Structural Components of Lifestyle and Beyond: The Case of Hungary

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Abstract

This paper deals with the question of when and how lifestyle and its components are important in social stratification. There is considerable consensus among scholars about the structure of the society being a consequence of hierarchical dimensions like occupation, income, or wealth. Some thirty years ago, largely based on Bourdieu's "Distinction", a new paradigm emerged highlighting the lifestyle components and the value-oriented cultural and material consumption in stratification. The idea reflects the empirical finding that inequality between social classes has largely decreased, giving priority to horizontal lifestyle differentiation instead of vertical inequality dimensions. From a theoretical viewpoint, a challenge in the approach is finding out to what extent lifestyle typology is of a non-vertical character in reality. This social determination of lifestyle is investigated for Hungary when comparing an occupation-based typology with a consumption-based one. On the one hand, results reveal that the effects of structural components on social status are stronger than those of lifestyle. On the other hand, lifestyle turns out to be less independent of social position and the top and bottom levels of the lifestyle typology are particularly predictable by structural measures.[1]

Keywords: personal destinies, adaptation, post-socialist structural changes, and secondary sector.

Introduction

Social differentiation in modern societies can be based on vertical and horizontal dimensions. Typical vertical (and hierarchical) components of social stratification are occupational position, qualification or income. At the same time, important representatives of sociological thinking expressed their opinion that the vertical features of social inequalities have largely lost their relevance in modern societies, where differentiation tends to be based on lifestyle and consumption, which are of a horizontal character and "beyond status and class" (Beck 1992). These diversified views on stratification are quite typical, but we do not share this opinion. On the contrary, this study emphasises that lifestyle or consumption groups can be related to vertical differentiation in the society. When Bourdieu (1984) introduced his paradigm about lifestyle, his approach was clearly hierarchical and class-related. Lifestyle is widely considered as the collection of various kinds of actions and practices affected by the disposable time and money that people can use in their daily lives. The distribution of this disposable time and money is probably not independent from occupation, education or income. The core idea of lifestyle differentiation consists of a reduced level of consumption in the lower strata of the society, while the upper strata of the society have much more choice in their lifestyle. This is the approach that the present analysis takes as a starting point, in accordance with Bourdieu's view

about the society. This view is also in line with the classic Weberian theory of stratification, which stresses the importance of lifestyle and social prestige for social status groups when speaking about the 'stylization by life' (Weber 1966), and with the structurally based lifestyle concept by Sobel (1981).

Consequently, this analysis does not consider the position in the vertical hierarchy and membership in lifestyle groups as competing views on social inequalities. Though class membership can probably be better explained by structural measures than consumption (as we will outline in one of our assumptions), lifestyle is also expected to be dependent on hierarchical structural features in the society. Investigating this relationship will be at the core of this study when we search for the explanatory power of structural components in terms of life style differentiation. By aiming at this, we try to go beyond the original idea by Bourdieu on the lifestyle of various social groups in the society and the larger or smaller variety of options they may have. At the same time, when measuring lifestyle (consumption, in practical terms) the indicators (described in details below) will not be as refined as suggested by Bourdieu in his empirical work on differentiating between the cultural and economic lifestyle.

In the subsequent section, the paper briefly summarises the theory and previous studies on lifestyle analysis. Then the hypotheses are set and the data are presented. The main body of the paper comprises the descriptive outcomes and the results of the multivariate models. The last section of the paper offers a discussion of the findings.

Theory and previous research

Bourdieu's work basically reconceptualises the model of social structure by developing the idea of a sociological relationship between consumption, lifestyle and class position. Although lifestyle is based on preferences, these in turn are organised according to the fundamental structure of social differentiation. Conceptually, it is important to make a difference between a lifestyle and the necessities of daily life. Necessities are apparently connected to the structural positions in the society in the sense that the volume and configurations of consumption and lifestyle are linked to class conditions. Class conditions generate class habitus and taste, which produce lifestyle, and the outcome of this process is described by such dualities as a working-class habitus of necessity and a dominant-class habitus of distinction (Bourdieu 1984).

It is apparent that Boudieu explores the relations between lifestyle and social position in practical terms. While the empirical evidence in Bourdieu's work on this issue comes chiefly from descriptive methods like correspondence analysis, his theory can be very well applied to explanatory causal models. Several previous analyses can be quoted along these lines either with a focus on Bourdieu's cultural reproduction thesis (e.g. DiMaggio 1982. De Graaf 1989. De Graaf 1994) or with a focus on the social basis of lifestyle or cultural consumption (e.g. Ganzeboom 1982. DiMaggio and Usteem 1978, 1980).

Lifestyle analysis has a particular relevance for Hungary and also for other Central and Eastern European societies. While research in stratification and social mobility reported a relatively low level of social differentiation in terms of vertical hierarchies and a high level of social openness, lifestyle studies provided evidence of special ways and forms of social inequalities, as well as of existing structural determinism under communism (e.g. Kolosi 1993. Mateju 1990. Ganzeboom, Graaf and Róbert 1990. Róbert 1991. 1997. Böröcz and Southworth 1996. Kraaykamp and Nieuwbeerta 2000. Blaskó 2003). The general argument of these papers can be summarised by stating that the usual forms of social inequalities that existed in most of the modern market economies were largely controlled and successfully eliminated by communist policy measures, while lifestyle could not be 'nationalised' as much and its effects on inequalities and stratification could not be reduced as much.

After the collapse of communism, we can expect changes in the specific role of lifestyle and its relationship with the usual hierarchical indicators of vertical differentiation. Accordingly, Róbert (2009) investigated how the structural determination of cultural and material consumption has changed over time between 1982 and 1998 in Hungary. This study found quite a strong impact of structural measures like education, class and income on consumption. However, the expected increase of determination as measured by the adjusted R^2 coefficients was present only for education. The impact of class and income seemed to increase between 1982 and 1992, but the trend did not continue between 1992 and 1998.

The present analysis uses more recent data for investigating consumption and lifestyle in Hungary. While there is a large overlap between the structural components (independent variables), the dependent variable is defined completely differently. This time no continuous indices for cultural or material consumption were developed, and lifestyle groups were constructed instead. This paper does not deal with changes over time either. The focus is the comparison of social class and lifestyle groups, on the one hand, and the differences in how structural measures affect lifestyle in the top, middle and bottom layers of the society on the other.

Hypothesis

We formulated two hypotheses regarding the topic of the study. One refers to the influence of the structural factors on the status-related social position vs. on the lifestyle group membership of individuals. The other refers to the closer determination of the position in the lifestyle typology.

H1: Class position is more dependent on structural components than on membership in a certain consumption / lifestyle group.

This means that when using the same set of explanatory variables like demography, education, and labour market participation, the R^2 statistics will be higher in those models that intend to explain social class position than the models that explain consumption / lifestyle.

H2: The same structural components will have larger effects on those respondents who are at the top or at the bottom of the consumption / lifestyle typology than those in the middle.

In other words, this means that the consumption habits of affluent people are usually above average, while the consumption habits of the poor is usually below average and, consequently, their lifestyle is an outcome of structural features to a larger extent. At the same time, the middle class people have more opportunities to choose between different lifestyles because they may follow consumption practices in either upward or downward directions. Thus, the consumption / lifestyle groups in the middle are predictable to a lesser extent according to the R^2 statistics than the groups at the upper and lower extremes in the typology.

Measurement, data and methods

The research in this paper is based on the analytical work of the TÁRKI Social Research Institute with a focus on a new lifestyle and consumption classification. From the viewpoint of measurement issues, it is worth mentioning that TÁRKI has developed a segmentation model that uses more than 80 variables (Keller, 2008). This large set of measures was substituted with 17 primer variables, which give nearly the same outcome in the grouping of people as the original typology does. Thus, in the following analysis the lifestyle and consumption categories are based on the shortened list of 17 variables. The paper is based on the TÁRKI Household Monitor Survey, conducted at the beginning of 2010, on the national representative sample of nearly 2000 Hungarian households. The survey is primarily focused

on issues concerning labour market participation and incomes of the respondents, but it also contains a set of measures that allow reproducing the novel lifestyle and consumption segmentation model (the shortened version).

For making the classification, lifestyle dimensions were used in six consumption areas. The *housing dimension* was measured with the information reported by the interviewers on the lighting, size, quality, equipment, atmosphere of the dwelling, and whether the building was in good repair or if there was any plaster coming off in big pieces inside or outside. Measuring the *consumption of durables*, we asked whether the household possessed the following items: a microwave oven, hi-fi equipment, a freezer, a washing machine, a dishwasher, a video cassette recorder, a video camera, a DVD-player, an LCD TV, a digital photo camera and a personal car. We also took into consideration the consumption of valuables such as antique furniture or carpets, paintings or sculptures by famous artists. *Food and clothes consumption* was measured by the frequency of eating/drinking yogurt, fruit juice, cereal and seeds, salads, cheese, bread, noodles, potato, and we also counted the number of clothing items bought within the last six months, the number of shoes, and whether the respondent had suit or an overcoat. Calculating *cultural consumption*, we took into consideration whether the respondent had gone to the theatre, a concert, a museum or a movie theatre at least once in the last year; whether s/he did some sports, went out to dance, visited his/her friends, went out for a drink, or went out shopping at least once in the last month; or whether s/he spent a holiday at home or abroad at least once in the last five years. To determine the *IT consumption*, we asked whether the respondent had a telephone, a mobile phone, a pc, a laptop or palmtop, we also asked how often s/he uses the computer or the Internet; whether the respondent uses his/her mobile phone to send an SMS/MMS or browse the Internet; and how old is his/her mobile phone. The respondent's *financial consumption* was assessed by his/her bank account, banking card, depositor's book, investment securities, stocks, shares, securities and cash savings. We also measured the respondent's attitude about saving and consumption.

On these six domains, we created twelve indices using the method of principal component analysis (Appendix 1)[2]. In this twelve-dimensional space we were looking for condensations to derive the eight-category lifestyle and consumption groups. Consumption clusters were defined as typical condensation in the twelve-dimensional space using a K-Means cluster analysis (Appendix 2). It is noteworthy that in measuring the lifestyle groups we dealt with components that were vertical (e.g. housing dimension, durable goods) as well as horizontal (e.g. food and clothes consumption, saving and consumption attitudes). However, we deliberately omitted income and occupational measurements from the grouping, which would introduce more hierarchy in the structure.

To make it possible to find the link between lifestyle-based and occupation-based social structures, we created an occupation-based social class typology based on Kolosi and Róbert, 2004, and Kolosi and Keller, 2010. First, a vertical differentiation measure was created from the per capita yearly household *income* and from the earlier introduced *housing* dimension, including the market price of the dwelling and summer homes, if there were any; the durable dimension included the prices of cars and the saving dimension (this latter dimension was called *wealth*). In the construction of housing and wealth indices, we z-scored every primary variable and calculated the mean of the z-scored values in the aggregated index. From the three hierarchical indices (income, housing and wealth), we calculated a principal component called social status, which we divided into ten equal groups. Finally, the occupation-based social classes were created based on a cross-tabulation of social status and the (last[3]) occupation categories. We defined five groups according the following rules.

2 Note, when we present an overview of the analysed components in the appendices, we use the original TÁRKI-GfK segmentation model (field work in July 2008, sample size ca.: 3000). The rest of the empirical analysis, however, is based on the TÁRKI Mointor Survey (field work in February 2010, sample size ca.: 4800, more information: http://www.tarki.hu/cgi-bin/katalogus/tarkifo_hun.pl?sorszam=TDATA-H17).
3 For respondents who were no longer employed, who were temporarily unemployed, or who were retired, the last occupational position was taken into consideration. Those who never had an occupation were not included in this classification.

- *Elite*: owners of large and medium-sized businesses, freelance white-collar workers. Only top managers and white-collar workers in the top 10 per cent of the status index are included.

- *Upper middle class*: top managers outside the highest 10 per cent of the status index, mid-level managers, the self-employed group and smallholders in the top 10 per cent of the status index; and professionals in deciles 6–9 of the status index.

- *Middle class*: mid-level managers, self-employed respondents and small farmers, whose status falls outside the highest 10 percentile, professionals whose status is within deciles 1–5, lower-level managers, other white-collar (office) workers and skilled workers whose status falls within the top three deciles.

- *Working class*: skilled workers with a lower status, as well as unskilled and agricultural workers whose status indices fall into a decile of 4 or higher.

- *Deprived*: unskilled and agricultural workers in the lowest three deciles of the status index.

In the later part of our analysis, we will employ binary logistic regressions where the dependent variable will be the consumption/lifestyle groups (7 categories, since we merged the categories "elite plus" and "elite classic" due to their small proportion) and social classes (5 categories).

Referring to our first research question (H1), we will compare the explained variances in the case of consumption groups and social classes using three vectors of explanatory variables: demography (1), education (2), and labour market participation (3). This means that in this section we will employ 7+5 logistic models, and we will examine the fit of the data with these models. Note that if our hypothesis is true, the three explanatory vectors will fit better in the case of the occupation-based categories (5 binary coded variables) than in the case of the consumption/lifestyle-based models (7 binary coded variables).

In relation to our second hypotheses (H2), we will only deal with the consumption groups (7 binary coded variables). In the statistical analysis in addition to the demography, education, and labour market participation, we will use two more sets of explanatory variables: the hierarchical inequality components of income and occupation (the explanatory variables used in the models are summarised in Table 1). These two additionally introduced explanatory variables were used in the construction of the occupation-based social classes; hence, these were omitted from the models detailed in the previous paragraph. It is assumed that consumption style is partly a function of material possibilities, but partly also a function of identities and value orientation. According to the second hypothesis, our explanatory variables will perform relatively well for those lifestyle groups that are at the top or the bottom of the society. If our hypothesis fits, structural components will perform weaker in the middle of the social hierarchy, giving more priority to lifestyle and value-based consumption decisions.

Table 1: Explanatory variables used in the binary logistic models

| Explanatory variable I.	Demographic differences	male, (female), age, age squared, (village), town, country seats, Budapest
Explanatory variable II.	Education	(at basic education), vocational school, grammar school, tertiary education
Explanatory variable III.	Labour market participation	(employed), inactive, retired
Explanatory variable IV.	Occupation	top manager, middle level manager, lower level manager, skilled office workers, unskilled office workers, self-employed, skilled manual worker, unskilled manual worker, unskilled agricultural worker
Explanatory variable V.	Income	per capita yearly household income: quintiles. Reference 3rd quintile.

Variables in brackets are the reference variable.
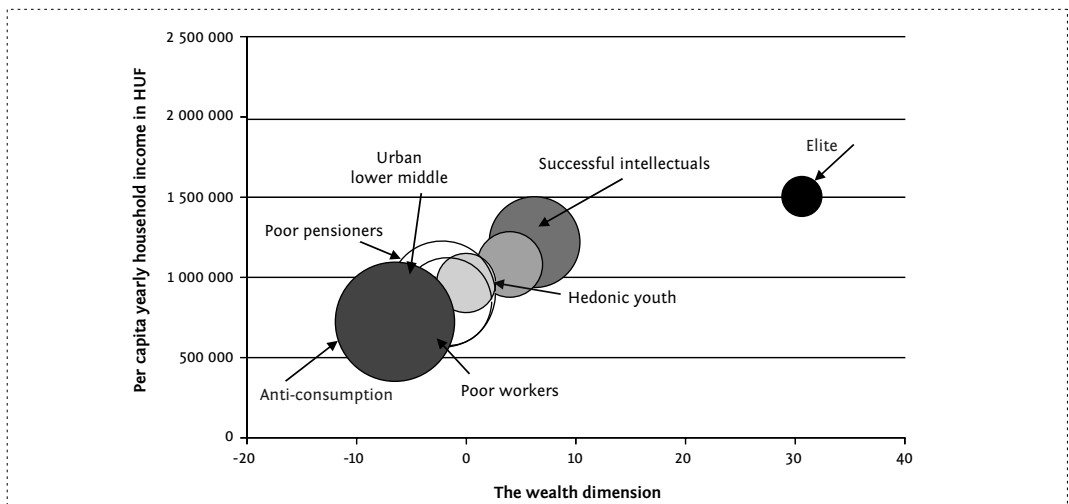Source: authors' calculations, TÁRKI Household Monitor Survey

Results

A descriptive analysis

In Figures 1a and 1b, we demonstrate the groups of the two typologies in the two-dimensional space of income and wealth. In our interpretation, income and wealth are hierarchical components of social structure. The pattern is very clear: the boundaries of consumption/lifestyle groups are less isolated than those in occupation-based typology. We should note, however, that *this is not a research finding*, it is only the consequence of our definitions, since income and wealth indices were an input of the social status index that was later used to construct the occupation-based social class typology. Some primary variables incorporated into the wealth index were also used in the creation of the consumption areas, which were the input of the consumption/lifestyle based typology.
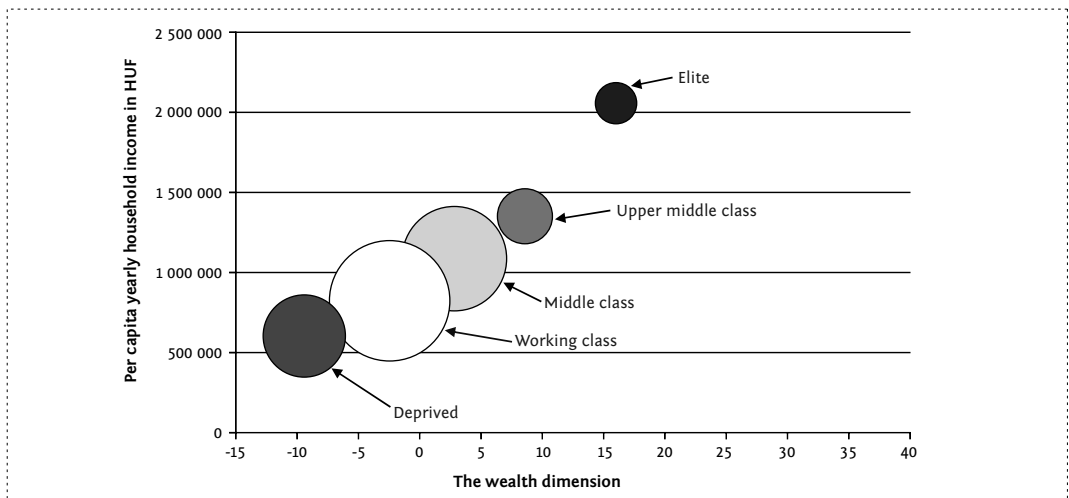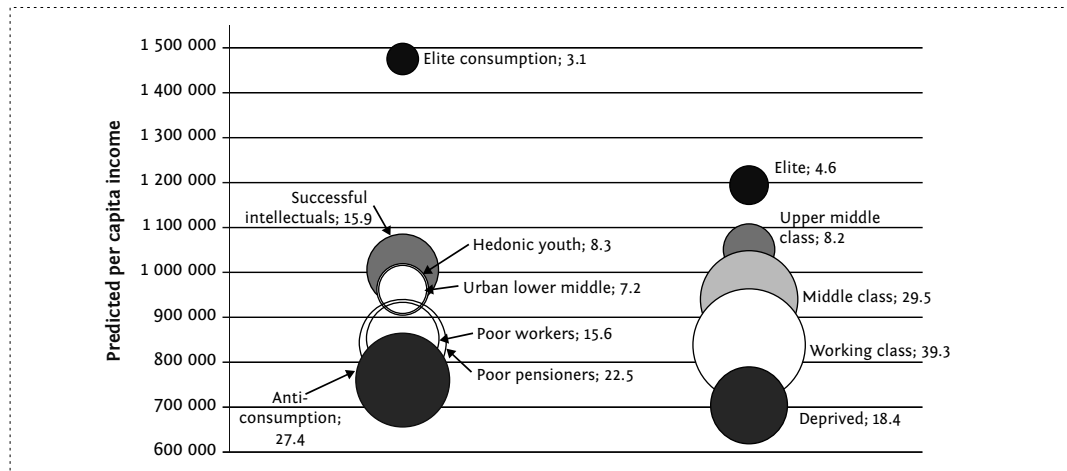

Figure 1a: Occupation based social groups in the space of income and wealth
Source: authors' calculations, TÁRKI Household Monitor Survey

Figure 1b: Consumption/lifestyle groups in the space of income and wealth
Source: authors' calculations, TÁRKI Household Monitor Survey

What is not so obvious is that in the space of hierarchical differences (according to the joint distribution of income and wealth) the distribution of the occupation-based social class typology in the Hungarian society can be summarised as follows. There is a small elite (4.6%), followed by a relatively small upper middle class (8,2%). We can distinguish a substantial middle (29.5%) and working class (39.3%), and the ratio of deprived persons is 18.4%. In the same hierarchical space, the distributions of consumption/lifestyle groups are very different. There is a small and isolated elite (3.1%), followed by a considerable upper middle class (consumption habits of successful intellectuals, 15.9%). There is a large overlap between the small middle class (the consumption habits of hedonic youth and of the urban lower middle class) and the larger lower middle class (the consumption habits of poor workers and of poor pensioners), and finally there is a significant amount of anti-consumption.[4] In Figure 2, we demonstrated the positions of groups defined by the two kinds of typology according to the predicted value of per capita yearly income (predicted by the wealth index). The general shape emerging from the two distributions should be very clear. According to the occupation-based typology, there is a sizeable middle class, contrary to the consumption/lifestyle-based typology, where a relatively small middle class is present, compared to the top and bottom.

The distribution of the Hungarian society according to occupation-based and lifestyle-based categories is summarised in Table 2. The strength of the connection is expressed by the adjusted residuals[5], which are zero if the two variables are independent. We can see that elite consumption isassociated with the elite and the upper middle class. Nearly every fourth person in the elite displays characteristics of elite consumption and an additional 45% the habits of a successful, intelligent consumer. Deprived people, however, are grouped basically in the anti-consumption category. According to adjusted residuals, it is noteworthy that there is no significant difference between the combinations 'elite and elite consumption' (17.6) and 'deprived and anti-consumption' (18.6), and the probability of the combinations 'elite and anti-consumption' (-7.3) and 'deprived and elite consumption'

Figure 2: Occupation-based and consumption/lifestyle-based typologies in the space of the joint distribution of income and wealth

Source: authors' calculations, TÁRKI Household Monitor Survey

4 Note, we named consumption style after social groups where the particular style of consumption is more frequent. However, later in the text when we refer to a particular consumption style, we will only indicate the name of the social group without mentioning the phrase "consumption style of …".

5 $z_{ij} = \dfrac{Q_{ij} - E_{ij}}{\sqrt{E_{ij}\left[1 - F_i / N\right]\left[1 - F_j / N\right]}}$, where i are the rows and j are the columns of the table, Z represents the adjusted residual, Q is the number of cases in a cell, E are the expected number of cases in a cell, F are the marginals of the table, and N are total number of cases (Hayes, 2005: 268).

Table 2: The connection between consumption/lifestyle-based social groups and occupation-based social classes (row % and adjusted residuals)

		Occupation-based social classes					Total
		Elite	Upper middle class	Middle class	Working class	Deprived	
Consumption/lifestyle based social groups	Elite consumption	25.5%	7.5%	2.9%	0.6%	.0%	2.9%
		17.6	4.9	.1	-6.5	-4.9	
	Successful intellectuals	44.8%	39.1%	21.4%	6.6%	1.1%	14.4%
		11.4	12.6	7.8	-10.7	-10.8	
	Hedonic youth	11.5%	12.6%	13.4%	5.1%	1.5%	7.8%
		1.8	3.2	8.1	-4.9	-6.6	
	Urban lower middle	7.3%	7.1%	8.2%	6.1%	4.7%	6.6%
		0.4	0.4	2.6	-1.1	-2.2	
	Poor pensioners	4.8%	17.7%	25.2%	29.1%	21.8%	24.5%
		-6.0	-2.8	.6	5.1	-1.8	
	Poor workers	3.6%	9.5%	15.5%	21.2%	14.5%	16.5%
		-4.6	-3.4	-1.1	6.1	-1.6	
	Anti-consumption	2.4%	6.5%	13.4%	31.4%	56.5%	27.3%
		-7.3	-8.4	-12.1	4.4	18.6	
Total		100%	100%	100%	100%	100%	100%

Source: authors' calculations, TÁRKI Household Monitor Survey

(-4.9) are also balanced. Compared to the average, middle class people are distributed with an average probability between the consumption groups (however, they are slightly underrepresented in the anti-consumption group).

In other words, our results show that at the two extremes of social hierarchy, lifestyle is very much status-dependent. The expression of lifestyle is, therefore, questionable among these groups in the sense that it is to a lesser extent a free choice. But in the middle layers of the society, people have more opportunities to choose between various kinds of consumption styles depending on their taste. It is more likely that middle class people consume more (or even less) than their objective possibilities allow; however, well-off people are less likely to hold back their consumption, while poor people are not able to allow themselves a higher level of consumption.

Some explanations

In our first hypothesis, we presumed that belonging to a particular social class is more dependent on structural components than on membership in a certain consumption/lifestyle group. We are aware that methodologically it is difficult to compare a seven-category typology with a five-group category. We should note, however, that both in the occupation-based and in the consumption/lifestyle-based typology the size of the first (elite/elite consumption) and the last (deprived/anti-consumption) groups are nearly the same, and according to Table 2 there is a relatively high overlap between the first and last categories. In Table 3, we summarised the connection between education and the two types of categories. As is evident, the probability of finding somebody with a higher education degree classified in the elite consumption category is nearly 46%, but the same probability is nearly twice as high in the

occupation-based elite category. On the other hand, the probability of having only basic education and being classified in the anti-consumption category is 49%, but the same probability is more than one and a half times as high if somebody belongs to the occupation-based group 'deprived'.

In Figure 3, we introduced three explanatory mechanisms (demography, education and labour market participation, see Table 1) and we displayed a Nagelkerke R Square. We explained the binary coded dependent variables with the same set of variables and ran 7+5 models according to the number of groups in the two categories. In the figure, the columns are arranged according to the size of the R

Table 3: The connection between consumption/lifestyle-based social groups and occupation-based social classes (row % and adjusted residuals)

		Highest educational level				
		At least basic education	Vocational school	Secondary education	Degree	Total
Consumption/lifestyle-based social groups	Elite consumption	**8.0%**	12.0%	34.4%	**45.6%**	100.0%
		-5.3	-4.4	1.7	**11.0**	
	Successful intellectuals	11.9%	14.8%	40.9%	32.4%	100.0%
		-10.6	-9.1	8.1	15.9	
	Hedonic youth	10.7%	20.5%	48.4%	20.5%	100.0%
		-7.8	-3.9	8.8	4.2	
	Urban lower middle	32.1%	25.9%	28.7%	13.3%	100.0%
		1.1	-1.5	0.3	0.1	
	Poor pensioners	31.4%	35.9%	25.3%	7.4%	100.0%
		1.6	4.6	-2.0	-5.8	
	Poor workers	22.4%	41.2%	29.0%	7.4%	100.0%
		-4.1	6.8	0.7	-4.6	
	Anti-consumption	**48.8%**	32.8%	14.6%	**3.8%**	100.0%
		16.8	2.6	-11.6	**-10.8**	
Total		29.3%	29.8%	27.9%	13.1%	100.0%

		Highest educational level				
		At least basic education	Vocational school	Secondary education	Degree	Total
Occupation-based social classes	Elite	**0.6%**	1.8%	10.3%	**87.3%**	100.0%
		-7.5	-8.7	-4.9	**27.4**	
	Upper middle class	1.4%	5.8%	25.9%	66.9%	100.0%
		-9.9	-10.3	-0.4	26.8	
	Middle class	4.5%	26.1%	54.7%	14.8%	100.0%
		-18.8	-5.7	24.2	0.5	
	Working class	24.2%	54.9%	19.8%	1.1%	100.0%
		-1.6	22.4	-7.8	-18.2	
	Deprived	**79.9%**	17.5%	2.4%	**0.2%**	100.0%
		35.2	-9.4	-15.7	-11.5	
Total		25.7%	33.0%	27.0%	14.3%	100.0%

Source: authors' calculations, TÁRKI Household Monitor Survey
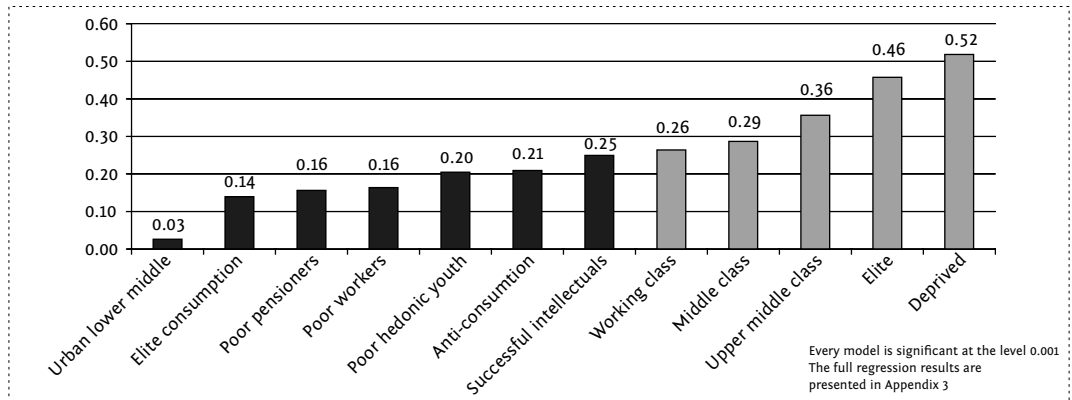
Figure 3: The predictive power of models containing the explanatory variables demography, education and labour market participation, Nagelkerke R^2
Source: authors' calculations, TÁRKI Household Monitor Survey

square ratio. As we can see from the occupation-based class typology, the working class is relatively the worst fitted, but it is still a better model than the best fitting model (successful intellectual) in the consumption/lifestyle-based typology. In other words, there are differences, but they are not especially considerable in the predictability of the two typologies. Structural components like demography, education and labour market participation fit better in the occupation-based typology. We can also conclude that lifestyle is more independent from the structural constraints than the occupation-based social classes. This is exactly what we supposed in our first hypothesis.

A detailed explanation about the impact of the three explanatory mechanisms (demography, education and labour market participation) in the case of these two typologies is beyond the scope of this article. However, it should be obvious from Tables A3.1 and A3.2 (in Appendix 3) that education (see the variable: university degree) has a strong impact on social classes; moreover, the size of the impact decreases in the lower levels of the social hierarchy (see: Table A3.1). On the other hand, in the case of lifestyle-based typology the impact of education does not show such a clear pattern (for example, in the case of elite consumption education does not have a significant impact, but it has a very strong impact in the case of the successful intellectuals, see: Table A3.2).

In our second hypothesis, we assumed that structural components will have larger effects at the top and at the bottom of the consumption/lifestyle typology than in the middle (top/bottom and middle positions are defined according to structural components like income and wealth). If our hypothesis is true, we can conclude that the consumption groups positioned in the middle are to a lesser extend predictable by structural constraints (compared to those at the bottom and the top) and, consequently, participating in these groups is more a matter of free choice than a consequence of structural predictors.

In Figure 4, we depicted the Nagelkerke R^2 in every category for the consumption/lifestyle-based typology. In addition to the vectors of demography, education and labour market participation, we also included occupation and income. In the figure, the bars are arranged in an ascendant order according to the added predictive power by the two newly included vectors. (In other words, according to the difference in R^2). As can be seen in the figure, the R^2 change assigned to occupation and income is the highest in the elite and anti-consumption groups, as well as among those at the top and the bottom of the hierarchy according to structural components. On the other hand, income and wealth enhanced the predictive power of poor pensioners and urban lower middle class consumption groups by less than 1 percentage points. Taking into consideration all the predictors, the successful intellectuals, anti-consumption and hedonic youth groups perform relatively well in terms of consumption. These

consumption groups are indeed somewhere at the bottom (anti-consumption) or at the top (successful intellectuals, hedonic youth) in the structural space (see: Figure 2), so our second hypothesis seems to be justified.

It is hard to find an explanatory variable that would prove to have a significant impact on all the consumption/lifestyle groups. Income, however, is undoubtedly such a variable (but not every income quintile). Figure 5 demonstrates the impact of the 1st and 5th income quintiles (compared to the 3rd). This means, for example, that being classified in the 1st income quintile enhances the probability of clustering in the elite consumption by about 250% (provided all other differences are constant), while the some probability is about -60% in the case of anti-consumption. Here it is evident that belonging to the 1st income quintile has a declining slope over the consumption/lifestyle groups, and – to a lesser extent – there is an increasing slope in the impact of the 5th income quintile. The full regression results are presented in Table A3.3 in Appendix 3.
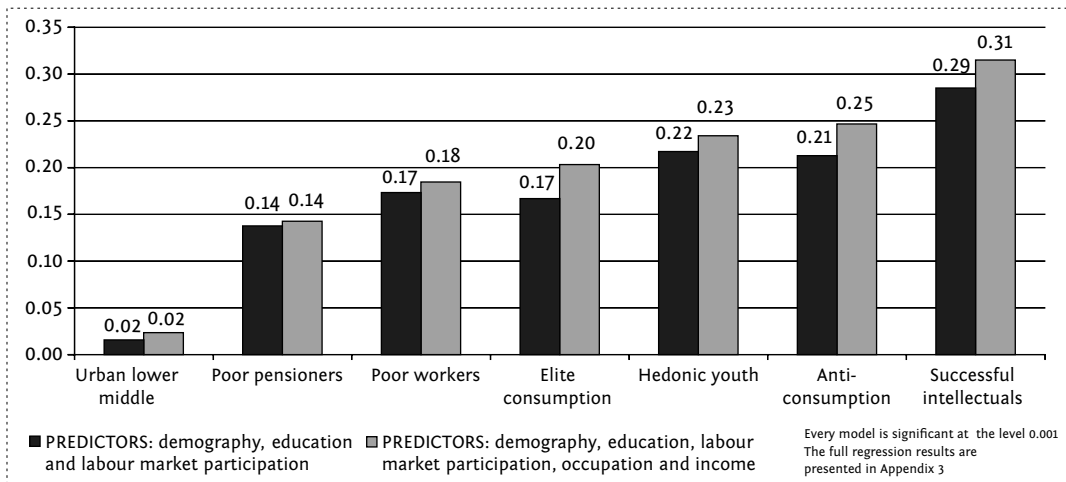
Figure 4: The predictive power of models containing the explanatory variables demography, education and labour market participation, occupation and income, Nagelkerke R^2
Source: authors' calculations, TÁRKI Household Monitor Survey
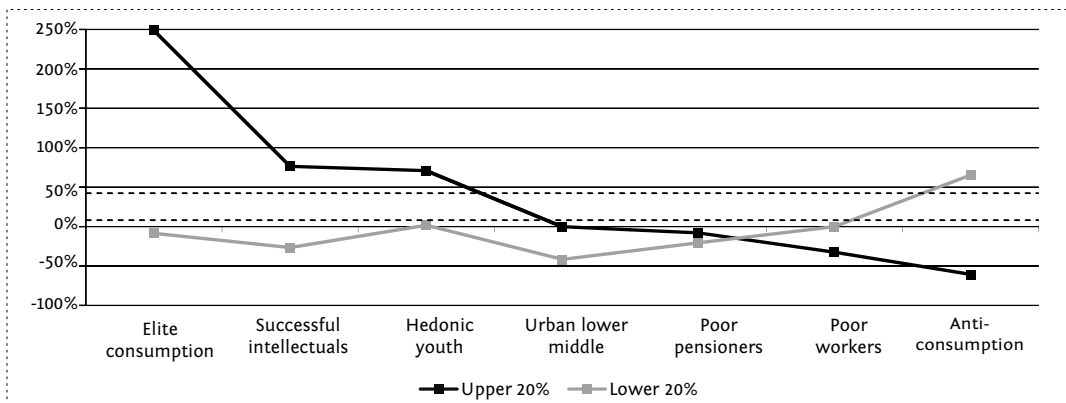
Figure 5: The slope (Exp(B) in %[6]) of income variable in case of consumption/lifestyle groups
Source: authors' calculations, TÁRKI Household Monitor Survey

6 The method of calculation: 100 × (Exp[B] – 1). Models contain the following set of predictors: demography, education and labour market participation, occupation and income. Parameters with a grey background are different from zero on at lest 5% significance level. The full regression results are presented in Appendix 6.

Conclusion and discussion

In our analysis, we used two typologies – an occupation-based and a consumption/ lifestyle-based one, and we classified the Hungarian population according to these typologies. We found that the connection between the occupation-based social classes and the consumption / lifestyle-based groups are stronger at the top and at the bottom of the society than in the middle. Our results mean that if somebody has a high social status s/he is likely to have above average consumption, and it is less feasible that s/he will consume below his/her means. On the other hand, if somebody is classified in a low social status it is very likely to have anti-consumption and consuming more than the structural constrains allow is less probable. In the middle of the social structure, the possible connection is path-dependent to a lesser extent.

Explaining this above-mentioned research finding, we found that if we place the consumption / lifestyle groups in a hierarchical space, the clusters at the top and at the bottom can be better explained by structural components like demography, education, occupation, etc., than clusters in the middle. In other words, we can conclude that membership in the case of groups positioned in the middle is more a function of free choice than of structural predictors.

At first sight, these results go against those one would expect and derive form the theory by Bourdieu. If lifestyle and consumption tend to move from necessities to distinction by moving upward on the vertical hierarchy of the society, the predictive power of the structural components ought to decline from the bottom to the top lifestyle group. The results in the present study, however, can easily be affected by the measures used to construct the lifestyle typology. These measures were largely of a quantitative character and qualitative information on the consumption, emphasised by Bourdieu when making a difference between cultural and material lifestyle, was not provided here.

Apart from the obvious conceptual point of reference represented by Bourdieu, another obvious context of the study is the social reality in Hungary. For the purpose of investigating social structure, is quite a characteristic approach in Hungarian sociology to go beyond the occupational classification and to take other features of inequalities into account. In the 1980s, seminal work by Tamás Kolosi (1984, 1988) went exactly in this direction and now serves as a stepping-stone for comparison. The most important evidence for the communist period that has emerged from these analyses referred to the multidimensional character of the Hungarian society and proved that status inconsistency was strongly present in the society. Applying a similar approach and investigating the society on the grounds of more than one dimension for inequality persisted in the present analytical work as well. In comparison to the previous studies, a tendency of change seems to appear for the Hungarian social structure. Although the various consumption/lifestyle groups remained clearly present in the Hungarian society, the degree of status inconsistency diminished. Moreover, the existing structural determination of lifestyle demonstrates that the post-communist Hungarian society has become more crystallised. This may be the real meaning of the evidence presented in this paper.

References

Beck, U. (1992). Beyond Status and Class? in U. Beck (ed.) *Risk Society: Towards a New Modernity* (91-102). New Delhi: Sage.

Blaskó, Z. (2003). Cultural Capital and Social Reproduction, *Review of Sociology of the Hungarian Sociological Association* 9: 5-26.

Bourdieu, P. (1984). *Distinction: A Social Critique of the Judgement of Taste*. London: Routledge.

Böröcz, J. & Southworth C. (1996). Decomposing the Intellectuals Class Power: Conversion of Cultural Capital to Income, Hungary, 1986, *Social Forces* 74: 797-821.

De Graaf, P. M. (1989). Cultural reproduction and educational stratification, in B. F. M. Bakker, J. Dronkers & G. W. Meijnen (eds) *Educational Opportunities in the Welfare State* (39-57). Nijmegen: ITS.

De Graaf, N. (1991). Distinctions by Consumption in Czechoslovakia, Hungary and the Netherlands, *European Sociological Review* 7: 267-290.

DiMaggio, P. (1982). Cultural Capital and School Success: The Impact of Status Cultural Participation on the Grades of U.S. High School Students, *American Sociological Review* 47: 189-201.

DiMaggio, P. & Usteem M. (1978). Social Class and Arts Consumption: The Origins and Consequences of Class Differences in Exposure to Arts in America, *Theory and Society* 5: 141-161.

DiMaggio, P. & Usteem M. (1980). The Arts in Education and Cultural Participation. The Social Role of Aesthetic Education and the Arts, *Journal of Aesthetic Education* 14: 55-72.

Ganzeboom, Harry B.G. (1982). Explaining differential participation in high-cultural activities: a confrontation of information-processing and status-seeking theories, in W. Raub (ed.) *Theoretical Models and Empirical Analyses: Contributions to the Explanation of Individual Actions and Collective Phenomena* (186-205). Utrecht: E.S. – Publications.

Ganzeboom, H. B.G. & De Graaf, P. M. & Róbert, P. (1990). Reproduction Theory on Socialist Ground: Intergenerational Transmission of Inequalities in Hungary, in A. L. Kalleberg (ed.) *Research in Social Stratification and Social Mobility, Volume 9* (79-104). Greenwich: JAI Press.

Hayes, A. F. (2005). *Statistical methods for communication science*. Mahwah N.J.: Lawrence Erlbaum Associates.

Keller, T. (2008). Fogyasztói szegmentáció. Kutatási beszámoló a GfK Hungaria Piackutató Kft-vel közös fogyasztói szegmentációs modellről [Consumption based segmentation model. A report about the joint project by TÁRKI and GfK Hungaria on consumption based segmentation]. http://www.tarki.hu/hu/research/gazdkult/fogyasztoi_szegmentacio.pdf

Kolosi, T. (1984). Status and Stratification, in R. Andorka & T. Kolosi (eds) *Stratification and Inequality*. Budapest: Institute for Social Sciences.

Kolosi, T. (1988). Stratification and Social Structure in Hungary, in W. R. Scott & J. Blake (eds) *Annual Review of Sociology*. Palo Alto: Annual Review, Inc.

Kolosi, T. (1993). The Reproduction of Life Style: Comparison of Czechoslovakian, Hungarian and Dutch Data, in J. Szmatka , Z. Mach & J. Mucha (eds) *Eastern European Societies on the Threshold of Change*. Lewiston, NY: Edwin Mellen Press.

Kolosi, T. & Róbert, P. (2004): A magyar társadalom szerkezeti átalakulásának és mobilitásának fő folyamatai a rendszerváltás óta. [Key Processes of Structural Transformation and Mobility in Hungarian Society since the Fall of Communism], in T. Kolosi, I. G. Tóth & G. Vukovich (eds) *Társadalmi Riport [Social Report] 2004* (48-74). Budapest: TÁRKI.

Kolosi, T. & Keller, T. (2010). Kikristályosodó társadalomszerkezet [Social Structure Getting Crystallized], in T. Kolosi & I. G. Tóth (eds) *Társadalmi Riport [Social Report] 2010* (105-138). Budapest: TÁRKI.

Kraaykamp, G. & Nieuwbeerta, P. (2000). Parental Background and Lifestyle Differentiation in Eastern Europe: Social, Political and Cultural Intergenerational Transmission of Inequalities in Five Former Socialist Societies, *Social Science Research* 29: 92-122.

Mateju, P. (1990). Family Effect on Educational Attainment in Czechoslovakia, the Netherlands and Hungary, in J. L. Peschar (ed.) *Social Reproduction in Eastern and Western Europe* (187-210). Nijmegen: Institute for Applied Social Sciences.

Róbert, P. (1991). The Role of Cultural and Material Resources in the Status Attainment Process: The Case of Hungary, in A. Tóth & L. Gábor (eds) *Beyond The Great Transformation. Research Review on the Hungarian Social Sciences Granted by the Government* (145-171). Budapest: Coordinating Council of Program TS-3.

Róbert, P. (1997). Social Determination of Living Conditions in Post-Communist Societies, *Czech Sociological Review* 5: 197-216.

Róbert, P. (2009). Changing Determinants of Consumption in Hungary, 1982-1998, in K. Robson & C. Sanders (eds) *Quantifying Theory: Pierre Bourdieu* (175-185). Dordrecht: Springer.

Sobel, M. E. (1981). *Lifestyle and Social Structure: Concepts, Definitions, and Analyses*. New York: Academic Press.

Weber, M. (1966). Class, Status and Party, in R. Bendix & S. M. Lipset (eds) *Class, Status and Power* (21-28). New York: The Free Press.

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Appendix 1. The twelve consumption indices on the six consumption areas (dimensions) in the original TÁRKI-GfK segmentation model (2008)

HOUSING DIMENSION: The quality of housing index (factor loadings)

Lighting of the dwelling	0.84
Furniture in the dwelling	0.81
The quality of the dwelling	0.85
The size of the dwelling	0.82
The atmosphere of the dwelling	0.84
The building is in good repair	-0.35
Plaster coming off in big pieces inside	-0.51
Plaster coming off in big pieces outside	-0.59
Eigenvalue	4.21
Explained variance	52.65%

DURABLE GOOD DIMENSION: The durable goods index (factor loadings)

Hi-fi equipment	0.62
Microwave oven	0.53
Freezer	0.38
Washing machine	0.58
Dishwasher	0.49
Video cassette recorder	0.60
Video camera	0.56
DVD-player	0.64
LCD TV	0.42
Digital photo camera	0.67
Personal car, younger than 5 years	0.46
Personal car	0.60
Eigenvalue	3.66
Explained variance	30.50%

DURABLE GOOD DIMENSION: The consumption of treasures index (factor loadings)

Antique furniture	0.77
Carpets, paintings or sculptures by famous artists	0.74
Other works of art	0.79
Eigenvalue	1.75
Explained variance	58.30

IT DIMENSION: IT consumption index (factor loadings)

The respondent use his/her mobile phone to sent SMS/MMSs	0.56
The respondent use his/her mobile phone to browse the Internet	0.26
The age of the mobile phone	-0.41
The frequency of using a computer	0.92
The frequency of using the Internet	0.92
The household has a telephone	0.25
The household has a mobile phone	0.01
The household has a PC	0.68
The household has a laptop	0.44
The household has a palmtop	0.24
Eigenvalue	3.03
Explained variance	30.27%

FINANCIAL CONSUMPTION DIMENSION: The consumption of financial products (factor loadings)

Having a bank account	0.72
Having a depositor's book	0.30
Having banking securities	0.39
Having governmental securities	0.36
Having other kinds of securities	0.22
Having investment securities	0.35
Having cash savings	0.43
Having a banking card	0.76
The frequency of using the banking card	0.58
Eigenvalue	2.16
Explained variance	23.95%

FINANCIAL CONSUMPTION DIMENSION: Financial hedonism index (factor loadings)

I am worried about making decisions in financial matters	-0.30
I only feel well, when I have some savings	-0.23
I am worried about taking a loan, because you cannot be sure about paying back	-0.29
I usually spend my money if I have any	0.41
If I go shopping I usually buy something that I hadn't planned before	0.70
Shopping is good activity	0.70
Money gives me freedom to buy things that I want	0.70
Eigenvalue	1.88
Explained variance	26.79%

FOOD AND CLOTHES DIMENSION: Diversified food and clothes consumption and basic food and clothes consumption indices (factor loadings)

	Diversified food and clothes consumption	Basic food and clothes consumption
The frequency of eating yogurt	0.564	0.043
The frequency of drinking fruit juice	0.445	0.212
The frequency of eating salads	0.539	0.185
The frequency of eating cereal and seeds	0.503	0.034
The frequency of eating cheese	0.631	0.159
The frequency of eating white bread	-0.21	0.624
The frequency of eating brown bread	0.395	-0.462
The frequency of eating noodles	-0.019	0.65
The frequency of eating potatoes	-0.004	0.645
The numbers of clothes bought in the last six month	0.563	0.132
The numbers of shoes	0.534	-0.051
Respondent had an overcoat	0.417	-0.099
Respondent had a suit	0.357	-0.039
Eigenvalue	2.56	1.58
Explained variance	19.7%	12.14%

FOOD AND CLOTHES DIMENSION: Home-based food consumption and service-based food consumption indices (factor loadings)

	Home-based food consumption index	Service-based food consumption index
Eats breakfast almost every day	0.39	0.12
Eats a ten o'clock snack almost every day	-0.03	0.81
Eats sandwiches for lunch almost every day	-0.58	0.08
Eats warm food for lunch almost every day	0.72	0.19
Eats a mid-afternoon snack almost every day	0.10	0.80
Eats warm food for supper almost every day	-0.49	0.09
Eats sandwiches for supper almost every day	0.54	0.07
Frequently eats at a canteen/cafeteria	-0.37	0.19
Frequently eats at a buffet	-0.28	0.32
Frequently cooks at home	0.18	-0.02
Frequently eats at a restaurant	-0.09	0.19
Eigenvalue	1.80	1.54
Explained variance	16.38%	13.95%

CULTURE CONSUMPTION DIMENSION: High culture and low culture indices (factor loadings)

	High culture index	Popular culture index
Attended theatre in the last year	0.58	-0.49
Attended a classical concert in the last year	0.41	-0.52
Attended a museum in the last year	0.62	-0.39
Attended a rock/blues/jazz concert in the last year	0.58	0.07
Attended the cinema in the last year	0.66	0.04
Did some sports in the last month	0.56	0.04
Went out to dance in the last month	0.55	0.32
Visited his/her friends in the last month	0.60	0.37
Invited his/her friends in the last month	0.52	0.31
Went out to a pub in the last month	0.34	0.44
Or went out to shopping at a shopping centre in the last month	0.57	0.20
Spent a holiday at home at least once in the last five years	0.60	-0.10
Spent a holiday abroad at least once in the last five years	0.56	-0.22
Eigenvalue	4.02	1.29
Explained variance	30.89%	9.93%

Appendix 2. K-Means cluster midpoints in the eight consumption clusters in the original TÁRKI-GfK segmentation model (2008)

Consumption indices (12)	Elite plus	Successful intellectuals	Hedonic youth	Elite classic	Urban lower middle	Poor workers	Poor pensioners	Anti-consumption
The quality of housing index	+	+	+	+	+	0	0	--
The durable goods index	++	+	+	+	0	0	0	--
The consumption of treasures index	++	-	0	++	0	0	-	-
Diversified food and clothes consumption	++	+	+	+	+	-	0	-
Basic food and clothes consumption	0	-	+	0	0	0	0	0
Home-based food consumption index	0	0	0	0	0	--	+	0
Service-based food consumption index	+	0	0	+	++	-	-	-
High culture index	++	++	+	+	0	-	-	-
Popular culture index	-	-	++	0	+	0	0	0
IT consumption index	++	+	+	+	0	0	-	--
The consumption of financial products	++	+	0	0	0	0	0	-
Financial hedonism index	+	0	+	0	+	0	-	0
N	111	419	524	55	219	403	760	557
%	0.04	0.14	0.17	0.02	0.07	0.13	0.25	0.18

Since every consumption index is defined with a 0 mean and a 1 standard deviation, we used the following symbols in the table:
0 = the value is between +0.2 and -0.2
+/- = the value is higher/smaller that +/- 0.2
++/-- = the value is higher/smaller that +/- 1 (the standard deviation)

Appendix 3.

Table A3.1: Test for H1: Binary logit models for the five occupation-based social class dummies, Exp(B) coefficients

	Elite	Upper middle class	Middle class	Working class	Deprived
Male	1.86	0.8	0.82	1.19	1.48
Age	1.72	1.29	0.96	1	0.99
Age (square)	1	1	1.57	1.32	1
Budapest	2.45	0.94	1.53	0.89	0.28***
Country seat	1.25	0.95	1.43	1	0.74
Town	1.34	1.35	1.45	0.95	0.59
Vocational education	1.92	3.54	6.51***	3.27***	0.78***
Secondary education	12.94	19.72***	28.42***	0.74	0.13***
University degree	253.51***	149.37***	7.95***	0.56***	0.14***
Pensioner	0.42	0.98	0.8	1.28	1.69
Inactive	0.12	0.58	0.72	0.85	3.45***
Constant	0.25***	0.3***	0.12***	0.59	2.12
-2 Log likelihood	787.94	1429.78	3534.27	4016.43	2040.05
Nagelkerke R Square	0.46	0.36	0.29	0.26	0.52

Explanatory variables: demographic differences, education, labour market participation.
Data: TÁRKI Household Monitor, 2010.
Reference categories: female, village, at least basic education, employed
*** the parameter is significantly different from zero at the level of 0.01;
** the parameter is significantly different from zero at the level of 0.05;
* the parameter is significantly different from zero at the level of 0.1

Table A3.2: Test for H1: Binary logit models for the seven consumption/lifestyle-based dummies, Exp(B) coefficients

	Elite consumption	Successful intellectuals	Hedonic youth	Urban lower middle	Poor pensioners	Poor workers	Anti-consumption
Male	1.24	0.54***	1.92***	1.2	0.87	2.43***	0.6
Age	1.93	0.94	0.93	0.93	1.65***	1.96***	1.64***
Age (square)	1	1.33	1.34	1.75	1	1***	1***
Budapest	2.77	2.77***	0.92	1.45	0.61	1.56	0.39***
Rural areas	0.73	1.82	1.28	1.64	0.95	1.15	0.62
Town	0.92	1.58	1.52	1.42	1.36	1.18	0.59***
Vocational school	1.28	1.23	1.83	1.88	1.73***	0.92	0.65***
Secondary education	3.55	2.91***	4.3***	1.77	1.53	0.72	0.27***
University degree	1.63	6.85***	4.23***	1.16	0.83	0.29	0.16***
Pensioner	1.32	0.53	0.64	1.4	1.89***	0.22***	2.74***
Inactive	1.67	0.74	0.62	1.32	1.55	0.63	1.87***
Constant	0.12***	0.48	0.41	0.22	0.17***	0.33***	0.26***
-2 Log likelihood	980.69	2926.49	1947.55	2060.81	3905.34	3117.50	4146.17
Nagelkerke R Square	0.17	0.29	0.22	0.02	0.14	0.17	0.21

Explanatory variables: demographic differences, education, labour market participation.
Data: TÁRKI Household Monitor, 2010.
Reference categories: female, village, at least basic education, employed
*** the parameter is significantly different from zero at the level of 0.01;
** the parameter is significantly different from zero at the level of 0.05;
* the parameter is significantly different from zero at the level of 0.1

Table A3.3: Test for H2: Binary logit models for the seven consumption/lifestyle-based dummies, Exp(B) coefficients

	Elite consumption	Successful intellectuals	Hedonic youth	Urban lower middle	Poor pensioners	Poor workers	Anti-consumption
Male	1.29	0.45***	1.91***	1.04	0.83**	2.57***	0.63***
Age	1.14***	1.05*	0.92***	0.96*	1.03*	1.08***	1.03*
Age (square)	1***	1***	1	1**	1	1***	1
Budapest	1.45	2.14***	0.92	1.11	0.62***	1.89***	0.54***
Rural areas	0.64	1.79***	1.34	1.26	0.91	1.21	0.68***
Town	0.9	1.27	1.62***	1.17	1.06	1.27**	0.65***
Vocational education	1.11	1.84**	1.66	1.21	1.6***	0.94	0.77*
Secondary education	1.53	3.02***	2.88***	1.21	1.45**	0.99	0.47***
University degree	2.74	4.53***	2.51**	1.1	0.83	0.55**	0.39***
Pensioner	1.58	0.7*	0.74	1.13	2.15***	0.19***	1.98***
Inactive	0.85	0.52***	0.9	1.44	1.96***	0.6***	1.45***
Manager (high)	1.36	6.38***	1.59	0.85	1.12	0.33*	0.54
Manger (middle)	1.34	3.8*	3.63	0.78	1.23	0.39*	0.73
Manager (low)	0.99	1.69	4.78	0.96	1.97*	0.63	0.5
Professional	1.43	2.17	3.01	1.37	1.41	0.37**	0.6
Clerical worker	0.92	1.69	4.55	1.16	1.55	0.52*	0.53**
Self-employed	1.09	2.88	2.49	0.79	1.85**	0.51*	0.55*
Skilled worker	0.47	1.41	2.57	0.94	1.43	0.73	1
Semiskilled / unskilled worker	0.21	0.98	2.21	0.93	1.43	0.7	1.12
Income (1st quintile)	3.49***	1.76***	1.71**	1	0.92	0.68**	0.39***
Income (2nd quintile)	2.56**	1.11	1.66**	0.86	1.1	0.78	0.83
income (4 quintile)	1.33	0.84	0.98	0.66*	1.07	1.16	1.08
Income (5th quintile)	0.91	0.73	1.02	0.58**	0.79	1	1.65***
Constant	0***	0.03***	0.17	0.11***	0.03***	0.05***	0.33***
-2 Log likelihood	768.65	2,245.79	1,584.70	1,706.41	3,621.82	2,789.12	3,517.29
Nagelkerke R Square	0.20	0.31	0.23	0.02	0.14	0.18	0.25

Explanatory variables: demographic differences, education, labour market participation, occupation and income.

Data: TÁRKI Household Monitor, 2010

Reference categories: female, village, at least basic education, employed, agricultural labourer.

*** the parameter is significantly different from zero at the level of 0.01;

** the parameter is significantly different from zero at the level of 0.05;

* the parameter is significantly different from zero at the level of 0.1