EXPENDITURE ON CATERING SERVICES ACROSS EUROPEAN HOUSEHOLDS’ BUDGETS

Marlena Piekut¹ ✉, Marina Valentukevičienė²

¹ Warsaw University of Technology
² Vilnius Gediminas Technical University

ABSTRACT

The aim of the paper is to recognize and estimate alterations in expenditures on catering services across European households, with particular emphasis on households in Poland. The research material was obtained from the Statistics of Poland (GUS) and Eurostat. The research covers 2012 and 2016. It showed the increase of the share of expenditure on catering in total expenditure. It also showed statistically significant differences in the share for expenditure on catering in total expenditure between EU countries and types of Polish households by their demographic and social characteristics.

Key words: determinants of consumption, services, households, catering

JEL codes: D12, E21, O14, P46, R20

INTRODUCTION

Households with relatively large discretionary income make use of services [Zalega 2008], including catering services, with increasing frequency and range. The catering services satisfy consumer needs not only with food requirements but also with filling leisure time. Making use of them provides also other benefits, among them enrichment of consumption value, more efficient performance of household and better access to civilization achievements (e.g. ordering meals on-line). Moreover, this kind of services improves both personality development and forms of spending leisure time [Dąbrowska and Janoś-Kresło 2007]. European society welfare is increasing year on year, so more and more money is spent on eating out. Spending money on catering services is also the consequence of life style and household structure. It has become fashionable to celebrate family occasional events in a restaurant or to participate in tourist trips, which is coherent to eating out [Gutkowska and Piekut 2016]. People purchase and consume more food outside, rather than at home, due to the changing compositions of households (more elderly people, more singles) and their increasingly busy lives [Ingenbleek and Zhao 2018]. However, there are significant disparities in expenditures on catering services between households in different countries as well as between different types of households in the same country. The reasons for this state may be found in particular socio-demographic, location-based and financial situation of households as well as in diverse hierarchy of values and, consequently, hierarchy of needs. By further analyzing we can decide about future needs in catering services. According to Neto et al. [2016], the food and catering service sector involved more than 1.5 million enterprises, had a total turnover of approximately EUR
354 billion, and employed 8 million people around the Europe.

In the paper, the attention has been focused on the share of catering services in total expenditures across European countries. Moreover, an attempt was made to estimate character of expenditures on catering services and the factors (determinants) deciding on eating out in Polish households.

Thus, the aim of the paper is recognition and estimation of alterations in expenditures on catering services across European households, with particular emphasis to households in Poland. Poland joined the EU in 2004 together with many other countries of Central and Eastern Europe. In the newly-born EU-countries, macroeconomic and microeconomic indicators are slightly different from the countries of Western Europe. Central and Eastern European markets include relatively poorer consumers, but these are prospective markets. Consumers from Central and Eastern European countries follow to consumers from Western Europe. It is pointed out [Mazurek-Lopacińska and Sobocińska 2015] that in Poland, there are changes in consumption, which are expressed by reducing the distances between Polish consumers and consumers from highly developed economies of the EU countries. It can be assumed that in other countries from Central and Eastern Europe these distances are reduced.

The emerging middle class in the Central and Eastern European countries of consumers plays a large role. This class is an important economic and social actor because of its role as an engine of growth and an agent of social-economic development [Chun et al. 2017]. Central and Eastern European consumers are repeatedly the chief target of consumer-focused businesses because of their large size and discretionary spending power. In order to reach consumers, however, companies need a understanding levels of their income and expenditure, and also their spending priorities, values and attitudes [Euromonitor International 2015]. Consumers from Central and Eastern Europe can be extremely diverse.

Catering services meet the necessities of consumers and improve quality of their lives. Nowadays, servicization of consumption determines the standard, level and modernity of life style [Radziukiewicz 2012], so the defined scope of analysis seems to be relevant and important.

LITERATURE REVIEW

A consumer’s behavior is influenced by many factors. The trends in consumption play a significant role in consumers behavior. The macrotrends that shape the purchasing behavior of households include, among others: asymmetry of income distribution both between groups of countries and within individual countries; changes in consumer value systems; servicization of consumption; changes caused by the development of new, non-standard forms of employment; increasing consumer mobility; growing interest in products that facilitate everyday life; increasing the scope and frequency of using the Internet; searching for sensations in consumption; individualizing the offer and co-participating in its creation [Mazurek-Lopacińska 2007, Mruk 2007, Zalega 2012]. Next to macrotrends, there are many micro- and macroeconomic determinants that influence consumer behavior. These factors have distinct characteristics that can be divided to social-economic, personal, cultural and psychological categories.

In microeconomic terms, economic-social factors affect consumer behavior significantly. Every consumer has someone around influencing their buying decisions. The important social determinants are reference groups and status. The group to which a consumer belongs influences the self-image of consumers and consumers’ behavior. The groups to which a consumer does not belong yet can also influence. These aspiration groups are groups where a consumer aspires to belong and wants to be part in the future [Khan 2006, Kotler and Armstrong 2010]. Social-economic status reflects the position that individuals have in social groups based on such things as money and wealth, education and occupation. In many societies status is important and people want the admiration of others. Product, brand selection, services use often reflects the social role and status [Wright 2006].

Consumer’s decisions are influenced by demographic factors such as an age, sex, life cycle stage,
marital status. The age of consumers change purchasing behavior. Traditionally a family life cycle included only young singles and married couples with children, but nowadays are alternative, nontraditional households such as single parents, childless couples, unmarried couples with children, same sex couples, and singles marrying later in life [Kotler and Armstrong 2010]. The place of residence of consumers is also very important. People from cities have easier access to infrastructure.

Consumers are increasingly using services. Services are an increasingly important point in total household expenditures. There are significant disparities in access to the market of catering services not only between different countries but also between different types of households in the same country. Catering services belong to higher-level needs, therefore they are more expected in households with better financial situation, although it is indicated that they depend on several variables describing households [Díaz-Méndez and García-Espejo 2012, Liu et al. 2013, Piekut and Gutkowska 2013]. Household expenditures on catering services are formed by many different macroeconomic, political and social determinants, including the following: GDP value in the country, unemployment level, general situation on labor market, alterations in household structure, activity of some social groups on labor market, ageing society, political changes, accessibility of services, price level, etc.; determinants indirectly affecting decision of household members, as well as micro-economical ones (direct). The complex interaction between consumers’ everyday doings and contextual material and social processes, and also an abstraction consisting of a constellation of conceptual elements were analyzed by coauthors from Finland [Syrjälä et al. 2017].

Especially worthy of note are micro-economical determinants such as: household incomes (e.g. salary, loans, savings, affluence level), household members’ position on labor market (e.g. professionally-active, unemployed, student, etc.) socio-demographic factors (e.g. size or biological type of household, place of dwelling, household members’ age and education level, etc.), and also cultural ones (preferences, norms, values, attitude to tradition, etc.).

METHODS OF CATEGORIZATION OF EU HOUSEHOLDS BY TYPE OF EXPENDITURES ON CATERING SERVICES

The research material comes from Eurostat database and Statistics Poland (GUS) household budget survey of 2012 and 2016 [GUS 2012–2016]. The Polish databases are comprised of above 37 thousand households. The choice of the research period was dictated by the willingness to observe changes in spending on services after the financial and economic crisis.

To create groups and to illustrate the similarities and differences in the share of catering expenditure in the EU countries, it used Ward’s method. In Ward’s method deploys the analysis of variance approach to determine the distances between groups (clusters). This method minimizes the increase of the total within-cluster sums of squares, which is also known as the error sums of squares (ESS), measures the extent to which the analyzed variables in a given group differs from groups mean. At the beginning of the procedure, it is assumed that each object is a separate cluster. Then the pair of most similar groups (with minimum between-cluster distance) are merged. At the initial step, all groups are singletons (clusters containing a single point). The sum of squares starts out at 0 (because every point is in its own group) and then grows as we merge groups. Ward’s method keeps this growth as small as possible. The sum of squares should be small [Murtagh and Legendre 2014]. The square Euclidean distance was used with this clustering method. This method is considered effective because it ensures the heterogeneity between groups, while the homogeneity of objects within the group [Ward 1963]. Then, in the dendrogram of the clustering result, the longer branches of groups (where the distances between groups are bigger) are cut off to obtain the optimal number of groups.

The analysis of variance was used for testing the significance of differences between arithmetic means of many groups. However, Scheffé’s test was used to explore the significance of differences between pairs of variables. This is one of the tests for examining statistical significance, that allows to carry out post-hoc comparisons. This is the most conservative test.
Therefore its application results in the least number of significant differences between the means [Scheffé 1953].

The relationships between variables were identified using Pearson’s correlation coefficient. It is a measure of the linear correlation (dependence) between two variables giving a value between +1 and −1 inclusive. The Pearson’s correlation is +1 in the case of a perfect direct (increasing) linear relationship (correlation), −1 in the case of a perfect decreasing (inverse) linear relationship (anticorrelation) and 0 in the case of no linear relationship. The value of Pearson’s correlation coefficient indicates the degree of linear dependence between the variables. The weaker the relationship between the variables, the closer the coefficient is to 0.

RESULTS OF EXPENDITURES ON CATERING SERVICES IN TERMS OF SHARE AND THE LEVEL

In Europe, five groups (clusters) of countries may be distinguished with respect to the level and shares (percentage) of money allocated on catering services in total annual expenditures in 2012 and 2016. Expenditures on catering services in terms of share (percentage) and the level (sum of money) got the lowest values in Romania, Bulgaria, Lithuania and Poland. These countries were categorized as the first group. The share of expenditures on catering services in 2016 was there in the range from 2.0% of total expenditures in Romania, through 2.5% in Poland and 2.7% in Lithuania to 4.3% in Bulgaria, with annual expenditure level EUR 100–200 per capita. Similarly, these countries without Bulgaria formed one group in 2012. At the time, Bulgaria belonged to the second group. The proportion of income spent on food and non-alcoholic beverages, which is the measure of household welfare (Engel’s law) in 2016 was 27.9% in Romania, and over 22.2% in Lithuania. This share was the highest of all countries.

For the second group, covering seven European societies, the percentage of catering services in total expenses was from 4.4% in Germany, through 5.3% in Slovakia and 6.1% in Estonia to 7.7% in Hungary. The level of catering service expenses in this group was from EUR 400 in Latvia and Slovakia to EUR 800 in Germany. In 2012, the second group also consisted of seven countries, but with Bulgaria and without Germany.

The third group consists of Northern and Western European countries, i.e.: Belgium, France, Portugal, Sweden, Denmark, the Netherlands, Finland, Italy, Cyprus, Norway, the United Kingdom and Luxembourg. The percentage of catering expenditures in this group was running in the range from 5.2% in Denmark to 8.6% in Portugal and 8.7% in Cyprus, while the level of catering service was EUR 100–1,900 per capita. The percentage was comparable with preceding group, although the level of these expenses was higher. In 2012, the third group included Germany, Belgium, France, Denmark, the Netherlands, Sweden, Finland and Iceland. While countries such as Portugal, Italy, Cyprus, the United Kingdom, Norway and Luxembourg formed a separate group.

The fourth group households, i.e. households in Greece, Malta, Spain and Ireland, spent relatively high sums of money on catering services among all groups. In this group, the percentage of catering services was in the range from 11.5 to 14.8%, and the level of catering service expenses was within the scope of EUR 1,400–2,400 per capita. In 2012, the fourth group included Austria.

Finally, with respect to fifth group of households – in Austria and Iceland – the percentage of catering services expenses was respectively 10.3 and 9.5%, and these expenditures level was EUR 2,200 and EUR 2,800. In Iceland spent the most considerable sums of money on catering services of all countries.

The grouping presented above indicates that the level and share of catering services expenditures is affected by several factors, among them geographical or cultural ones.

Poor household financial situation in Romania, Lithuania and Poland results in low share of expenditures on services in total expenditures. The high level of money spent on mentioned basic necessities decides on relatively low discretionary budget, i.e. income, associated with spending on services. On the other hand, consumers from these countries seem to be a perspective group. The improving financial situation of households in these countries should lead to an increase in consumer spending on services.
Relatively not large values observed in these countries in comparison to Northern and Western European countries are probably caused by relatively worse household economic situation.

Meanwhile, intensive development of catering service market in Central and Eastern European countries has been observed for many years. It commenced from transformation of centrally-planned economies into market economies, when privatization process of economic operators started. For example, the increase of catering services in Poland began in 1988, together with the implementation the Act of 23 December 1988 on economic activity. Moreover, in Central and Eastern European countries have been observed larger annual growth rates than in Western European countries [Piekut 2015], which may indicate progressing process of harmonizing the structure of consumption expenses across Europe. In research by Díaz-Méndez and García-Espejo [2012] harmonizing of expenditures on eating-out through the European countries was pointed, however there was also noted that populations in individual countries still diverge significantly on this account. The differences are determined by economic, social, cultural and other factors. Is assumed that the willingness of poorer Central and Eastern European societies to match the higher level of Western countries may be the reason for the similarity of expenditures levels in the second and third clusters.

The differences are the result of different prices for catering services in these two groups. Both prices and incomes in Bulgaria and Romania are lower than in Denmark and Sweden.

**IMPACT OF MICROECONOMIC FACTORS ON CATERING SERVICES EXPENSES ON THE EXAMPLE OF POLAND**

The development of catering service sector, affluence, alterations in demographic structure (family composition and size) and changes in consumers’ behavior result in systematical growth of the interest in catering services. In Poland, for example, approximately 15% people eat out regularly, 35% relatively often and 32% less often than quarterly [Makro 2015]. Eating out has, first of all, social context (the main reason for it is the willingness to meet friends) and only later – convenience and saving time. According to Catering services in Poland – Report 2014, Polish consumers prefer restaurants, pizzerias, fast-food restaurants and bars with ethnic cuisine; with male customers use more frequently fast-food outlets [BROG B2B 2014].

The research on Polish households demonstrate that catering service expenditures are affected mostly by the following variables: disposable income per capita, household biological type, household size, life-cycle stage, class of dwelling place, profession and education level of household head. The correlation coefficient between catering service expenditures level and independent variables, listed above, ranged in the scope from 0.203 to 0.653. Lower values of correlation coefficients were observed between catering service expenditures level and socio-economic group, age, marital status of household head and also degree of dwelling place urbanization. As for these variables, the values of correlation coefficients altered between 0.150 and 0.195; and every relation was statistically significant. The lowest values of correlation coefficients, indicating weak but statistically significant correlation, were denoted between the level of catering service expenditures and both region of dwelling place and sex of household head.

In order to demonstrate differences and alterations in both level and percentage of catering services’ expenditures between the individual types of Polish households, for further analyses the following categorizing variables were selected: education level of household head, household biological type and the degree of dwelling place urbanization.

The education level of household head is the variable, which is relatively strongly correlating with the disposable income level per capita (correlation coefficient equal 0.350). The higher education level of household head is usually associated with the higher disposable incomes. Between all the types of households, distinguished due to the education level of household head and catering service expenditures (Scheffé’s test), statistically significant differences ($p < 0.05$) have been found.

The catering service expenditures were the smallest for households with the head having at most lower secondary education, but in the period of four years
(2012–2016) these expenditures increased by 1.3 p.p., i.e. from 1.7 (PLN 13) to 3.0% (PLN 26) of total annual expenditures. For the households with the head having higher education, these expenditures were the highest of all being compared, and, in abovementioned period, their percentage increased from 3.5 (PLN 55) to 4.9% (PLN 78) of total expenditures. However, it has also been observed that the catering service expenditures in the latter mentioned group were 4.2-fold higher than in the first one in 2012 and only 3.0-fold in 2016. It means that the distance between households with the head with highest education level and households with the head with lowest education level is diminishing.

The association of larger catering service expenditures with the higher level of education was also observed in other research [Angulo et al. 2007, Zan and Fan 2010], which is explained not only with above-average incomes in the households of better-educated people but also with the fact that better educated people more often participate in social events. Relatively high disparities between disposable incomes in households whose heads has different level of education, affect accessibility to these services. Additionally, it has been denoted that the disparities in disposable incomes between households whose members have the lowest and the highest level of education are reduced. This phenomenon may be caused by sociological imitation effect and by aspiration for getting higher position in social hierarchy by worse-educated people [Carvalho de Rezende and Stacanelli de Avelar 2012]. However, it has also been observed that educational level variable does not work in the same way in all the countries [Díaz-Méndez and García-Espejo 2012]. For example, comparison of expenditures on catering services in Spanish and British households showed that education level stronger acts on mentioned expenditures in Spanish households.

The biological type of household has been recognized as another statistically significant factor connected with expenditures on catering services. The highest level of expenditures on catering services was denoted in one-person households. The share of mentioned expenditures in total expenditures for this type of households increased by 2.2 p.p. (from 3.7 to 5.9% total expenditures) in the period of four years (2012–2016). A little lower expenditures, but still relatively high, were observed in single-parent households (i.e. single father of mother). In such single-parent families, expenditures on catering services absorbed larger part of household budgets than in single-person households. For example, in 2016, for single mothers the value was 5.8% (PLN 65) while for single fathers 7.0% (PLN 92). The least percentage of expenditures on catering services was noticed for households of other persons (not classified in other groups) with dependent children, though for these families the percentage of the abovementioned expenditures increased between 2012 and 2016 by 1.5 p.p. (from 1.3 to 3.0% of total expenditures).

It has been also indicated [Bozoğlu et al. 2013] that households with dependent children allocate more money for eating out than childless families, which is partially confirmed also in this analysis. The larger expenditures on catering services in households with dependent children may be the consequence of the fact that children often make use of fast-food services, which is confirmed by several researchers, among them Akbay et al. [2007] and Bozoğlu et al. [2013]. On the other hand, in numerous studies [Jensen and Yen 1996, Mihalopoulos and Demoussis 2001, Chang and Yen 2010, Carvalho de Rezende and Stacanelli de Avelar 2012] it was demonstrated that having dependent children negatively affects expenditure on catering services, which indicates simultaneous impact of other variables. It was also pointed [Piekut 2017], that in single-male households, especially by blue-collar workers expenditures on catering services are relatively high. This may be connected with reluctance and lack of cooking abilities in men households.

The last variable indicating differences in expenditures on catering services, expressed both as level and percentage, is the degree of urbanization in the place where a household is located. It has been observed that the less densely populated was the place of household location, the less its dwellers spent on catering services. For densely populated areas expenditures on catering services were from 2.8-fold (in 2012) to 2.4-fold (in 2016) larger in comparison to thinly-populated areas. In 2016 these expenditures on densely populated areas absorbed 4.8% (PLN 65), whereas on thinly-populated areas only 2.9% (PLN 27).
Other studies [Piekut and Gutkowska 2013] demonstrate that in the larger settlement unit (in terms of population), the expenditures on catering services were higher and they absorbed larger part of household budget. Lower expenditures on eating out were observed for rural household, especially connected with farms [Ogundari et al. 2015]. For this type of households, making use of tourism is not popular (for many reasons, mainly financial ones), whereas making use of catering services is connected with tourist trips. Other reasons for less expenditure on catering services in rural household are attributable by Piekut and Gutkowska [2013] to the lack of free time and hierarchy of value in this type of household.

CONCLUSIONS

In respect of expenditure on catering services, five groups of countries may be distinguished among all EU countries. Generally, lower expenditures on catering services in Central and Eastern European countries (in relation to total expenditure) than in Northern and Western European countries have been observed. It seems that the disposable income levels in households from individual European countries play a special role.

The expenditures on catering services depend on several variables, including strong association with education level of household head. The level of education is obviously connected with character of occupation and specific nature of profession, which determine the way of organizing of eating at home or eating out. Higher expenditures on catering services observed in households of people with higher level of education are caused by larger incomes and more frequent participation in social events.

Higher expenditures on catering services were also denoted both among single-person households, single-parent households (i.e. single father or mother) and couples with dependent children.

The significant variable in estimation of expenditures on catering services was household location. The mentioned expenditures were higher in densely populated locations than in rural territories. This is associated to better infrastructure of catering units in large cities and statistically higher incomes obtained by dwellers of cities.

To sum up, significant distinction in expenditures on catering services between households having different socio-demographic and economic features as well as their share in total expenditures has been proven. It can be assumed that these differences are significant for alternative lifestyles in those households and hierarchy of values considered by them.

REFERENCES


Bozoğlu, M., Bilgic, A., Yen, S. T., Huang, C. L. (2013). Household food expenditure at home and away from home in Turkey. Agricultural and Applied Economics Association (AAEA) and CAES joint Annual meeting, Washington DC [manuscript of presentation].


Piekut, M., Gutkowska, K. (2013). Uwarunkowania poziomu wydatków na turystykę i rekreację oraz usługi gastronomiczne i zakwaterowania w wiejskich gospodarstwach domowych [Determinants of spending on tourism and recreation as well as catering services and accommodation in rural households]. Marketing i Rynek, 8, 527–539.


WYDATKI NA USŁUGI GASTRONOMICZNE W BUDŻETACH EUROPEJCZYKÓW

STRESZCZENIE


Słowa kluczowe: determinant konsumpcji, usługi, gospodarstwo domowe, gastronomia