that grew up with information at their fingertips expects benefits from physical retail stores (Figure 1). Pantano and Naccarato (2010) highlight the importance of an enjoyable experience during the shopping activity. As Generation Z consumers are concerned, their in-store shopping experiences should consist of socialization, novelty, entertainment, instant gratification, interaction and enjoyment. As a consequence, the synergistic effects of these factors affect creation of Generation Z’s unique in-store shopping experiences. On the other hand, by linking the in-store customer experience with a digital one, retailers gain access to more consumer data.

Figure 1. Generation Z expectations in physical retail stores



Source: Author’s depiction

Priporas et al. (2017) explored Generation Z consumers’ current perceptions, expectations and recommendations in terms of their future interactions in smart retailing context. The findings revealed that smart technologies have a significant influence on generation Z consumers’ experiences. In addition, the study showed that Generation Z consumers expect the technology to enable them to make more informed shopping decisions.

With the rapid advances in Internet technology, many retailers view Internet of Things as a potential basis for achieving sustainable competitive advantage and long-term profitability (Balaji et al., 2017). According to the aforementioned report (<https://nrf.com>), Generation Z consumers are eager to adopt innovative solutions that provide direct value and enhance the shopping experience. As regards future shopping technologies, Generation Z consumers indicated tools that allow them to try out products in-store (e.g. “magic mirror”), customize products for themselves, design unique products and create on-site with a 3D printer, robotic technologies as well as interactive screens and other tools that help them go online while they are in a store.

4. WHERE NEXT FOR GENERATION Z: RESEARCH PROPOSITIONS

In the present digital era, brick-and-mortar retailing is being challenged to become smarter and provide greater value to both consumers and retailers (Dacko, 2017). Moreover, technological developments allow for augmenting the shopping experience (Willems, 2017). In general, customer experience is a means for differentiation and a challenging issue for retailers (Terblanche, 2018). As regards post-millennial generation, great importance should be put on the introduction of innovative smart technologies in the physical retail environment. Consequently, future work should concentrate on the effects of smart technology on Generation Z customers' experience. Furthermore, in a brick-and-mortar retail context it is of utmost importance to identify how smart technologies affect the traditional customer decision-making process.

It can be argued that many customer-facing Internet of Things technologies have become an integral part of the retail industry. These include smart shopping carts, augmented reality, interactive displays, smart mirror interactive technology (magic mirrors or memory mirrors), RFID tags, and smart kiosks (Balaji et al., 2017). In the context of smart applications in the retail industry, Chaudhuri (2018) describes smart dressing/fitting rooms, smart shelves, smart advertising using beacons, intelligent vending machines and store screening robots. In addition, Renko and Druzijanic (2014) highlight that innovative technologies help consumers to make their shopping decisions. Therefore, Kumar Roy et al. (2018) stress that retail stores should focus on smart technologies that are simple, yet offer enhanced customer value through improved shopping efficiency.

Further research is also needed to determine Generation Z customers' awareness, attitude, and preferences towards different smart technologies in the retail sector. In addition, their acceptance of and resistance to these technologies are also questions in need of further investigation. Kumar Roy et al. (2017) assert that smart customer experience directly enhances satisfaction and reduces perceived risk. Consequently, further studies should also look into the impact of innovative smart technologies on Generation Z customers' satisfaction and willingness to buy.

Store atmospherics are widely considered an important factor in influencing customer behaviour (Jalil et al., 2016). Moreover, retail marketing literature abounds with analyses of the importance of store atmospherics for determining the overall shopping experience. However, when it comes to Generation Z, not much is known about the impact of store atmospherics on behavioural intention and in-store customer shopping experience. Therefore, further research should deal with the influence of retail store environmental cues on Generation Z consumers' behaviour. In addition, their emotional responses to store atmospheric cues as well as the effects of store satisfaction and store atmosphere on store loyalty are also challenging issues to examine.

Nowadays, store brands play an important role in differentiation strategies (Rubio et al., 2017). Unfortunately, little research to date has addressed the Generation Z consumers' preferences for manufacturer vs. store brands. More work should be done in the following areas: Generation Z consumers' attitude towards store brands, the impact of store brands on consumer store loyalty, store brands' purchase intention, consumer

choice of store brands across various store formats, and effects of store brand price-image and service quality on store brand purchase intention. In addition, the creation of Generation Z consumers' loyalty and trust in the retailer through store brands should be analysed.

Brand loyalty is another popular research area in need of further examination. Unfortunately, the issue of brand loyalty behaviour of Generation Z consumers is still poorly understood. In light of this, Gutfreund (2016/2017) points out that earning Generation Z consumers' loyalty will be a challenge, and brands will need to rethink their marketing strategies. In particular, the various patterns of brand loyalty used by Generation Z should be identified. Additionally, future studies should deal with the effects of satisfaction, trust, and brand image on brand loyalty. It would be interesting to compare the loyalty profile of various socio-demographic categories of post-millennial consumers in order to determine their behaviour. In addition, the most important elements of brand evaluation used by Generation Z consumers should be identified.

5. CONCLUSION

The latest technological developments, in particular smart innovative technologies create a number of opportunities for brick-and-mortar retailers to understand consumer preferences regarding store experience and meet their expectations. On the other hand, these technological advancements help retailers gather various customer-related information and identify their shopping preferences and purchasing trends. Therefore, advanced technologies provide retailers with greater insights on their customer base to gain a better understanding of their habits and needs. However, brick-and-mortar retailers need to introduce customers to the smart technologies they utilize to co-create a more personalized, unique experience.

Based on a comprehensive review of the academic and practitioner literature, the paper synthesise current findings to contribute to the existing body of knowledge on the topic of little researched yet important Generation Z cohort. In addition, it may present a starting point for better understanding and researching the phenomenon of advanced technology usage in brick-and-mortar retail settings.

The paper also provides useful insights for brick-and-mortar retailers approaching the Generation Z consumers. Through a better understanding of their behaviour, both brick-and-mortar retailers and marketers will be able to develop strategies to improve their services and better satisfy the needs and requirements of this unique generation of consumers. In particular, investing in smart innovative technologies provides new experiences for consumers and creates differentiation in brick-and-mortar retail settings. Furthermore, it enables individualization and personalization of Generation Z consumers' shopping experiences. Consequently, Generation Z consumers will be better targeted and the overall retail experience will be enhanced.

Taking into account future research propositions, the paper may give a background to further empirical research on the post-millennial generation. Bearing in mind that no empirical analysis has been included in the paper, it lacks a contribution

to this field from an empirical point of view. To this end, additional research is needed to provide empirical support to deepen understanding of generation Z and its role in the brick-and-mortar retail environment. On a wider level, future research needs to be carried out to identify how the introduction of advanced technologies modifies the brick-and-mortar retailing context. In particular, an important issue to examine is how smart innovative technologies affect generation Z cohort in a retail environment and their overall shopping experience.

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THE INFLUENCE OF THE SAFETY ASPECTS ON THE PRIVACY OF THE CONSUMERS IN ELECTRONIC TRADING

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Abstract

Electronic trading has become an every-day occurrence influencing every human activity and an integral part of every trading-oriented business. The importance of electronic trading is growing day by day and positive aspects are being generated, but new security issues are growing as well. Today, electronic paying represents a newly established way of payments in electronic trading. Electronic payments make electronic trading possible. However, there are some difficulties in successful running of electronic trading. One of the biggest obstacles is disability of having complete control over electronic payment and security issues which result in distrust of people. The most important step in reducing that distrust is making sure that all risks and malfunctions are at their minimum, while the security is growing, for customers and traders. For that reason, this work will be analysing the importance of security aspects and creating more secure environment for customers in electronic trading. All the aspects that will be analysed make impact on electronic trading, as well as security aspects, alongside with examples of data theft. Main purpose of this work is to analyse the theoretical aspects of security in electronic trading as well as showing the norms and law regulative which protect users in electronic trading.

Key words: business security, consumer protection, electronic trading, electronic payment, global competition, informatization

1. INTRODUCTION

The subject of this paper are security aspects and their influence on the safety of the consumers in electronic trading. Electronic trading represents one of the most modern and newest ways of conducting business activities, and it is becoming more popular and more accepted means of buying and selling goods and services. Electronic trading is a developing industry that is becoming the most lucrative component of the entire trading in the modern digital era. The progress and development of electronic trade is closely correlated with the evolution of the Internet and communication technologies of

the individuals and business entities. Information and communication technology and their different forms are used in electronic trading among the subjects that are involved in the production, trade or service activities. It is actually online sales via the Internet, characterized by the fact that there are no working hours, so it is possible to shop 24 hours a day, and the product is available to all, including the most remote consumers.

Electronic trading provides the customers with much more information about the products, and it also offers the possibility of choosing the trader, the product and the service to their own taste and preference. Since our life style has become more hectic and busier, buying habits of most consumers are characterized by online shopping, i.e. buying from the comforts of their own home. Consumers are searching for a faster, cheaper and, above all, safer way of paying via the Internet. It is the privacy, the safety of the transactions while buying online that represents limitations that impede the speedy development of the Internet commerce in relation to classic forms of trading. Business ethics is an extremely important factor of electronic trading that directly influences consumer's decision on buying goods or services. For this reason, all participants in electronic trading, be it producers, companies, goods and services offerors, have to ensure their customers strict privacy of the personal data and of the process of paying online.

2. LITERATURE REVIEW AND THEORETICAL BACKGROUND

2.1. Electronic trading

Fast evolution of the Internet over the past decades has launched and enhanced the trends and changes of the trading methods, i.e. the ways of trading with goods and services. Development of the Internet has largely influenced development of electronic trading that refers to trading activities via the Internet and represents the most profitable means of trading goods and services between sellers and consumers. Panian (2000) defines electronic trading as the process of buying, selling or trading goods, services or information via socially available computer network, the Internet, and offers considerable reduction of the cost and time. On the other hand, Spremić (2004) suggests that electronic trading relates only to performing trading activities via the Internet, while Chaffey (2007) sees e-trading as sales activities supported by computer networks before and after the purchase. Laundon (2007) defines electronic trading in the narrow and the broad sense and points out that e-trading in the narrow sense means performing digitally the process of buying and selling and the related transfer of goods, services, information and money via computer networks (including the Internet), while electronic trading in the broad sense is identified with the term of e-commerce which, besides performing trading activities electronically, includes distance learning, organization of collaboration between business partners and a series of other activities performed over computer networks that improve the entire business operations of a company.

We can distinguish several types of electronic trading. According to Spremić (2004) electronic trading is consumer-oriented (model B2C) and it implies the existence of many business web sites where many products or services are traded, a high level of

electronic connection with the buyers and final consumers, while electronic trading among companies (model B2B) refers to complete electronic connection of the business with suppliers, partners and subcontractors, with the aim of creating new value and profit. Electronic trading between final consumers and companies (model C2B) is a model of electronic business dealings between final consumers and companies, while electronic trading among final buyers (model C2C) is a new form of direct business, i.e. trading among final buyers, with the support of electronic mediators (Panian and Klepac, 2003). G2B (Government to Business) category of the electronic market encompasses infrastructure that enables providing different services and conducting different business transactions between companies and government authorities, but, alongside the infrastructure, the offer of the contents that can be found in those models is equally important. G2C (Government to citizen) model represents all types of services and electronic communications between public administration and the citizens (Spremić, 2004).

Buying over the Internet entails many advantages for the final consumers and for the business subjects. For the buyers, using electronic trading can be practical, because during the very purchasing process they do not encounter obstacles that normally occur in the process of buying. Primarily, this refers to the time spent in a store, the drive to the store, fuel cost, parking etc. A very important advantage lies in the possibility of comparing the prices of different products or other competitive online shops. Here, the buyers can more practically and easily gather information on the prices and compare them through Internet sites search or receive offers in the form of catalogues on their emails. A very important aspect that is also a huge advantage of electronic trading, is the fact that there are no opening hours, i.e. the buyer is not limited by the working hours of the shop in the process of the purchase. For the buyers, this means that the purchase can be made when it is convenient to them, which, today, is of extreme importance. At the same time, an online shop has no limitations regarding the size nor the number of the sales staff with whom the buyer usually loses time in the process of doing shopping (Panian, 2000). On the other hand, Srića and Muller (2001) list most significant obstacles in electronic trading: 1) During interaction with the product it is extremely difficult to gain a clear picture of the product while viewing it online. There are often situations where the ordered product looks differently than in the picture, and it does not have the required properties. There is also an important issue that arises when specialized products are being purchased, mostly electronic, on which the buyer has limited knowledge, and does not have someone to provide him answers due to the impossibility of interaction with the sales staff, 2) The biggest obstacle is definitely related to the safety of the payment process and also additional costs that could arise from this type of purchasing. Most online purchases imply credit card authorization during the charge, which can lead to identity thefts and create additional costs regarding delivery and customs costs, 3) Waiting for the ordered products and long delivery time span is one of the biggest drawbacks of electronic trading. The time of the delivery largely depends on the state of the society (wars, crises, strikes), but also on the reputation and the size of the trader from whom the product is ordered. Besides the wait, a big issue is not receiving the product at the required address at all.

From the above presented facts, it can be concluded that electronic trading in fact has more advantages than disadvantages, and that the atmosphere for including as many buyers as possible in this form of trading is favourable. Potential obstacles that are ongoing today are in the process of being minimized and eliminated and will in due time become a matter of the past.

2.2. Electronic payments

Development of modern electronic payment systems has been mainly driven by new technological revolution that brings mass application of the computers in business and in private. Today, business activities are unthinkable without the application of information and electronic technologies. The use of the Internet has become a necessity that no one can avoid anymore. This level of connection develops the consciousness on new enterprises and possibilities in various sectors, especially in commercial activities. The trading of goods is more and more happening online, and efforts are made to replace cash payments with the new – noncash transactions. New forms of assets and money are made (electronic money), which enables acquiring assets via the system of electronic payment (Hamdi, 2007).

Electronic business relates to any form of conducting business transactions where the parties realise interaction electronically (Spremić, 2004). Regarding the actual electronic business activity, we can say that it has developed to certain levels where we cannot imagine the business, and even our everyday lives anymore, without including electronic payments, be it in the business world or in our private daily routine (Panian, 2000). Electronic payment as a separate part of electronic trading, i.e. electronic commerce, deserves special attention. It consists of a series of small steps that need to be taken to carry out transactions successfully and make the payments. Likewise, for the payment to be completed, the mediators issue the so-called tokens that represent objects and hold certain value. Other participants do not have the possibility of issuing tokens, but rather accept tokens issued by the banks and different organizations of the government. Regarding other participants, we can list two parties in the payment: on one side, there are persons that are paying, while on the other side, there are the persons that are being paid. The tokens in these transactions are treated as a valid means of payment that enables the process of electronic payment. This concept of payment and charge is used by many telecommunication companies that issue tokens with which people can collect different unit impulses. The use of these tokens is two-sided, in the service of paying and in the service of charging. So, a legal entity in the service of a mediator issues them and is paid with them at the end of the process, while other participants use the tokens for receiving unit impulses (NCERT, 2010).

Development of the electronic payment system goes back to the 1960s when Electronic Funds Transfer – EFT was developed. Over time, the EFT became more developed and sophisticated and started to be used in more and more countries worldwide. In the beginning, this system was used only by the banks and other financial institutions to more easily transfer large amounts of money among themselves on the national and international level. In the case of the banks, this way of transferring money has largely contributed to the safety and security of the money transfer. The EFT implies the

use of computers and telecommunication technologies to carry out the payment. The initial goal of this system that kept till today is to shorten the duration of the payment and reduce transaction costs that arise while using cash. A big expansion of the EFT system happened with the emergence and affirmation of ATMs because they have enabled a direct transfer of the money to the place where certain goods are bought. In this case, we talk about the Electronic Funds Transfer at Point of Sale – EFTPOS. Furthermore, a more extensive development of electronic payment started with the emergence of credit and debit cards. Namely, at the beginning of the 1980s advancements in the development of the technologies and possibilities of processing large amounts of data put electronic payments via credit cards in the centre, which quickly became very popular and a preferred method of paying small transactions. The overall development of electronic system can be divided into two levels of transactions performed electronically. The first level refers to the development of the Electronic Funds Transfer system, and the second relates to the emergence of encryption that largely contributed to further popularization and development of card payment (Hamdi, 2007).

By observing the literature concerning the electronic payment systems today, we can come across two directions in which it develops. The first way of considering it is from the standpoint of the offer. Humphrey *et al* (2001) think that the basic obstacle for a faster development of electronic payment systems lies in the high, fixed expenses companies have during initial investments in those systems. For this exact reason, companies have not yet entirely opted for introduction of these systems regardless all the benefits their implementation and their use bring. Other researchers focus on demand. The basic issue of companies less using electronic payment is the fact that such a system is subject to many requirements that have to be met before its introduction. One of those requirements would be a relatively high income and level of education in order to fully use the system in every day operations. On the other hand, when we consider other instruments of payment, we can see that these requirements are not necessary for their implementation and use. It can certainly be concluded that electronic payment systems are becoming an important part of the modern world, however, their application and full use will nevertheless have to happen gradually due to certain preconditions that have to be fulfilled, whether by the supply or the demand. The common feature of both concepts can be seen in the very problematics of the development of these systems because such a complex business activity does not happen overnight, but rather a lot of time is required for certain ideas to be adopted and applied (Stavins, 2001).

2.3. Customer safety and protection

Consumer protection in the Republic of Croatia was for a long time not regulated by a unified regulation or act and the conditions related to the safety and protection of the consumers were a part of many different regulations. We can say that the major part of the segment concerning consumer protection was in the provisions of the Civil Obligations Act. The issue about this Act is in the fact that it does not differentiate between the consumer and the producer, but they are rather treated at the same level as equal parties through relations of mandatory laws (Horak and Pavletić Župić, 2005).

The General Assembly of the United Nations deals with the development of the entire area of consumer protection, which includes the development of institutions, laws and a number of reforms concerning the problematics of consumer protection. In 1985, the Assembly adopted Resolution 39/248 that contains guidelines on basic consumer rights protection. Also, with the Resolution, the General Assembly of the UN encourages the member states and those that will become members to focus on an adequate application of consumer rights protection. Upon the accession of the Republic of Croatia to the European Union, Croatia had to coordinate its laws with the EU *acquis communautaire*. In 2001, with the Stabilization and Association Agreement, Croatia subscribed to conducting the measures of coordination of the laws. Thereby, the Republic of Croatia, at the beginning of processes of coordination, had to focus mainly on administrative and consumer law. With this activity, many programs for consumer protection started to develop in Croatia, and this matter is slowly getting more and more true value and importance (Mišćenić, 2013).

In order to meet the requirements of the United Nations, a national strategy has been put forth in Croatia, which concerns consumer protection and their rights in many transactions. In the Ministry of Economy, Entrepreneurship and Crafts, a section for consumer protection has been instituted. The purpose of this Section is to elaborate in detail the National strategy in the Republic of Croatia that serves the purpose of consumer protection. Likewise, the Section, besides the elaboration of the National strategy, also heads the National Council for Consumer Protection. This institution was founded in 2008, and its goal is to give advice to the government regarding the enforcement of the National strategy and the program for consumer protection, so the government could pass laws and pay more attention to the specific issue, and to eventually satisfy all the requirements the UN has set through the Resolution. Moreover, most EU directives refer to specific contracts concluded between the consumers and the traders or provide some important aspects of those contracts. The EU directives usually, besides these private-public elements, also regulate many public-legal elements. This application can be also found in the ZZP (The Consumer Protection Act) (The International Bank for Reconstruction and Development, 2010).

The Consumer Protection Act, that entered into force on 8 April 2014, deals with regulation of personal consumer rights that have to be granted when different products and services are purchased. With the implementation of this Act, consumers are guaranteed protection in the form that their rights will not be denied or affected in the transactions with the other party, and they can always refer to their specific rights laid down in this Act. Those rights concern first and foremost: the right to protection of economic interests of the consumers, the right to be protected from the endangerment of their lives, health and assets, the right to legal protection, the right to be informed and educated, the right to associate with other consumers with the goal of protecting their common interests, the right to consumer presentation and participation of consumers representatives in solving the issues of their interest (The Croatian Chamber of Economy, 2015).

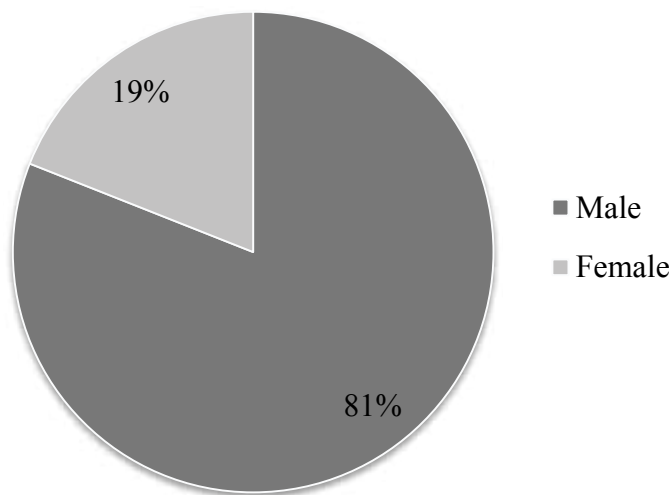
By reviewing the Consumer Protection Act, we can list specific sections that especially concern the above-mentioned statements: product selling and service provid-

ing, labelling and having products on sale, public services, down payments, distance contracts and contracts concluded outside the physical business space, product advertising, the bearers of consumer protection (Kesić, 2006).

3. METHODOLOGY AND RESULTS

The paper has analysed the influence of the safety aspects on the privacy of the consumers in electronic trading, and efforts have been made to explain the basic rights concerning safety in electronic trading through the consumer experience. The researchers used a company's web shop, which deals with selling electronic appliances, computers, cell phones and tablet computers as an example of electronic payment. The research was conducted on the sample of the buyers that agreed to answer questions about their web shopping experience after purchasing there. Through the research, their trust in the safety of electronic payment was also examined. The customers agreed to take the survey and they signed the GDPR form with which the company took the obligation of not using their data for any other purpose besides this thesis. Also, the company's management has provided us with the information on safety omissions during the purchases in the past. The total number of the customers agreeing to the research was 91.

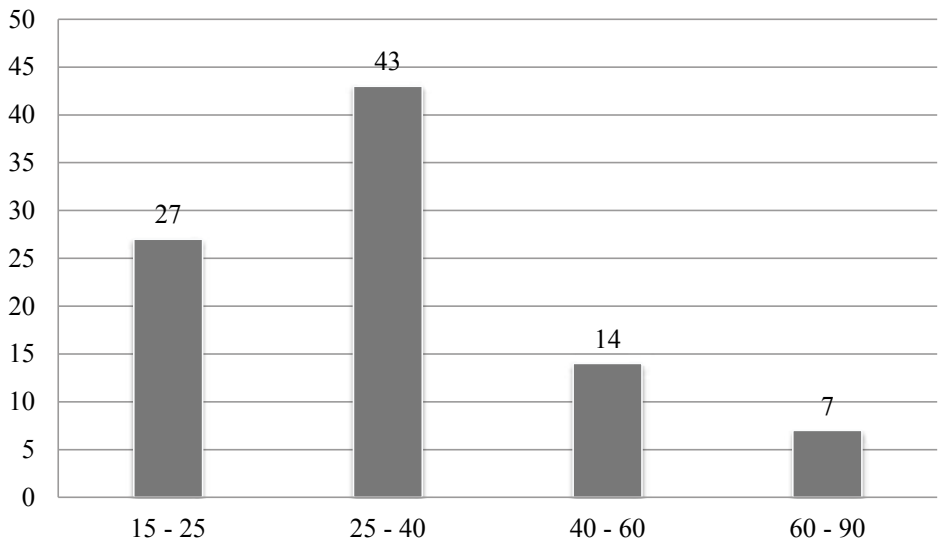
Chart 1. Respondents' purchasing commitment according to gender



Source: Authors' Calculations

Regarding the gender, 81% of the respondents, i.e. 74 of them, are male, and 17 or 19% are female (see chart 1). The reason for the bigger share of the male population is the fact that the shop sells electronic equipment, which attracts more male customers.

Chart 2. Age groups of the respondents



Source: Authors' Calculations

The most respondents are in the age group between 25 and 40 years, 47.2%, i.e. 43 persons. From the age 15 to 25 there are 29.7%, i.e. 27 persons. The age group from 40 to 60 encompasses 15.4% respondents, i.e.14 of them, while the fewest respondents belong to the age group from 60 to 90 years, 7.7%, i.e. 7 persons (see chart 2).

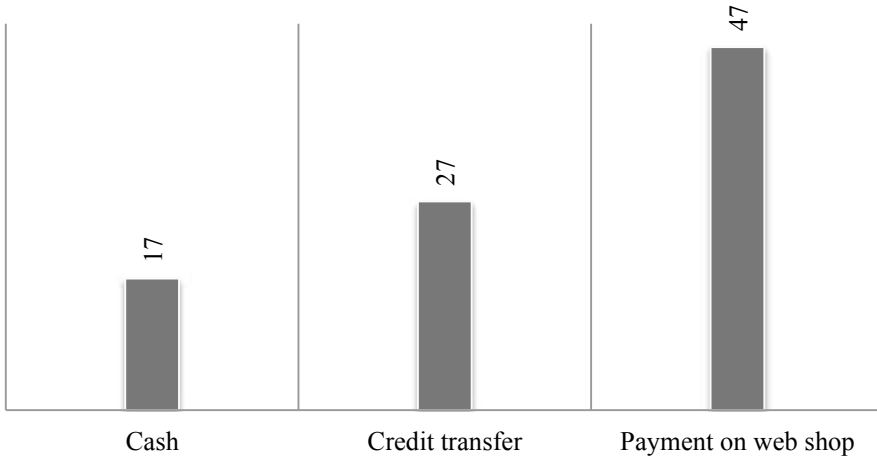
Chart 3. Display of the respondents' working status



Source: Authors' Calculation

Chart 3 shows that the working status of the respondents, the biggest percentage, 67%, i.e. 61 of them are employed, which was expected, since the company sells high-end electronic equipment. Then, there are students with the share of 17%, or 16 respondents. The reason for students being in the second place is that the company gives discounts to full-time students. In the third place, there are pensioners, with 8% and the unemployed with 8%, i.e. 7 respondents.

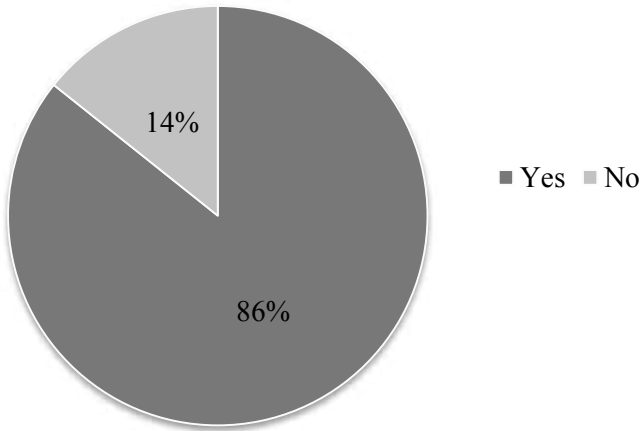
Chart 4. Users' preferences regarding the ways of payment



Source: Authors' Calculations

Most of the respondents prefer web shopping, 47 of them, or even 51.6%. Since this data had seemed unusual, we further examined why this was so. It turned out that the buyers were familiar with their consumer rights and choose online shopping because of the simpler way of eventual returns of the purchased goods. Also, a certain segment of the buyers does not live in Zagreb, where there is the only branch office of the company, so buying via the web shop is the only option. Regarding the credit transfer, 27 of the respondents or 29.7% of them choose credit transfer upon the offer and pay at the bank or by net- or m-banking over the Internet using their mobile phones or computers. These are mostly companies that pay from their own business accounts. 17 respondents use cash payment, i.e. 18.7% (see chart 4).

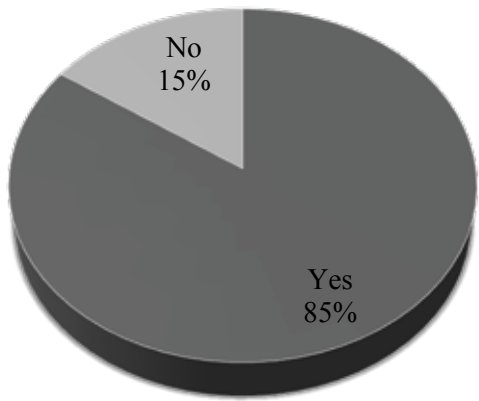
Chart 5. Examination of the respondents’ use of electronic payment



Source: Authors’ Calculations

To the question about using some form of electronic payment, 86% or 78 of them answered they did, while 14% or 13 respondents said they did not use any form of electronic payment (see chart 5).

Chart 6. Examination of the respondents’ habits of buying over the Internet

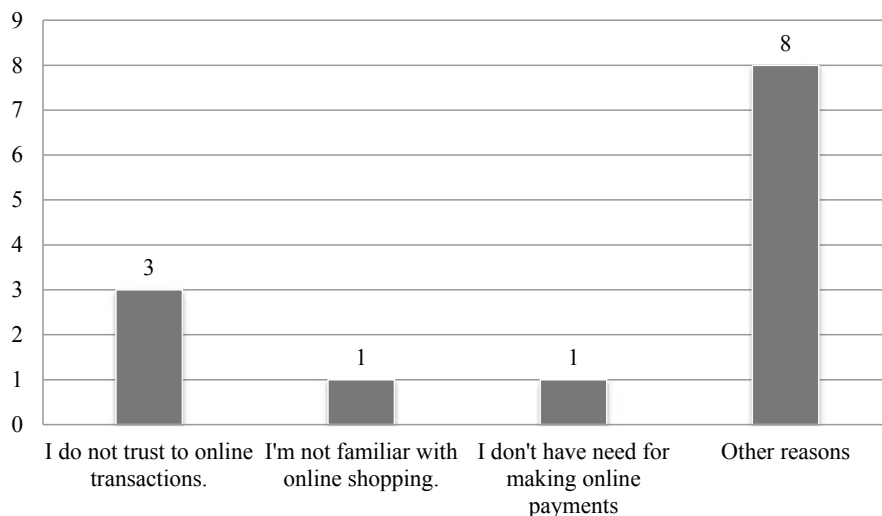


Source: Authors’ Calculations

The following question tried to establish whether the respondents buy over the Internet. Out of the total number of the respondents, 85% answered yes, while the rest of 14% answered no (see chart 6). The respondents that do not buy over the Internet stated that the reason was “other”, but they did not explain it further (61.5%). Then, there follow 23.1% of the respondents that do not trust online transactions, 7.7% are not

familiar with online shopping and 7.7% of them do not have the need for making online payments (see chart 7).

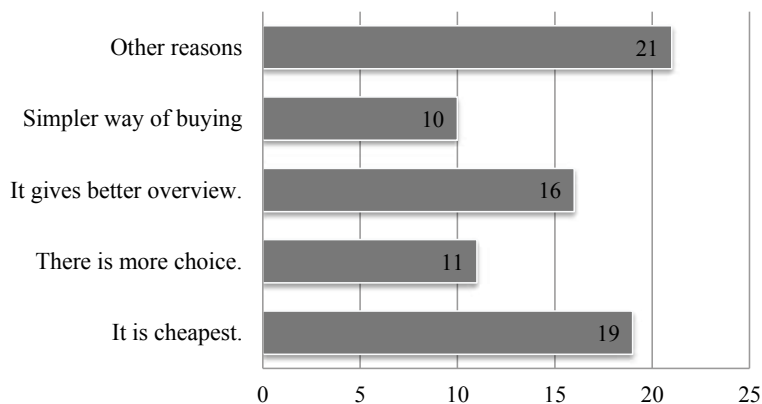
Chart 7. Examination of the users' reasons for not buying over the Internet



Source: Authors' Calculations

Under listing the reasons why they buy over the Internet, 27.3% or 21 respondents ticked "other reasons" which remained unknown, while 13% or 10 respondents think that online shopping is a simpler way of buying. Also, 20.1% of the respondents, i.e. 16 of them, think that shopping over the Internet gives better overview. 14.3% of the respondents think that there is more choice when buying online, while 7% think that this form of buying is also the cheapest (see chart 8).

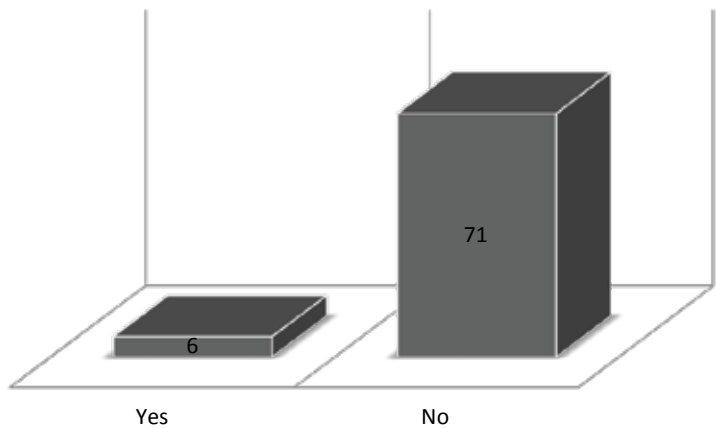
Chart 8. The analysis of the reasons for buying over the Internet



Source: Authors' Calculations

Furthermore, we found out that even 92% of the respondents think that their safety is not in danger while buying over the Internet (71 of them). 8% of the respondents, i.e. 6 of them, think this way of buying puts their safety at risk (see chart 9).

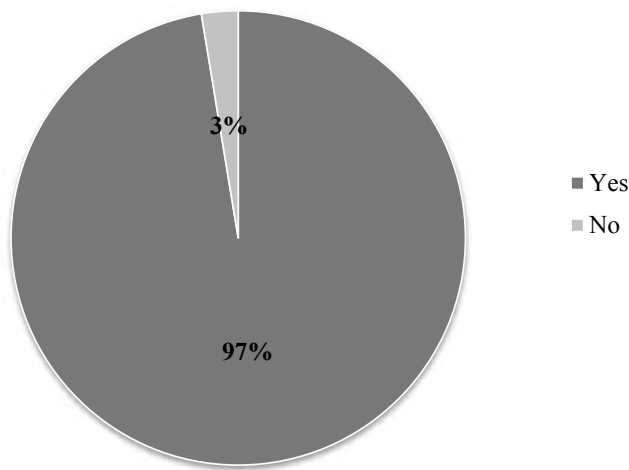
Chart 9. The analysis of the perception of the safety of the consumers during electronic payment



Source: Authors' Calculations

To the question about having had bad experience with the safety during electronic payment, 97%, i.e. 75 of the respondents answered they had not. Only 3%, or 2 respondents have had problems with electronic payments in the past (see chart 10).

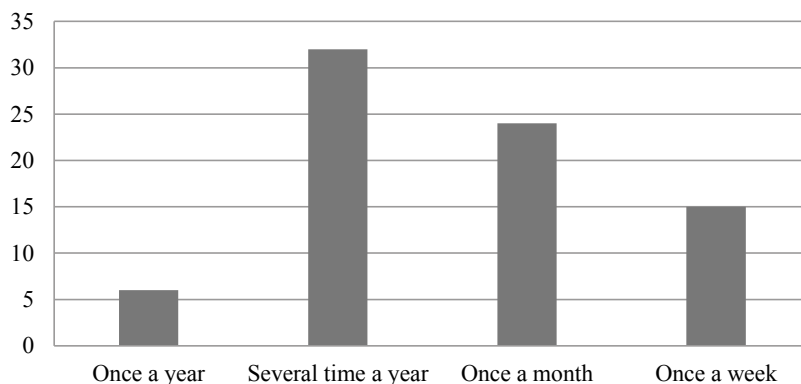
Chart 10. The percentage of the respondents that have had experience with safety omissions during electronic payment



Source: Authors' Calculations

Regarding the question about the frequency of the use of electronic payment services, the biggest group were the respondents who use electronic payment a couple of times a year - 41.6% or 32 respondents, while the number of those who use it on a monthly basis is 24, i.e. 31.2%. 19.4% of the respondents, 15 of them, use electronic payment possibility once a week, while there are 7.8% or 6 respondents that use it once a year (see chart 11).

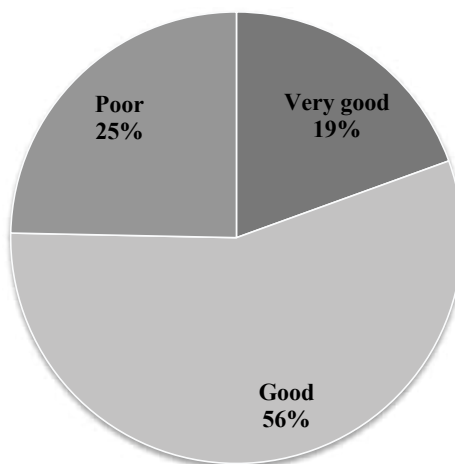
Chart 11. Frequency of usage of electronic payments among the respondents



Source: Authors' Calculations

Chart 12 shows that the respondents also answered the question about the development of electronic trading in the Republic of Croatia. 56% of the respondents, 43 of them, think that electronic payment is well developed. 19%, i.e. 15 respondents think that it is very well developed, and 25%, i.e. 19 respondents think that the situation with the online payment in Croatia is poor.

Chart 12. The evaluation of the development of electronic payment in Croatia



Source: Authors' Calculations

3.1. Limitations to the research and recommendations for future research

Basic limitations in the survey relate to the fact that the respondents are buyers of electronic equipment, where there are more male than female customers. If the paper addressed the use of electronic payment in buying clothes, the situation would probably be different. Also, the respondents that participated in the survey are mostly from the IT branch, and they are familiar with the processes, advantages and limitations of electronic payments. The recommendation for future research is to conduct a survey on the sample that is not prone to IT technology so much, in order to gain a clearer picture on the perception of safety in the processes of electronic payment.

4. CONCLUSION

Electronic trading is a market segment that is evolving more and more. The reason for that lies in the growing use of the Internet by the consumers and in the simplicity of buying the product in this way. The Internet is today considered the main channel for all commercial transactions. Buying over the Internet is often the fastest and the cheapest way of buying a product. Trading over the Internet is considered the most profitable form of commerce due to its simplicity and low costs. Shopping is possible at any time. The Internet is a global market with millions of buyers and sellers, the place for all transactions and every form of business. A big advantage of electronic trading is availability 24/7, seven days a week, low costs, simple purchase, cheap products, comfortable process of buying. With the emergence of virtual shops on the Internet, the new “online” market was created, where there are no limits. However, a share of the respondents that are today buying over the Internet is still relatively low in comparison to traditional shops. Buyers still more prefer purchasing traditionally, in stores.

The biggest advantage of shopping in stores is the possibility to feel and try out the product. The fear of personal data abuse is also present among the users, along with the risk during card payments in the virtual world. The safety while shopping for products and services over the Internet is what will entice the consumers to participate in the virtual form of business. Companies, producers and all the subjects that offer their product or service on the Internet have to provide the highest level of protection and security of personal data and safe and reliable credit card payments, because it is the only way to encourage the potential buyer to shop via a form of electronic trade.

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ELECTRONIC PAYMENTS UNDER THE REVISED DIRECTIVE ON PAYMENT SERVICES (PSD 2)

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Abstract

Contemporary trade changes the way of purchasing goods and services in European internal market. In recent years, both European citizens and businesses are more and more turning towards e-commerce so the electronic payments have to be secure and efficient. The first Directive on payment services in 2007 (PSD 1) established and introduced the same set of rules on electronic and non-cash payments across the whole European Economic Area. This paper analyses the continued development of legal foundation for a better integrated internal market and safe electronic payments through revised Directive on payment services (PSD 2) which became applicable in January 2018. New PSD 2 rules are setting new strict security requirements, the transparency and the rights and obligations of users and providers of payment services. The aim of this paper is to answer the question what kind of legal measures are used to facilitate innovation, competition and efficiency in electronic payment services. Also, by comparing the first and the revised directive on payment services, the paper points out some crucial changes made for higher security standards for online payments giving the consumers more confidence when buying online.

Key words: electronic payment transactions, EU legal framework, Directive on payment services (PSD2), SEPA

1. INTRODUCTION

The impact of the Digital Age is visible in some crucial areas in e-finance and payment systems are one of them. Not only have modern payment systems transformed the banking technology and made possible numerous changes in the strategy and structure of financial services organizations (Gorton, 2010: 2) but also have made challenges for the policy makers and existing legal framework. Consumer preferences are changing rapidly and payments technology is evolving at an unprecedented speed. With its volumes growth of 11, 2 per cent during 2014-2015 and reaching 433, 1 billion, non-cash transaction volumes showed the highest growth of the past decade (World Payments Report, 2017: 5). While the online purchasing is growing and the use of cash continues to decline, it is clear that efficient and effective legislative framework for digital payment methods is more than necessary. During the last period, European Union has adopt-

ed measures “aimed to achieve a high degree of legal harmonization in three areas of retail (consumer) services: payment, credit and investment.” (Cherednychenko, 2011: 221) Until the first Payment Services Directive (PSD1, 2007/64/EC) adopted in 2007, important areas of payment services remained unharmonized in European member states. Payment Services Directive (PSD1) was designed to create conditions for integration and rationalization of national payment systems and established a new legal framework in the field of payments in the European Union. Also, the first Payment Services Directive brought more transparency and information for consumers, has cut execution times, strengthened refund rights and clarified the liability of consumers and payment institutions. (EC, 2018) Technological development and the rise of e-commerce have created new types of needs for handling financial transactions with ease in a global environment and encouraged the emergence of new service providers. In order to follow recent developments in payment services that have brought innovation and competition, providing alternatives for internet payments, European Commission modernised PSD1 and introduced revised Payment Services Directive - PSD2 (Directive (EU) 2015/2366, OJ L 337) which now offers several new solutions and transforms those already existing – reshaping the legal background to a large extent. The continued development of an integrated internal market for safe electronic payments is crucial in order to support the growth of the Union economy and to ensure that consumers, merchants and companies enjoy choice and transparency of payment services to benefit fully from the internal market (Directive (EU) 2015/2366, OJ L 337/36).

The objective of this paper is to analyse the continued development of legal foundation for a better integrated internal market and safe electronic payments through revised Directive on payment services (PSD 2) which became applicable in January 2018. Also, the paper compares legal measures used to facilitate innovation, competition and efficiency in electronic payment services. The paper concludes with pointing out some crucial changes made for higher security standards for online payments giving the consumers more confidence when buying online.

2. EUROPEAN LEGAL FRAMEWORK FOR PAYMENT SERVICES

The Internal or Single Market of Europe is constructed on the basis of the free movement of people, goods, services and capital. As such, there are four distinct aspects that can be described in themselves as Single Markets: the Single Market for People, the Single Market for Goods, the Single Market for Services and the Single Market for Capital. Achieving a Single Market for Financial Services was, and still is, therefore a top priority of the EU (Wandhofer, 2010: 28). The payment industry was once slow-moving and conservative, but new innovative payment solutions have made the area fast-moving and exiting (Hatfield, 2017: 78). As initially emphasized, Digital Age impacts some key areas in e-finance and modern financial services in which existing participants conduct their business are changed by technological developments. Paper-based bank services are replaced by the use of different electronic payment means like transfers, debits and cards (Kovacs, David, 2016: 149). Those modern trends make it possible for new types of business and new participants to emerge, and open up access to information, thereby

enhancing market transparency (Ferran, Goodhart, 2001: 129). At the same time easy, efficient and secure national and cross-border payments system offer more competition and choice to consumers. Competition law is an extremely complex area of law that is in constant evolution and whose underpinning principles cross paths with economic and market theories (Lista, 2013: 3). Having in mind that its pervasive effects embrace every aspect of the market economy, including the financial services sector, it is clear why a modern legal framework, opened for new types of payment services is more than necessary. The regulation of the payment service industry has varied across different countries. During the last decade, the European Union has adopted a number of measures aimed to achieve a high degree of legal harmonization in three areas of retail financial services: payment, credit and investment (Cherednychenko, 2014:221).

2.1. The Payment Services Directive 2007/64/EC – PSD 1

The first step in establishing safe and competitive single market for payments within Member States was the first Payment Services Directive (PSD 1) adopted in 2007 which came into force across the EU in 2009. The payment services directive established the same set of rules on payments across the whole European Economic Area covering all types of electronic and non-cash payments, such as credit transfers, direct debits and card payments, mobile and online payments (Art. 1, Directive 2007/64/EC). Also, the directive laid down rules about the information that payment services providers have to give to consumers and about the rights and obligations linked to the use of payment services. The directive introduced a new category of payment service providers other than banks (Directive 2007/64/EC). The PSD 1 also laid the groundwork for the single euro payments area, which allows consumers and businesses to make payments under the same conditions across the euro area. The Payment Services Directive from 2007 was divided into broad sections, covering: in Title I Subject matter, scope and definitions, Title II - The regulation of Payment service providers/payment institutions, Transparency of conditions and information requirements for payment services in Title III and Rights and obligations in relation to the provision and use of payment services in Title IV, followed by specific implementation measures in Title V and Final provisions in Title VI. Although it was a “full harmonisation” Directive intended to provide clear and harmonised rules across Europe, certain provisions of the PSD have been implemented differently. Member States had a number of options to implement certain provisions differently or to waive them altogether, like for example the discretion to decide on shorter maximum execution times for purely national payments, treat ‘micro-enterprises’ as consumers under the PSD or to establish slightly differing rules for the newly regulated non-bank Payment Institutions (PIs). Additionally, the “competent authorities” appointed by Member States to supervise the implementation of PSD have a degree of flexibility in the interpretation of certain provisions.

2.1.1. Structure and overview of the PSD 1

Title I of the PSD 1 forms the foundation of Directive and contains subject matter, scope and definitions which set out the activities that are regulated and those that are excluded (Art 3), lays down the types of service providers that come within scope and defines key terms. The Directive applies to “payment services in the Community” (Art 2) made in euro or the currency of a Member State outside the euro area. Payment services cover following activities: cash placed and withdrawn on or from a payment account, execution of payment transactions, credit transfers, including standing orders, direct debits, including one-off direct debits, payment card transactions, issuing and / or acquiring of payment instruments, money remittance and execution of payment transactions through the intermediary of a telecom, IT system or digital operator (Annex of the Directive). In Article 3 the Directive lists a number of exclusions from its scope, notably: cash payments from the payer to the payee (but any cash transaction involving movement to or from a payment account will be caught), cheques and paper instruments, cash transportation, payment services associated with securities asset servicing, technical services including independent ATM deployers, instruments that can be used within a limited network of service providers or a limited range of goods or services, and certain payment transactions through telecommunication, digital or IT devices. The Directive required that every institution providing payment services (defined in Art 1), must be authorised, either, under existing regimes, such as the Banking Directive, or as payment institutions under Title II, or as an E-Money institution under the E-money Directive. The PSD 1 had only covered payment transactions where both customers’ PSPs were within the European Union or European Economic Area and the transaction was made in euro or another Member State currency and the exception was known as a “leg out” transaction (Art 73). Clear definition of many of the conduct of business requirements was crucial for their consistent implementation. Article 4 (27) defined business day as “a day on which the relevant payment service provider of the payer or the payment services provider of the payee involved in the execution of a payment transaction is open for business as required for the execution of a payment transaction.” Article 4 (14) defined Payment account as “an account held in the name of one or more payment service users which is used for the execution of payment transactions.” Payment instrument was defined as “any personalised device(s) and or set of procedures agreed between the payment service user and the payment service provider and used by the payment service user in order to initiate a payment” (Article 4 (23)). Title III of the PSD “Transparency of conditions and information requirements for payment services” cleared that it “should be applied to single payment transactions, framework contracts and payment transactions covered by them. The parties may agree that it shall not apply in whole or in part when the payment service user is not a consumer” (Art 30) Furthermore, Article 30 (2) explained that Member States “may provide that the provisions in this Title shall be applied to micro enterprises in the same way as to consumers.” Also it had set out in detail what information PSPs are required to provide to their customers, both for single payment transactions (Art 35) and where there is an ongoing relationship that is covered by a “framework contract” (Art 40). Framework contract was defined in Article 4 (12) as “a payment service contract which governs the future execution of individual and successive payment transactions and which may contain the obligation

and conditions for setting up a payment account.” The PSD recognised different business models existing in the payments market and the need for their different treatment. This section of the Directive under the Title IV cleared the rights and obligations of the PSPs and PSUs in respect of payment transaction processing. It aimed to streamline and benchmark operational conduct of business to increase efficiencies in the Single Market for Payments as well as to increase consumer protection in a harmonised way, with the aim of triggering more cross-border activity to enhance competition and trade. (PSD G, 2009:19) The above-made analysis of the objectives and subject-matter of the Directive on payment services shows progress in the regulatory framework for payment services made by this legal framework. Regulation (EC) No 924/2009 of the European Parliament and of the Council, Directive 2009/110/EC of the European Parliament and of the Council, Regulation (EU) No 260/2012 of the European Parliament and of the Council and Directive 2011/83/EU of the European Parliament and of the Council has further complemented the legal framework for payment services by setting a specific limit on the ability of retailers to surcharge their customers for the use of a given means of payment. The objectives of this regulatory package are maintaining confidence in the financial system, promoting public understanding of the financial system, securing the appropriate degree of protection for consumers, and reducing the extent to which it is possible for business falling within the scope of the legislation to be used for a purpose connected with financial crime (Ferran, Goodhart, 2001: 129)

3. REVISED DIRECTIVE ON PAYMENT SERVICES (PSD 2)

Analysing the impact of Digital Age on e-finance, Dandapani (2017: 614) recognizes five key areas which are affected: cloud computing in financial services, valuation metrics for multisided platforms, quantum trading, cyber security (costs, benefits and protection) and payment systems. Since Directive 2007/64/EC the retail payments market has experienced significant technical innovation, with rapid growth in the number of electronic and mobile payments and the emergence of new types of payment services in the market place, which challenged the existing legal framework. The review of the Union legal framework on payment services have shown that significant areas of the payments market, such as card, internet and mobile payments were fragmented along national borders. (Introduction of Directive (EU) 2015/2366, OJ L 337: 36) The continued development of an integrated internal market for safe electronic payments was crucial in order to support the growth of the Union economy and to ensure that consumers, merchants and companies enjoy choice and transparency of payment services to benefit fully from the internal market. As it is said in the Introduction of PSD 2 “Due to the growing technical complexity of electronic payments, the continuously growing volumes of electronic payments worldwide and emerging types of payment services, the security risks relating to electronic payments have increased. Safe and secure payment services constitute a vital condition for a well- functioning payment services market” (Recital 7 of Directive (EU) 2015/2366, OJ L 337/36). Since the PSD 1, new services have emerged in the area of the internet payments. However, many new payment service providers were still left outside the scope of the PSD. Recent regulation on payment services has opened up market access so the PSD 2 brings to the Third Party Providers non-dis-

criminary treatment and guaranteed technical access to the banking payment systems (Mozdzyński, 2017: 51). The revised Union legal framework on payment services is complemented by Regulation (EU) 2015/751 of the European Parliament and of the Council. That Regulation introduces, in particular, rules on the charging of interchange fees for card-based transactions and aims to further accelerate the achievement of an effective integrated market for card-based payments. The revised Directive on Payment Services does not apply to the activities of cash-in-transit companies (CITs) and cash management companies (CMCs) where the activities concerned are limited to the physical transport of banknotes and coins. Also, PSD 2 should not apply to payment transactions made in cash since a single payments market for cash already exists. Nor should the revised Payment Services Directive apply to payment transactions based on paper cheques since, by their nature, paper cheques cannot be processed as efficiently as other means of payment. Analysing the revised Payment Services Directive this main objectives could be recognized: contribution to a more integrated and efficient European payments market, improving the level playing field for payment service providers and this includes new players, making payments safer and more secure and the protection of consumers (MEMO, 2018: 2). Containing all the unchanged provisions of PSD1, as well as all amended and new provisions, the PSD2 represents a revised and complete version of both existing and new rules. As with PSD1, the main objective of PSD2 are consumer protection and information obligations, transparency regarding contracts and pricing, rights and obligations regarding payment services, as well liability provisions remained in the focus of the revised Directive. In other words, PSD2 covers the relationship between a Payment Service Provider (PSP) and its corporate and retail customers (White Paper Payment Services Directive: 7).

3.1. Structure and overview of PSD2

As for the Directive itself, PSD2 consists of six parts or “Titles”. Titles I, III and IV directly impact credit institutions’ business: Title I is a summary of the Directive’s subject matter and scope, Title III deals with transparency and information requirements, Title IV regulates the authorisation and execution of payment transactions, charges, data protection, operational and security risks and the settlement of disputes. Titles II, V and VI impact credit institutions only indirectly: Title II: licensing requirements and supervisory rules for PSPs, Title V: delegated acts and regulatory technical standards and Title VI: a review clause, transitional provisions, amendments to other directives, and transposition rules (White Paper Payment Services Directive: 7). The subject Matter and Scope of the PSD2 is defined in Title I, Articles 1-4. Same as of PSD1, the subject matter of PSD2 is to provide the legal foundation for the creation of an EU/EEA wide single market for payments. The Directive distinguishes the several categories of Payment Service Provider (PSP): Credit Institutions, E-Money and Payment Institutions, Post Office Giro Institutions, The European Central Bank (ECB) and National central banks. The Directive’s scope is extended in Article 2 p. 3. (Title I) to non-EU/EEA payment transactions (currencies), and to where only one payment service provider is located in the EU/EEA. PSD2 does not add any exclusion regarding payment instruments to those already made by PSD1. The revised Directive on payment services

defines those exclusions more closely and that includes cash payments, cheques, payments between PSPs for their own account, payments between parent companies and subsidiaries, or between subsidiaries of the same parent, payments within a payment or securities settlement system between settlement agents, central counterparties, clearing houses and/or central banks and others, and PSPs, payments relating to securities asset servicing, including dividends, income or other distributions, or to redemption or sale, or by investment firms, credit institutions, collective investment undertakings or asset management companies and other entities having custody of financial instruments. (Article 3, p. a-o, PSD2) Authorisation of payment service providers and establishment of an EBA-Register are defined in Title II, Articles 5-37. The authorisation requirements and procedures for Payment Institutions (PIs), Payment Initiation Service Providers (PISPs) and Account Information Service Providers (AISPs) are set in the Title II. The same Title also regulates which payment institutions have to be registered, and lays down rules for communication with and between authorities, as well as between member states. Furthermore, section three of this Title deals with the supervision of these entities, and with the contents and maintenance of both national registers, and a new EBA Register, to record their details. Finally, it formulates the rules governing payment institutions' access to payment systems and to credit institutions' payment accounts services (Title II of PSD2, White Paper Payment Services Directive 2: 14). Title III includes Articles 38 - 60 and sets out PSD2's requirements regarding transparency of contractual conditions and the information to be provided by PSPs to PSUs and differentiates between single payment transactions and transactions under a framework contract. The focus is on the key elements of content, conditions, accessibility and charges. Rights and obligations in relation to the provision and use of payment services are defined in Title IV which includes Articles 61-103. PSD2 does not define rules for charges and deduction of fees outside European Union jurisdiction because it only applies to those parts of the payment transaction that are carried out within the European Union. In response to the recent rise in volumes of digital payments across the EU/EEA, PSD2's second major thrust is strengthening security, as well as trying to introduce a minimum standard for authentication of all electronic payments. PSD2 introduces a requirement for strong or 2-factor customer authentication (2FA) using two or more out of this three elements that have to be independent of each other: knowledge (a password or PIN), possession (a card or a token), and inherence. Exemptions are provided in Article 98.3 and following criteria: the level of risk involved in the service provided, the amount, the recurrence of the transaction, or both, or the payment channel used for the execution of the transaction. Resolving operational and security risk matter, PSD2 requires every PSP to establish a framework with appropriate mitigation measures and control mechanisms to manage its operational and security risks with regard to payments, effective incident management procedures and an annual report containing a comprehensive assessment of its operational and security risks to the competent authority.

3.2. Key benefits for consumers under the revised Directive on Payment services

There are several benefits that revised Directive on Payment services brings to the participants on the financial market. Economic benefits, improved consumer's rights and payment security are crucial. As mentioned before, thanks to the new players that have emerged in the area of internet payments, consumers have the possibility to pay instantly for their internet bookings or online shopping without the need for a credit card. These services establish a payment link between the payer and the online merchant via the payer's online banking module. That kind of innovative and low cost payment solution are called "payment initiation services" and are already offered in a number of Member States, like Sofort in Germany, iDeal in the Netherlands, Trustly in Sweden, eXpay in Poland (Mozdzyński, 2017: 59). Until revised Directive, these new providers were not regulated at EU level and their entering on the market of payments was complicated, as many barriers were preventing them from offering their solutions on a large scale and in different Member States (Mozdzyński, 2017: 51). The revised Directive covers these new payment providers (third party providers – TPP), addressing issues which may arise with respect to confidentiality, liability or security of such transactions. Furthermore, PSD2 opens possibility to lower charges for consumers and ban "surcharging" for card payments in the vast majority of cases, including all popular consumer debit and credit cards, both online and in shops (MEMO, 2018: 2). The practice of surcharging is common in some Member States, notably for online payments and specific sectors, such as the travel and hospitality industry. In all cases where card charges imposed on merchants are capped, in accordance with the complementary regulation on interchange fees for card-based payment transactions (the Interchange Fee Regulation - Regulation (EU) 2015/751 of the European Parliament and of the Council of 29 April 2015 on interchange fees for card-based payment transactions, OJ L 123, 19.5.2015, p. 1–15), merchants will no longer be allowed to surcharge consumers for using their payment card. This will apply to domestic as well as cross-border payments. The new rules contribute to a better consumer experience and more protection when paying with a card throughout the European Union. Also, this regulatory package protects consumers against fraud and other abuses and payment incidents. Another benefit for consumers surely is the fact that the new rules streamline and further harmonise the liability rules in case of unauthorised transactions, ensuring enhanced protection of the legitimate interests of payment users. Besides economic benefits, another advantage of revised Directive on payment services is additional protection of consumer's rights in the event of unauthorised debits from an account under certain conditions. A direct debit is a payment that is not initiated by the payer, but by the payee on the basis of consent of the payer to the payee. It is based on the following concept: Under PSD1, payers had the right to a refund from their payment service provider in case of a direct debit from their account, but only under certain conditions. In order to enhance consumer protection and promote legal certainty further, PSD2 provides a legislative basis for an unconditional refund right in case of a SEPA direct debit during an eight-week period from the date the funds are debited from the account. The right to a refund after the payee has initiated the payment still allows the payer to remain in control of his payment. In such cases, payers can request a refund even in the case of a disputed payment

transaction. As far as the direct debit schemes for non-euro payments are concerned, where they offer the protection as set out under PSD1, they can continue to function as they do today. However, Member States may require that for such direct debit schemes refund rights are offered that are more advantageous to payers. Consumers are also better protected when the transaction amount is not known in advance. This situation can occur in the case of car rentals, hotel bookings, or at petrol stations. The payee will only be allowed to block funds on the account of the payer if the payer has approved the exact amount that can be blocked. The payer's bank shall immediately release the blocked funds after having received the information about the exact amount and at the latest after having received the payment order.

4. THE MAIN DIFFERENCES BETWEEN PSD1 AND PSD2

The revised Payment Services Directive (PSD2), updates and complements the EU rules put in place by the Payment Services Directive (PSD1, 2007/64/EC). Its main objectives are to contribute to a more integrated and efficient European payments market, improve the level playing field for payment service providers (including new players on the market), to ensure safer and more secure payments and to protect consumers. Comparing these two Directives which are governing the payment services, the main differences are visible as follows. The revised Directive (PSD2) widens the scope of PSD1 by covering new services and players as well as by extending the scope of existing services (payment instruments issued by payment service providers that do not manage the account of the payment service user), enabling their access to payment accounts. Also, PSD2 updates the telecom exemption by limiting it mainly to micro-payments for digital services and includes transactions with third countries when only one of the payment service providers is located within the EU ("one-leg transactions"). The revised Directive on Payment services also enhances cooperation and information exchange between authorities in the context of authorisation and supervision of payment institutions. The European Banking Authority (EBA) developed a central register of authorised and registered payment institutions. The register is under development throughout 2018. and each Member State has established a register of authorised or registered payment and electronic money institutions at national level where information is updated on regular basis. To make electronic payments safer and more secure, PSD2 introduces enhanced security measures to be implemented by all payment service providers, including banks. In particular, PSD2 requires payment service providers to apply strong customer authentication (SCA) for electronic payment transactions as a general rule. All of these legal measures are strengthening the competitiveness of the market and at the same time protecting the consumer rights.

5. CONCLUSION

Adopted by the European Parliament on October 8, 2015, and by the European Union (EU) Council of Ministers on November 16, 2015, the "Directive on Payment Services in the Internal Market" (PSD2) updated the first EU Payment Services Direc-

tive published in 2007 (PSD1), which laid the legal foundation for the creation of an EU-wide single market for payments. PSD2 came into force on January 13, 2016, and is applicable from January 13, 2018, by which time member states must have adopted and published the measures necessary to implement it into their national laws. Traditionally banks have been the main institutional players in the world of money and payments, but technological development and the rise of e-commerce have created new types of needs for handling financial transactions with ease in a global environment and encouraged the emergence of new service providers. As said earlier, by 2020 it is more likely that emerging economies will be the power houses of global non-cash transaction volumes growth so the major impacts and changes due to PSD 2 are related to the so called Third Party Providers (TTPs). The continued development of an integrated internal market for safe electronic payments is crucial in order to support the growth of the Union economy and to ensure that consumers, merchants and companies enjoy choice and transparency of payment services to benefit fully from the internal market. The revised Directive on Payment Services introduced a neutral definition of acquiring of payment transactions in order to capture not only the traditional acquiring models structured around the use of payment cards, but also different business models, including those where more than one acquirer is involved. This ensures that merchants receive the same protection, regardless of the payment instrument used, where the activity is the same as the acquiring of card transactions. Also, the Directive ensures continuity in the market, enabling existing and new service providers, regardless of the business model applied by them, to offer their services with a clear and harmonised regulatory framework. The revised rules of Directive on Payment Services are ensuring the security of payment transactions and improving customer protection against demonstrable risk of fraud. Furthermore, the revised Directive on Payment Services is stimulating competition in the electronic payments market, by providing the necessary legal certainty for companies to enter or continue in the market. All of this is allowing consumers to benefit from more and better choices between different types of payment services and service providers.

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E-COMMERCE: THE CASE OF CROATIA

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Abstract

Electronic commerce (e-commerce) is a modern trade form, one represented with increased frequency both globally and within Croatia. When compared to the other Western countries, the role of e-commerce within Croatia is severely lacking, due to the ever-present traditional purchasing behaviour, founded on the need to physically examine the products before acquiring them. Overall, the degree of e-commerce has expanded for a number of industries, namely the ones dealing with electronics, automobiles, clothing, footwear, food, tourism and tourism-related products. Within the food industry, the delivery of goods to a particular home address is often carried out by the nearest distribution centre, which utilises its own means of transport. As an example of e-commerce, the service provided by Konzum is considered, showing that e-commerce activities require significant technological proficiency and expenditures, with an e-commerce prerequisite essentially being a well-developed inventory management system, so the employed automatization process tracks the expiration dates and stock quantities. Creating and maintaining this complex system presents a great challenge for businesses aiming to employ core e-commerce principles.

Key words: e-commerce, advantages, disadvantages

1. INTRODUCTION

Electronic commerce (e-commerce) is the process of buying, selling or exchanging products, services or information through computer networks (Panian, 2000). The origin of the e-commerce development is widely considered to be in 1993, when a large number of Internet-based companies emerged. E-commerce is considered to be a very profitable means of trading, due to a process that is simple, coupled with costs lower than in brick and mortar stores.

The technological advancement has fundamentally changed the manner in which people procure products and services. Online shopping is growing at a significant rate. Researchers predicted a 15 percent growth in U.S. sales and total value for online shopping between 2016 and 2017, while offline only saw a 4.5 percent increase (Leadem, 2017). Despite the promising growth of food e-commerce, the consumers are quite apprehensive regarding this particular purchasing method. Croatian consumers

still do not show an affinity for purchasing food over the Internet, while in the World this purchasing method is a part of everyday life. The use of e-commerce reduces the cost of going to the physical store to make a purchase. In addition to the financial savings, e-commerce also leads to the opportunities of reforming one's schedule, freeing up the time usually spent shopping, which means it can be spent satisfying recreational needs or taking up tasks which can yield financial benefits. The main disadvantage of using e-commerce is in the lack of physical contact with the product, to which the traditional customers are accustomed, utilizing it to mainly assess the quality of the product. In the period between 2008 and 2013, e-commerce sales increased ten times faster than in-store retail (Shopping.fm, 2018)

This paper will serve to theoretically research the challenges of present trade, with a particular regard for e-commerce of food products. The aim of the paper is to clarify the electronic commerce and its functioning, from idea to implementation, using historical and up-to-date data. Throughout this paper, the concept, development, prerequisites for the launch of electronic commerce, advantages and disadvantages and the current state of electronic trade in food products will be regarded by the example of implementation of e-commerce in Croatian leading retail company.

2. ELECTRONIC COMMERCE (IN GENERAL)

The Internet is defined as a world-wide communication network, consisting of a large number of separate computers, connected to a shared network structure (Denić, 2018). Accordingly, the Internet serves the purchaser to place orders and purchase goods, which, in essence, represents the Internet commerce. At present, the Internet commerce is a quite popular trading platform.

There are numerous definitions of electronic commerce, with one of them, provided by Panian (2000), stating that electronic commerce is a "process of buying, selling and exchanging products, services or information through a publicly available computer network, the Internet, simultaneously offering a significant cut in costs and reduction of time required for each particular transaction". The shortest and most concise definition is one given by Jevtović (2014) holding that the: "Electronic trade represents a purchase or sale of products or services over the Internet". Electronic trade provides a manufacturer with a safe and easy path to connecting with a buyer, coupled with a quite feasible means of placing and selling products.

Electronic commerce relies on several components, the mobile commerce, electronic money transfer, Internet marketing, online transactions, an integrated automated data collection system, etc. (Đokić, 2013). Modern commerce usually utilizes the *World Wide Web* for business purposes, although this does not always have to be the case.

The concept of electronic commerce can be regarded from four distinct perspectives (Spremić, 2004):

1. From the communications perspective, the electronic commerce offers the possibility of procuring information, products / services, using funds or pay-

ments made utilizing public telephone lines, computer networks or some other electronic means;

2. From the business process perspective, the electronic trade utilizes new forms of technology, in order to improve business and introduce automation into the transaction processes;
3. From the service provision perspective, the company uses electronic commerce in order to reduce service costs, coupled with an increase in product quality and a more timely delivery manner;
4. From the perspective of a virtual constructs, the electronic commerce offers means of buying and selling products via the Internet, as well as the services it provides.

Spremić (2004) contends that within electronic markets all the elements and networks are coordinated and digitized. The main advantage of electronic markets lies in the electronic connection of participants and mechanisms. It allows for a very low search costs of various different market categories. The impact of lower search costs allows for a change in sales channels and the offer of a wider product range, at lower prices.

2.1. History of e-commerce

E-commerce has been launched 40 years ago, growing ever since, in tandem with the expansion of new technologies and technological capabilities. At present, thousands of companies are being involved in the e-commerce market. The usefulness, security and the quality of e-commerce user experience have improved exponentially since its inception in the 1970's (BizIt, 2018).

The gateway for electronic trade started with the development of electronic data exchange (EDI), enabling the digital transfer of documents from one computer to another, replacing the previous fax standard. Further development was continued by M. Aldrich, who developed online shopping in 1979, by connecting a TV set, via a telephone line, to a computer, which thus processed transactions, essentially forming "distance shopping". In 1982, the French launched a forerunner of Internet, called Minitel, free to telephone subscribers, and linked numerous users via a computer network. Minitel existed until the emergence of a fully-fledged Internet (Chrisafis, 2012).

The first web server and browser was created in 1990, by Tim Berners Lee. He published a paper, titled "*Information management: A proposal*". In it, he described a manner of information transfer, utilizing Internet, by integrating hypertext, i.e. simply "clicking", which fundamentally changed the World only a few years later. The web browser he created was publicly available on the Internet. When the National Science Foundation abolished restrictions on commercial use of NET in 1991, Internet and on-line purchases rapidly expanded. In September 1995, the *National Science Foundation* (NSF) began charging fees for domain registration. At that time, 120,000 registered domain names existed, and within 3 years the number grew to over 2 million. By that time, the NSF's role came to an end, with the oversight transferred to the commercial sector.

From the very inception, there existed a considerable amount of hesitancy and concern with regard to online purchasing. However, the development of the security protocol by Netscape in 1994, the *SecureSocketLayers* / SSL encryption certificate, ensured a secure way of data transfer over the Internet. Web browsers were thus able to verify whether or not a web site had an authentic SSL certificate, and determine whether the site can be trusted or not.

In 1990, the *World Wide Web* Network was launched. It remains the most famous computer network up to date. At that point, Lee lays out the Internet communication by utilizing servers, using addresses and the corresponding programming language. Since then, the number of websites has grown rapidly, programming languages have been perfected, and the use of the Internet is everyday life.

2.2. E-commerce advantages

Contrasted with classical trade, e-commerce holds a number of advantages. The advantages are shared by the buyer, as well as the seller. Purchase over the Internet can be done quite easily, avoiding crowds and reducing the time wasted. Through e-commerce, the customer sees the offered products clearly, at any period in time, since e-commerce does not have operating hours (it is literally 24/7). "Quality websites often provide more information, in a more useful form than can present even the most skilful salesperson (Kuzic, 2002). When purchasing over the Internet, the customer has greater freedom, with the retailer always available. The trader also has a pretty good insight into the demand of products offered.

From the customer's viewpoint, the advantages are as follows (Babić et al., 2011): increased market size (global market), avoiding the crowds in stores, making purchases from one's own home, time savings, available online trade hours are 24/7, very easy information access, information availability in just a few seconds, the ability of purchasing the latest products or services, placing orders in a timely and inexpensive manner, avoiding pressures from sales personnel, a wide range of products and services offered, fast response by sellers to inquiries and requests, real-time communication between buyers and sellers, fast delivery, lower prices of products and services, the ability of comparing prices of products and services, generally lower selling prices, selecting the most feasible product or service, loyalty awards, possibility of bidding on electronic auctions, purchasing products and services from wish lists, exchanging ideas and purchasing experiences with other buyers on-line, allowing individuals to complete tasks from home, providing access to products not available in classical stores, especially to residents of developing countries and rural areas, facilitate the provision of public services, such as police, healthcare and education.

From the seller's viewpoint, the advantages are as follows (Babić et al., 2011): lower total costs, as well as the individual, sales and delivery costs, decreased needs for storage, less paper documentation, shorter transfer channel for products, a minimum number of sales staff, timely adjustments to price and inventory changes, quick adaptation to customer requirements, short period from product placement to billing of products

and services, faster turnover rate; very quick target market detection, sales to customers located in any geographic area, „Just-in-time“ purchasing, increased competitiveness, increasing business efficiency, business flexibility, possibility of expanding to national and international markets, with minimal cash investments, potential of purchasing materials and services from other companies, quickly and at a lower cost, reduces or completely eliminates marketing channel expenditures, resulting in lower production costs, prices for creating, processing, distributing and storing products or services is reduced by 90%, with the help of a specialized digital inventory management system, it is easier to oversee the warehouse, while reducing the storage costs, reduces the cost of communication services, because the Internet option is much cheaper, allows small businesses to compete with larger companies, enables the promotion of products and services to target market segments. Website personalization, one of the online business advantages, can enhance the online shopping experience (Ferreira, 2018)

There are numerous benefits of e-commerce from both viewpoints. E-commerce expands the business market and thus increases the variety of purchasing opportunities. Customers have more information on products and services available, with a larger selection of products offered at lower prices³. Shopping becomes more convenient and more flexible, due to longer working hours, i.e. product availability is now 24/7, which is quite important for sellers as well. Considering the sellers, it is also important to emphasize that e-commerce enables the expansion to foreign markets, so that their product is available everywhere in the World. This manner of practicing business greatly reduces the numerous costs and, most importantly, the earning potential is limitless.

2.3. Disadvantages of e-commerce

The Internet commerce also has its shortcomings, which are somewhat negligible given the numerous benefits. People generally tend not to give up on Internet shopping simply because there are some disadvantages.

The disadvantages, from the customer's viewpoint are as follows (Babić et al., 2011): insecurity of Internet transactions, possible fraud risk, customer identity theft, low level of customer privacy and his/her preferences, slow and expensive Internet connection in underdeveloped areas, possibility of incorrect delivery or non-delivery, false presentation of the seller.

Disadvantages, from the seller's point of view are as follows (Babić et al., 2011): fear of non-payment, triggered by the distrust towards the buyer, high cost of finding and acquiring new customers, continuous investment in further development, in order to remain both current and relevant, the higher equipment cost for online stores, high marketing costs, lack of professional and educated staff. Despite its many conveniences, there are goods that you cannot buy online. Most of these would be in the categories of “perishable” or “odd-sized” (Khurana, 2018).

Thus, it can be concluded that e-commerce has a pronounced information asymmetry problem between sellers and customers, with the seller able to omit important shortcomings a product exhibits and the customer at the risk of obtaining a product

that will not satisfy a particular need. This problem is partly resolved through the sale of standardized products (made by renowned manufacturers), while, on the other hand, the probability of products manufactured in-house is somewhat diminished, which is precisely the reason why such products are still offered at various trade shows.

2.3. M-commerce

M-commerce is an on-line commerce that implies the use of smartphones or tablets, thus representing the most modern, 21st century trade. The origins of m-commerce are in the e-commerce and/or Internet commerce, with the mobile industry enabling the possibility of almost everyone owning a smartphone and to thus make on-line purchases. A smartphone at present occupies a vast amount of our time, thus becoming an attractive platform for companies to advertise on. An entire purchase done via smartphones is already available for approximately 15% of stores, with 42% offering Internet pages customised for mobile platforms. About 10% of sellers utilise SMS messages when informing customers and answering their queries and 6% offer websites and URLs customized especially for mobile phones(Škramić,2008).

Brick and mortar stores at present compete with the online stores by supplementing their online offer or by providing something that online stores aren't able to match, for example, a specific trade experience. As the PEW Research Center points out, the traditional concept of Internet access incorporates the idea of one sitting in front of a computer. This is no longer true, for more and more US citizens are relying on smartphones and other mobile devices to connect to the Internet and make on-line purchases. The percentage of smartphone-owning adults are 61% of the populace (which is a 35% increase from the previous three years), with the percentage being even higher among the younger generations. A small percentage of the populace does not have broadband access at home, thus relying on their mobile devices as its only source of Internet access. According to a Google research, 84% of brick-and-mortar customers use their smartphones for accessing product information and making comparisons (Business.com, 2017)

3. E-COMMERCE IN CROATIA

Electronic commerce is not a common and everyday manner of obtaining products, and therefore not a habit of Croatian customers. Market development leads to the increase of on-line trade, with the rise of Croatia's Internet commerce during the last couple of years. Paying the bills over the Internet, fulfilling administrative requirements and electronic trade are still being developed. The reason behind underdevelopment lies in the fact that the state itself is not yet involved in facilitating services in an adequate manner. Information technology illiteracy still exists in large swaths of the population. Within Croatia, there are a number of high-quality domestic Internet shops, but they are severely lacking in marketing investment. Domestic retailers are still not yet prepared to invest in e-commerce and the customers are sceptical.

There is an upward trend in Croatia's e-commerce trade growth. At present, there exist numerous providers of services dedicated to creating an on-line store (domain, e-catalogue, shopping carts, etc.). It is projected that the boom of on-line trade in Croatia is bound to occur during the coming years.

By joining the EU, Republic of Croatia removed all the customs' barriers and limits on imports from other EU member states. This leads to an increased market, with the products offered only to the internal market suddenly available to the hundreds of millions of Union customers. As long as the Croatia's citizens are concerned, customs duties towards the EU no longer exist, which allows the sale of domestic products across Europe.

In 2015, Croatia had the fastest e-commerce growth within the EU. Regardless of the growth rate, the percentage of consumers buying and selling over the Internet is still quite low, at about 25%, while the EU's average is approximately 50%. The statistics show that, from September 2011, to February 2012, 401 million EUR was spent on on-line purchases, while in the rest of EU, online purchases amounted to almost 188 billion EUR. During these six months, the Croatian customer spent on average about 227 EUR, while the average European spent around 544 EUR. In 2015, over 66% of Croatia's populace used the Internet, spending on it more than 20 hours per week. Only 25% of the companies within Croatia used it as a tool to improve sales of their products or services (Herceg, 2014).

According to a 2014 study by Perpetuum Mobile, done in cooperation with the company Zrika, conducted on a sample of over 500 respondents, the following data regarding Croatian online users were obtained. According to the research results, the online shopping practices are dominated by a younger population, from 23 to 35 years of age, making up the largest share within the overall sample, amounting to 49 percent. Older populace, between 52 and 60 years of age is responsible for 4% of on-line purchases, whilst the populace older than 60 years of age amounts to just a single percentage point of purchases. With regard to the socio-demographic characteristics of an average Croatian Internet buyer, 29% belong to a family of two children, closely followed by single persons, making up 25% of the sample.

According to the survey results, on-line buyers in Croatia are between 23 and 35 years of age, with a monthly income ranging from 5.600 to 7,800 KN, for 23% of the surveyed sample. It appears that price is the most important motivator for on-line shopping, with 76% of respondents expecting lower Internet prices than those in-store. Likewise, the delivery cost has been shown to be one of the key factors, being perceived in relation to the total value within the cart. The view that the delivery price should be in proportion to the total value of the basket, is considered by 67 percent of respondents, and 22 percent have emphasized free delivery as the decisive factor in making a purchase decision. As far as web store locations are concerned, 47% of respondents answered that they are ambivalent whether the web store is domestic or foreign, with 85% not having a favourite web store, with Amazon, eBay and DealeXtreme being the most preferable (Škramić, 2008)

The initial software applications were static. The information was seldom updated, so the user had to search other channels for information, for instance, make a query,

browse for a product, put an item into the cart, etc. At present, modern applications are constantly being updated, which means anticipating the users' needs, providing relevant information based on previous needs. Therefore, if an application recognizes that a user is interested in a specific brand or product, it will automatically send price information updates or availability information, without the user's explicit input or query. Dries Buytaert, the founder of the Web Publishing Platform at Drupal, describes what is to come as follows: "In the future, the content, products and services will find you and not vice versa. Puma will inform you of the need for replacing your own shoes and Marriott will automatically present you with room options in case you missed your connecting flight." (Deloitte, 2013)

Bluetooth-enabled devices across the store provide an additional service of continuously providing updates for the app. In case a buyer allows the incoming information, these devices will not only transmit product information, but sales receive information on purchases made by the buyer, when he/she is within range. The device can also serve to display ads tailored to the preferences and interests of a particular customer. Another key feature is the ability to process a buyer's payment instantly, eliminating the need for waiting.

Although Apple Pay and Google are still not widely prevalent, both are bound to be broadly accepted in the future. Traders had to upgrade their POS systems to accommodate usage of new EMV chips, which gradually replaced the magnetic strips. These new systems typically have the incorporated feature of reading the credit card information, as well as information on loyalty cards and gift cards, utilising mobile apps. The convenience factor here is twofold: there is no need to carry physical cards anymore, and the transaction can be concluded in a timely manner. The Research results point that 64% of smartphone users use it to make business transactions or to pay bills. Still, only a single percent of them did it by paying using a smartphone in the store itself. Interestingly, half a billion of USD is the value of all the mobile transactions in Africa. (Deloitte, 2013).

3.1. E - Commerce of food products in Konzum Click store

Konzum Click Store will be showcased as an example of Croatian retail company with implemented e- commerce.

Web site is the focal point on which the business between buyers (individuals, natural persons) and the merchant (product / service provider) takes place. Konzum Click implements a B2C trade model. In a B2C model, a consumer goes to a web site, registers, selects a catalogue, chooses a product, inserts a product into a trolley or a shopping cart, chooses the payment method and finalizes the order (by clicking), thus sending it to the merchant. Upon receiving the order, the goods are sent to the buyer.

In 2002, Konzum recognized the market need for Internet commerce, when it launched one of the first stores of this particular kind within Croatia, under the name Maxi Discount Store ("Maxi Diskont"). In 2006, Maxi Discount Store becomes the on-line.konzum.hr Internet store, which by the end of 2015 reforms as the present "Kon-

zum Click”. Through various innovations, coupled with the application of international standards, the aim is to constantly improve business, UI and quality assurance.

The Konzum Click offer includes the “carefully selected, high quality products from the food and beverage categories, fresh produce (fruits and vegetables, meat and fish, bakery and dairy products), as well as various items from the household goods segment, children’s items, beauty and care products”.

The users of the Konzum Click service choose products from the fresh assortment with increasing frequency, serving as a testament to the recognition of the quality of the products and the expertise of the staff, consistently selecting the quality goods. Also, the option of buying goods as a gift is present, at the location and time of the customer’s choosing. “Drive in” or “Pick up” services are offered as well. Consum Click gives better insight into the expenditures management, because, at any point. The contents and total price of purchases within the cart are clearly visible.

Konzum was the leading retailer in Croatia, with more than 700 stores located in all parts of Croatia, where they served more than 650,000 consumers every day (Konzum,2016) On the “Konzum Click” homepage there are many different categories of products offered as follows: Winery, Fruits and vegetables, Dairy products and eggs, Bakery, etc. To purchase on the Konzum’s online site, registration is mandatory. When registering, basic information, such as name, surname, cell phone number and the like is required. Sign-in information, such as e-mail address, password, and contact and delivery information is also necessary. Lastly, one has to accept Konzum’s terms of service.

After the registration process is complete, one can search for products and add them to the cart. At Konzum Click, over 8,000 items are available, and one can search using categories or the advanced search engine. The big difference between buying on the Internet and shopping in stores is that it is easier and faster to search for products one aims to purchase. The first step is choosing a category, then adding a product to the cart. The minimum purchase amount via Konzum Click is 200 KN. Once the purchase list is completed, one pays at the virtual cashier. Ordering and paying is done in a couple of steps, clicking on the option „Checkout“ within the option „basket“. After selecting a cashier, the pick-up method is chosen. The delivery address is selected, which shows the delivery period available. After that choice, the order is paid, upon receipt, with cash, or by credit or debit card. The order is then confirmed by clicking on it, so it arrives at the agreed upon delivery time.

Konzum Click considers that in Croatia there still exists a mistrust toward e-commerce, therefore they implement specific principles, such as:

- Fresh from us, fresh to you
- Freezing remains frozen, and the cold remains cold
- What you see on the web, you get at home
- We pack as you would, were you to go to store
- You can help us improve our services

Guided by modern global practices, the courier's professionalism and high standards are guaranteed, and you are able to evaluate the deliverer after the delivery is made. Konzum Click web pages are protected by the SecureSocketLayer safety protocol (128-bit data protection), a standardized data protection technology allowing secure data exchange between one's browser and the Click Store page.

Konzum Click also holds ISO/IEC 27001: 2005 certificates - the internationally recognized standard for implementing the Information Security Management System (ISMS) - and with the implementation of such a system, customers of Konzum Click are protected against potential security risks. For the food safety management, carriers hold ISO 22000:2005 certificates, while the systematic control of health-care products is guaranteed by HACCP (Hazard Analysis & Critical Control Point) certification.

4. CONCLUSION

E-commerce is developing due to the emergence of the Internet. At present, it is used to connect the consumers (customers) and the sellers. New technologies have greatly increased and developed e-commerce. The food sector is the most important processing industry in the Republic of Croatia, due to the fact that it employs the most people and achieves the highest income. The Internet is indeed used in Croatia, showing a stable growing trend. However, the state of e-commerce in Croatia can be greatly improved upon. Companies are, in general, suffering from a lack of information available, which is coupled with the insufficient insight into the market. M-commerce is not a continuation of e-commerce, but a separate channel that has already become revolutionary and is bound to be the future of trade. The fact that all the British customers are bound to own a smartphone by the year 2020 is an indicator of the increased exposure for a retailer utilising mobile applications. The use of mobile technology makes the purchasing experience more efficient, personal and convenient and the customer's positive of paramount importance to every seller. However, there are additional benefits to the reduction of the trader's cost. Customer empowerment, resulting in increased information availability and automatic purchases reduces the need for cashier and customer services. This can lead to the reduced labour costs, simultaneously eliminating the time and hassle of workforce redeployment, often marked by high costs. Granted, internet commerce has many disadvantages, for example, the rapidly changing technology and the international, cultural and legal barriers. The greatest advantage is the availability of the product at any time, as well as the great purchasing convenience. Creating a symbiosis between these concepts will certainly not create a utopian climate, but will create a step forward, toward the twenty-first century, no matter what the Croat's scepticism toward e-commerce may be. Finally, in comparison with the other industrial sectors, the food industry has the third greatest multiplier effect on the overall output achieved by the Croatian economy, which underlines the strategic importance of this industry. Konzum Click is a bright example that Croatian market is prepared and ready for next step in upgrading business.

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GROUP BUYING AS A FORM OF SALES

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Abstract

Group (collective) buying as a form of electronic sales (e – sales) is ever more present on the market of the Republic of Croatia during the course of the last few years. To the potential customers group buying is offered by the various Internet services. Offers of products and services are time - limited, and once the buyers purchased the goods, they will receive a coupon that allows them to consummate them. The term 'group' comes from the fact that for the shopping of goods and realization of discount is required a certain number of customers.

Group buying provides benefits for the customers and for the vendors. On this way, buyers can purchase products and services at a significantly reduced price, with the offered average discounts of 60%. Discounts can be approved for the purpose of travelling, language courses, restaurants, beauty treatments, entertainment and others. To the sellers, the group buying allows them to sell large quantities of goods, and is also in function as the way of promotion of their products. Internet services for group purchasing function as an advertisers who charge for their services. For the purpose of this research, a survey was conducted that includes a questionnaire by which we've covered 200 respondents who were asked to answer to the questions whether their use group purchases; if not what were the reasons for such decision and other attitudes about group buying.

Key words: group buying, Internet services, benefits of group buying, research

1. INTRODUCTION

Group buying (or the collective buying) is the form of sales that is run over the Internet for it is getting increasingly popular. Similar to the Internet store it has its advantages for buyers and sellers, as well as drawbacks. Some of the advantages of the group buying are: it is available to the large number of consumers, coupons are available for purchasing for their usage abroad, prices are more favourable, the seller and his products are promoted, and the purchase can be done from home and does not depend on the work time. Group buying was first initiated by the consumers in China when

they first formed groups on Internet forums and subsequently agreed to go jointly to the stores to acquire bigger discounts. This form of group buying that has been used today was initiated by Groupon.com and on the Croatian market - it was initiated by the Kolektiva.hr. The number of Internet portals that provides group buying services in the Republic of Croatia has increased on yearly basis. In the course of the group buying, Internet portals participated as intermediaries between retailers (or service providers) and coupon buyers that gather for the group buying. After the bidding on the Website, potential buyers are registered for the purchase of the product or service. If there is present sufficient number of applicants, they'll all get discounts on the purchase. For some products and services, five to ten potential buyers are needed to make the bid valid. That is why this way of selling is called group buying. For the purposes of this research paper a questionnaire survey was performed on 200 respondents from the Vukovar-Srijem and Osijek-Baranja County, with the goal set of analyzing how many consumers in these areas were informed of the group buying, whether they use it, what are their attitudes toward group buying, and what are the differences between them in accordance to their demographic characteristics.

2. ELECTRONIC COMMERCE

"Electronic commerce is a modern form of business organisation which entails the use of information technology, especially the internet" (Panian, 2002: 71). Electronic commerce, i.e. electronic delivery of products, services or information and electronic payment using a computer, or business that encompasses all forms of information exchange and business transactions for that are carried out through the information communication technology, is considered one of the most propulsive forms of modern business (Bahtijarević-Šiber, Sikavica, Pološki Vokić, 2008: 328).

Electronic commerce refers to business operations between companies, between companies and consumers, among end users, between companies and public administration or government bodies, and between citizens and public administration or government bodies. Electronic retailing is the process of online shopping which uses direct interactive electronic communication to bridge the gap between suppliers and customers with the help of multimedia in order to achieve transactions of goods or services. Online shopping refers to "remote retail" where end buyers shop and sellers can be manufacturers, wholesalers or retailers (Segetlija, 2006: 94). E-commerce can further be divided into two major areas, - trade between business entities (Business to Business, B2B), and trade oriented toward the consumer market for the purpose of everyday (non-business) consumption (Business to Customer, B2C) (Ružić, Biloš, Turkalj, 2009). The centre of electronic business operations is not a physical location, but rather a virtual or web location. Electronic market denotes an integrated electronic network of links among participants and business partners. Such links require a thorough organisational adaptation of all participants to the network, modular and virtual structures. Main components of an electronic market primarily include digital products, as well as buyers, sellers, infrastructural companies, intermediaries, supplementary services and companies which offer products and services in their web locations (Thurban, 1999).

According to Bakos, markets – both traditional and electronic – have the following three main functions: matching buyers and sellers; facilitating the exchange of information, goods, services and payments associated with market transactions; and providing an institutional infrastructure that enables the efficient functioning of the market (Bakos, 1998). The goal of a single digital market in the EU is to remove regulatory barriers among its members, and the digital market is foreseen as the future of the European economy. The European economy is trying to kick-start using the Digital Agenda for Europe, which was launched in May 2010, by providing sustainable economy and social benefits of a single digital market. In 2014, 14% of small and medium-sized enterprises in the EU had obtained sales through the Internet (European Commission, 2014). „Perceived value, confirmation and website quality are the predictors of satisfaction. The success of online shopping depends on customers repeat purchasing“ (Hsu, Chang, Chuang, 2015: 45).

3. CONCEPT OF GROUP BUYING

Group buying is a form of online shopping which has become a global trend. This type of shopping has recently been introduced to the Republic of Croatia, where there are several websites which provide group buying services.

Group buying can be defined as buying in group in order to achieve quantity discounts. „Online group buying refers to a certain number of consumers who join together as a group via Internet, for the purpose of buying a certain product with discount“ (Cheng, Huang, 2013: 185). Websites providing group buying services act as intermediaries between sellers and buyers. Group buying websites work with sellers to agree on the products and services that will be offered at discount, the amount of discount that will be granted for a specific deal, and the minimum number of customers required for an offer to become valid, after which the intermediary publishes the offer on its website. If a sufficient number of people sign up for a deal, they all receive high discounts on the advertised items from the seller. Sellers usually grant a 50% to 90% discount, and the minimum number of interested customers is determined so as to cover the cost-effectiveness threshold. Furthermore, sellers and group buying websites can also define both the minimum and the maximum number of customers interested in a given deal (Štulec, et.al., 2010).

Every offer has a specified lifespan, and the usual length of offer lifespan is one day to one week. A customer that has purchased a product or a service receives a coupon or a voucher on their e-mail address, which allows them to get a discount. To participate in group buying, a customer needs to open an account which allows group buying website to access customers' identity data and track their activity, whereas customers can easily review previous purchases, print coupons and edit their account settings (Štulec et.al., 2010). „Group buying which has generated increasing attention in recent years because of the facilitation of information and communication technology. Many different forms of group buying exist; a common characteristic is that the seller offers discounted group rates to encourage individual customers to purchase through buying groups“ (Jing, Xie, 2011: 1354).

The group buying phenomenon was launched in 2008 by the American website Groupon.com, although the concept originated much earlier in eastern cultures. According to Levy and Weitz, buyers in eastern collectivist cultures are more inclined to buy in groups than buyers in individualistic, i.e. western cultures. Collectivist cultures traditionally place a great value on price sensitivity and prudence, and those cultural characteristics have contributed to the acceptance of bargaining as a common form of trading (Fang, 1999).

Group buying for the purpose of receiving quantity discount was first practiced in China. Later the practice has been taken to Internet forums and chat rooms, where buyers grouped themselves according to their similar needs in order to collectively buy furniture, appliances, food and cars. Such practice is known as *tuángòu* (Aredy, 2006). Once a sufficiently large group was formed, its members agreed to meet in a certain place at a certain time, appearing together unannounced at a retail store and demanding a discounted price for the products they wished to buy.

This concept quickly became popular all around the world. In two years, Groupon.com sold more than 15 million coupons, thus saving its users more than 656 million dollars. However, this is not the only reason why Groupon.com is considered a market leader; another reason is the number of cities covered by its deals – 70 cities in North America and 140 cities across the globe (McIntosh, 2010). In China, which is considered as the initiator of group buying, there are more than 1215 Internet service companies that operate through group buying, and in Taiwan, group buying has become very popular, because buyers consequently save money. Customer satisfaction with the group buying is determined with customer trust in the service and with the observed consumer reciprocity (Shiao, Luo, 2012.).

Group buying has various advantages for both sellers and buyers. Benefits for the buyers include all the typical benefits of electronic trade and an additional benefit of group buying – great discounts. Furthermore, the group buying concept allows customers to discover their cities and to enjoy things they did not know existed or were unable to afford; for example, massages, beauty services, dinners at restaurants, tickets for concerts and theatrical performances, magazine and journal subscriptions, gym memberships, dance courses, language learning, etc. On the other hand, the benefits for the sellers are not exclusively of financial nature and are therefore more difficult to determine. It is important to mention that Internet platforms are an excellent way to promote group buying. For a deal to become valid, it needs to be bought by a minimum number of customers. Therefore, interested customers are self-motivated to inform their friends and acquaintances about the deal. This form of promotion allows companies to reach new customer segments that are more likely to notice an ad on a computer screen than in printed form due to their lifestyle. Users of such services are computer literate, they do not have an aversion to electronic commerce and are mostly members of social networks. Because of the social networks, the reach of information dissemination is virtually unlimited. If a particular social network user decides to keep track of daily deals through the social network, the deal of the day will not be visible only to him/her, but to all his/her friends as well (Štulec, et.al., 2010).

Since group buying websites publish offers on their pages free of charge, group buying can be considered a form of free promotion. Unlike traditional forms of promotion, which require payment regardless of achieved results, group buying websites take compensation only if minimum specified results have been achieved. It should be borne in mind, though, that when the offer becomes valid, sellers suffer profit loss because products and services are often being sold on the verge of profitability. Benefits are especially great for small businesses which cannot afford advertising through mass media, so group buying websites can be seen as an excellent way of familiarising potential customers with products and services of small businesses (Štulec et.al., 2010).

In the Republic of Croatia, group buying websites emerged several years ago. Domestic websites communicate with their users in an informal way, adding an appropriate dose of humor, which leads to the conclusion that the target market is composed mainly of the younger population. Domestic websites mostly adopt the proven practices used by foreign group buying websites, such as daily new deals, orientation towards local markets, informing users about deals of the day via electronic mail and social networks, etc. (Štulec et.al., 2010).

So far, domestic websites mostly offered services, but more products are expected to be offered in the near future. Judging by foreign group buying websites, it is realistic to expect that these will include products of a lower price range, such as fashion accessories, cosmetics, books, clothes and similar.

4. METHODOLOGY OF RESEARCH AND SET HYPOTHESES

For the research purposes, primary research was set among the consumers in Vukovar-Srijem and Osijek-Baranja County, during the period from May to the end of June 2018. The research was conducted by implementation of a questionnaire survey that consisted of 20 questions. The survey questionnaire consisted of five closed-type questions related to the demographic characteristics of the respondents (those were of gender, age, level of education, working and marital status), the closed-type questions that were related to purchases through the group buying, and also a number of claims related to group buying where the respondents rated their degree of agreement on the scale of 1 to 5. During the course of the survey, in total of 200 of valid questionnaires were collected.

The statistical analysis was performed using the IBM SPSS Statistics 19.0. statistical software package. The data distribution was tested by the Shapiro-Wilk test, and it was found that all the variables have abnormal distributions. Descriptive statistics for the numerical variables has been displayed by the absolute values and percentages. Descriptive statistics for numeric variables was displayed by means of the arithmetic mean (AS) and a standard deviation (SD), median value and interquartile range (IQR) values, and also by minimum and maximum values. Differences found by gender, marital status, education level and employment status are shown using the Mann-Whitney U test (gender, marital status and level of education) and the Kruskal-Wallis ANOVA (for the employment status and the numerical variables of abnormal distribution). Us-

ing the Kruskal-Wallis analysis of variance, therefore statistically significant difference was determined and post hoc test by Dunn has been done to determine between which groups a difference has been spotted. By proceeding with the correlation of buying with the age of the respondents by the means of the group buying, also the questions were correlated about attitudes towards group buying: 7-9; 12-20. The level of significance of $\alpha \leq 0.05$ was applied.

In accordance with the set theoretical-methodological approach and the subject-related problem, it is possible to imply several hypotheses:

- H_1 – By means of the group buying, women usually buy travel coupons.
- H_2 – Informing upon the group buying depends on the education level.
- H_3 – There are different attitudes that exist towards group buying once the age of the buyer has been considered.

5. RESULTS AND ANALYSIS OF THE CONDUCTED RESEARCH ON USAGE AND ATTITUDES TOWARDS GROUP BUYING

From Table 1 are visible demographic characteristics of the respondents.

Table 1. Demographic characteristics of the respondents

Variables	N	Median	IQR	Min	Max
Men	91				
Women	109				
Age (years)		30	17,5	19	75
Not married	95				
Married	96				
Widow / widower	3				
Divorced	6				
Without school education	1				
Elementary School	6				
Secondary school	100				
Vocational Study / High education – University degree / PhD	93				
Employed	120				
Unemployed	17				
Retired	18				
Housewife	2				
Student	43				

Source: author’s data

Of all the respondents, 45,5% were men, and 54,5% were women. Not married respondents were present by 47,5%, married 48%, widowers by 1,5% and divorced indi-

viduals by 3%. In accordance to the level of education in the observed sample, there were 0,5% of respondents without completed primary school, 3% of respondents with completed elementary school, 50% of respondents with completed secondary education and 46,5% of highly educated respondents. In accordance to the working status, there were 60% of employed persons, 8,5% of them were unemployed, 9% retired, 1% of housewives and 21,5% of students. From Table 2 is visible buying through the group buying mode, facts and awareness about buying, and also the buying patterns for the total sample.

Table 2. Buying through group buying, awareness and buying modes

Variables	N	Median	IQR	Min	Max
Buying through group buying					
Yes	79				
No	121				
Awareness		3	2,8	1	5
Buying online (N = 80)		4	2	1	5
Confidence in buying over the Internet (N = 80)		4	1,8	1	5
Through the media	20				
Through friends and family	29				
Randomly, on the Internet	31				
Crno jaje	32				
KupiMe	5				
Dajsve	0				
Promotiva	6				
TiDamTiDam	0				
Others	36				
Number of coupons that were purchased annually (N = 79)		2	3	1	20

Source: author's data

In the total sample, 60,5% of all respondents replied that they did not buy through the group buying, but 39,5% of respondents did. Fairly large degree of agreement among the respondents has been settled upon claims that they buy over the Internet, for being informed and having confidence when buying (via the Internet). Around 25% of respondents found out about group buying through the media, 36,3 % of the respondents through their friends and families, and 38,8% of all the respondents found such information's randomly online. When we're looking at the portals that were used for the group buying activities, the 45,6 % of the respondents used other than listed; "Crno jaje" used 40,5%, and "Promotiva" 7.6% of the respondents. The average number of vouchers purchased per year is three. In the Table 3 are listed respondents views of the group buying on the total sample of respondents.

Table 3. The respondents’ attitudes about group buying

Variables	Median	IQR	Min	Max
Group buying has a favourable price.	4	2	1	5
Group buying is complicated.	3	1	1	5
Through group buying I usually buy travel coupons.	4	3	1	5
Through group buying I usually buy coupons for beauty and health.	3	3	1	5
Through group buying I usually buy coupons for restaurants.	2	2	1	5
The price is my deciding factor when choosing a portal for group buying.	4	1	1	5
The layout and simplicity of the portal’s Web page is a decisive factor for group buying.	3	1	1	5
I consider that offer for the group buying is the largest for the City of Zagreb.	4	2	1	5

Source: author’s data.

From the Table 3 it can be seen that there is fairly large degree of agreement with the claims that group buying manage favourable prices; most often, the group buying are used to buy travel coupons. The price of the goods is a decisive factor when selecting a portal for group buying and we’ve found that there is quite large degree of agreement with the statement that the largest offer for the group buying exist in the City of Zagreb. There was achieved low level of agreement between respondents towards the claim that respondents usually buy restaurant coupons through group buying.

From the total sample, 39,6% of surveyed men buy through the group buying, what is also true for the 39,4% of women. Given the gender of the respondents, no significant difference was found in the claims about the ways of finding out about the group buying and the ways to buy. In Table 4 are shown the views on group buying with regard to the respondents’ gender.

Table 4. Respondents views on group buying with regard to gender

Variables	Men				Women				p
	Median	IQR	Min	Max	Median	IQR	Min	Max	
Group buying has a favourable price.	4	1,8	3	5	4	2	1	5	0,695 ^c
Group buying is complicated.	2	1	1	5	3	1	1	5	0,984 ^c
Through group buying I usually buy travel coupons.	3	2,8	1	5	4	3	1	5	0,026 ^{c *}
Through group buying I usually buy coupons for beauty and health.	2	2	1	5	3	3	1	5	0,114 ^c
Through group buying I usually buy coupons for restaurants.	2	2,8	1	5	1	2	1	5	0,020 ^{c *}
The price is my deciding factor when choosing a portal for group buying.	4	1	1	5	4	1	1	5	0,472 ^c
The layout and simplicity of portal is a decisive factor for group buying.	4	1	1	5	3	1	1	5	0,496 ^c
I consider that the offer for the group buying is the largest for the city of Zagreb.	4	2	1	5	4	2	1	5	0,726 ^c

Mann Whitney U test; * statistically significant

Source: author's data

From Table 4 is visible that women are more likely to buy travel coupons than men, and by this is confirmed the hypothesis H_1 (By means of group buying, women most often buys travel coupons). Neither women nor men are inclined to buy coupons for restaurants, and it was found that the women are not inclined to do so as opposed to men.

Given the marital status of the respondents, no significant differences were found among the claims about the ways of finding out about group buying and also how to buy. In Table 5 are shown attitudes of respondents with regard to their marital status. Considering that in the total number of sample were 0 widowed and the 3 divorced respondents; these were not included in the analysis, because these values were too small to count on.

Table 5. Attitudes of respondents when considering group buying with regard to their marital status

Variables	Not married				Married				p
	Median	IQR	Min	Max	Median	IQR	Min	Max	
Group buying has a favourable price.	4	1	1	5	4	1,5	3	5	0,151 ^c
Group buying is complicated.	3	1	1	5	2	1	1	5	0,930 ^c
Through group buying I usually buy travel coupons.	2	3	1	5	4	1,5	1	5	< 0,001 ^{c *}
Through group buying I usually buy coupons for beauty and health.	2	3	1	5	3	3	1	5	0,970 ^c
Through group buying I usually buy coupons for restaurants.	2	2	1	4	2	2,5	1	5	0,839 ^c
The price is my deciding factor when choosing a portal for group buying.	4	2	1	5	5	1	1	5	0,035 ^{c *}
The layout and simplicity of the portal is a decisive factor for group buying.	3	1	1	5	4	1,5	1	5	0,053 ^c
I consider that the offer for the group buying is the largest for the City of Zagreb.	4	2	1	5	4	2	1	5	0,217 ^c

^aand ^b Fisher's exact test; ^b Hi- square test; ^c Mann Whitney U test
Source: author's data

Through group buying, buys 44,2% of those respondents who are not married, and the same is true for the 35,4% of the married respondents. Respondents who are married are more inclined to buy travel coupons than those who are not married. For those who are married, the price is deciding factor when choosing a portal for the group buying. In Table 6 are shown differences in the level of education. Given the negligible number of respondents from the categories “without school” and “elementary school”, in the survey we included only those individuals with the completed secondary school and highly educated persons.

Table 6. Differences between education levels of the respondents, group buying, awareness and the ways of buying

Variables	Secondary education (N = 100)							Higher and high qualifications (N = 93)							
	N	AS	SD	Med	IQR	Min	Max	N	AS	SD	Med	IQR	Min	Max	p
Purchasing through group buying															
Yes	39							40							0,337 ^a
No	61							53							
Awareness		3,6	1,3	4	2	1	5		4,2	0,7	4	1	3	5	0,007 ^{c*}
Buying over the Internet		3,5	1	4	1	1	5		4,2	0,9	4	1	1	5	0,001 ^{c*}
Trust when buying over the Internet		3,4	1,1	4	1	1	5		4,1	0,8	4	2	3	5	0,006 ^{c*}
The way of learning about the group buying															
Through the media	8							12							0,584 ^b
Through friends and family	14							15							
Randomly, on the Internet	17							14							
Used portals for group buying															
Crno jaje	13							19							0,723 ^b
KupiMe	3							2							
Dajšve	0							0							
Promotiva	3							3							
TiDamTiDam	0							0							
Others	19							17							
Number of coupons purchased annually		2,8	2	2	3	1	10		3,5	3,9	2	2,5	1	20	0,976 ^c

and Fisher's exact test; ^b Hi- square test; ^c Mann Whitney U test; * statistically significant

Source: author's data

Table 7. Attitudes of respondents considering group buying by their education level

Variables	Secondary education (N = 38)						Higher and high qualifications (N = 41)					
	AS	SD	Median	IQR	Min	Max	AS	SD	Median	IQR	Min	Max
Group buying has a favourable price.	3,7	0,8	4	1	3	5	4,1	0,9	4	1	1	5
Group buying is complicated.	2,5	0,8	3	1	1	4	2,6	1,3	2	2	1	5
Through group buying I usually buy travel coupons.	2,7	1,5	3	3	1	5	3,8	1,2	4	2	1	5
Through group buying I usually buy coupons for beauty and health.	2,7	1,3	3	3	1	5	2,4	1,2	2	2,5	1	5
Through group purchases I usually buy coupons for restaurants.	2,4	1,3	2	2,3	1	5	1,9	1,1	1	2	1	5
The price is my deciding factor when choosing a portal for a group buying.	4	1	4	2	1	5	4,2	1	4	1	1	5
The layout and simplicity of the portal is a decisive factor for group buying.	3,6	1,1	3,5	1,3	1	5	3,2	1,3	3	2	1	5
I consider that the offer for the group buying is the largest for the City of Zagreb.	3,7	1,3	4	2	1	5	4	1,2	5	2	1	5

^ Mann Whitney U test ; * statistically significant
Source: author's data

Of respondents with secondary education, 39% of them purchased through group buying and also 43% of highly educated respondents do. It was determined a statistically significant correlation between the level of education of respondents and gaining information's about the group buying ($p = 0,007$), online buying ($p = 0,001$) and also trust in online buying ($p = 0,006$). Higher educated respondents are more informed about group buying than those with the completed secondary education ($AS = 4,2$), and therefore the H_2 hypothesis was confirmed (Information on group buying depends on a degree of education). Also, highly educated respondents buy more online and have a greater trust in online shopping than those who have completed only secondary school. Table 7 shows the attitudes of respondents about group buying by the level of education.

It is identified a statistically significant correlation between the level of education of respondents and their claim that group buys have favourable prices ($p = 0,009$), and also claims that with the use of group buying they usually buy travel coupons ($p = 0,001$). Highly educated respondents are more inclined to purchase travel coupons then the respondents that hold only secondary education degree.

In terms of work status, no distinction has been made between buying through group buying, acquiring knowledge (information's) about group buying, and also information about buying patterns. Through the group buying buys 43,3% of employed respondents, 41,2% of unemployed respondents and 46,5% of students. There is a statistically significant difference that exists between the working status of respondents and the claim that group buying is the most commonly used to buy travel coupons ($p < 0,001$). According to the post hoc test done by Dunn, there was a difference between the exact subgroups; there is a difference between subgroup of students and employees, and there is no difference between the unemployed and the students ($p = 0,081$). Therefore, students significantly lesser buy travel packages by means of the group buying. From Table 8 are visible correlation of the age of the respondents and the attitudes as opposed to a group buying.

Table 8. Set correlation of the respondents' age towards attitudes about group buying

Variables	p	Spearman coefficient of correlation (ρ)
Awareness	0,015	-0.172
Group buying offer favourable prices	0,015	0,274
I usually buy travel coupons through group buying	<0.001	0,530
I usually buy coupons for restaurants through group buying	0,041	-0.230
The price is a decisive factor when choosing a portal for the group buying	0,034	0,239
I consider that the offer for the group buying is the largest for the City of Zagreb	0,006	.309

Source: author's data

The correlations of the age of the respondents with attitudes towards group buying are weak, with the exception of the claim associated with the moderate correlation

that the respondents are buying coupons through group buying. With this analysis we have found that younger respondents are generally more informed about group buying; what are the respondents older they more agree with the claim that the group buying offers favourable prices. Older people often buy coupons for travel, while younger respondents tend to buy coupons for restaurants; what explains why, for what the respondents are older, for them the price is the most important factor, and they also consider that the offer for the City of Zagreb is the largest. With this assertion, the H_3 is confirmed. (Different views exist on the aspect of the group buying when considering the age of the respondents).

6. CONCLUSION

The obtained results of the research that was carried out point out to the differences in customer characteristics and the use of group buying. Less than half of the respondents buy goods by means of the group buying (39,5%). The largest number of respondents has found out about group buying accidentally via the Internet, and on average, every respondent who buys through a group buying annually buys three coupons. Respondents confirmed that group buying offer favourable prices, and most often do they buy travel coupons. Of all the respondents, women tend to buy travel coupons (therefore, it is confirmed H_1 hypothesis). Highly educated respondents in a larger percentage are buying through group buying, as opposed to the respondents with the secondary school degree, and also the highly educated respondents are more informed about it (confirmed H_2 hypothesis). The results of this research also point out to different views on group buying when related to age of the respondents. Older respondents are more agreeable when the group buying has favourable prices and often buy travel coupons, while the younger respondents are prone to buying coupons for restaurants and they are better informed about it (thus, the H_3 hypothesis has been also confirmed).

The results of this research shall provide basic information's to the owners of the Internet portals for the group buying and to the marketers, who on this way, sell and promote themselves and their products on the market segments that should be focussed to, and also to maintain focus on the consumers' attitudes and their preferences.

Since the concept of the group buying is still relatively new, there is a need for the additional marketing efforts to be made in order to maintain better sales results and to expand their offer and the sales areas.

As for the objects for the future research, it might be possible to determine the differences in attitudes of respondents towards group buying between counties in the Republic of Croatia, especially in the City of Zagreb, where large supply of products and services for the group buying exists. Also, similar research could be carried out for the period of several years with a goal to determine the differences with this research. Research on group buying could also be carried out by exploring the market offer for the group buying in the Republic of Croatia.

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