KNOWLEDGE AND ATTITUDES ABOUT GREEN CONSUMPTION IN BULGARIA

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Abstract: This paper examines the environmental knowledge of the Bulgarians and its relationship with the environmental concern and the predisposition to compromise as two commonly studied attitudes towards green consumption. A quota sample (quotas for age and gender) of 2018 adults from all the regions in Bulgaria is used. The research tool for face-to-face interviews and online surveys is a structured interview. Descriptive statistics, hypothesis tests for difference of means between two independent samples, the correlation analysis (chi-square test for independence) and the cluster analysis (K-means cluster) are the methods applied for the analysis. The results indicate that the Bulgarians are moderately knowledgeable about the environmental problems and the depth of knowledge is moderate as well. The environmental knowledge differs between different demographic groups: the better educated, younger, those living in the cities and wealthier people have better self-reported knowledge about the environmental problems. A large proportion of the adults do not consider themselves informed about the environmental problems and among those who do, the people who find themselves generally informed are majorities. The environmental knowledge positively affects both the environmental concern and the predisposition for green consumption.

1. Introduction

The environmental concern and protection of the environment are important topics in the scope of sustainable development, which balances current needs with the needs of future generations (UN, 2015). The rapid globalisation and the pace at

which environmental problems are affecting individual consumers make this topic very popular among marketing practitioners and scholars. The UN agenda for sustainable development outlines 17 integrated goals (economic, social and environmental), one of which (N12) is: "Ensure sustainable consumption and production patterns". According to Ken Peattie, "developing more environmentally sustainable consumption and production systems depends upon consumers' willingness to engage in greener consumption behaviours" (Peattie, 2010, p. 195). The environmentally sustainable consumption, often related to as green consumption, has been reported as an outcome of better environmental knowledge (Arbuthnot, 1974; Oskamp et al., 1991).

Three broad categories (attitudes, intentions and behaviour) and the relations between them are used as general constructs to explore the state of green consumption in Bulgaria. The general goal is to derive useful conclusions and insights for the marketing management by answering questions like: who are the people predisposed to green consumption, what do people know about environmental problems and do they feel they can be in control of solving partial parts of them, are they concerned for their own wellbeing or for the wellbeing of all (or both), are they willing to make compromises with their current consumer satisfaction in order to be green, how do they behave when they make a purchase, what kind of products are they consuming at present and what do they intend on consuming in the future, etc.

The purpose of this paper is to investigate how knowledgeable Bulgarians are about the ecological problems in the contemporary world and to answer the question: *Does the environmental knowledge affect the attitudes to green consumption?*. The main research hypotheses are as follows:

H1: Bulgarians are slightly knowledgeable about the environmental problems.

H2: The environmental knowledge of Bulgarians differs between different demographic groups.

H3: Most people in Bulgaria are more informed about local environmental problems than about global environmental problems.

H4: The environmental knowledge of the Bulgarians affects their environmental concern in a positive way.

H5: The environmental knowledge of the Bulgarians affects their predisposition for green consumption in a positive way.

2. Methodology

The methods that are used for this analysis are descriptive statistics, hypothesis tests for difference of means between two independent samples, the correlation

analysis (chi-square test for independence) and the cluster analysis (K-means cluster). A structured questionnaire was the instrument to collect the data from a quota sample (quotas for age and gender) of 2018 adults living on the territory of Bulgaria in November-December 2015. Face-to-face interviews and online surveys were used to collect the data. IBM SPSS 22 was used for the data analysis and Excel 2010 for graphical representations of the data.

3. Background Knowledge about the Environmental Problems

There are two major reasons for studying environmental knowledge: to provide an assessment of how the environmental movement have done in educating the public, and to develop a scientific understanding of variation in this knowledge. It is argued that consumers' environmental knowledge is of significant importance because the green revolution is primarily consumer driven (McDougall, 1993). This implies that if "consumers possess a superior understanding of environmental issues and channel it into ecologically conscious consumption behaviours, it is likely that profit-driven enterprises will be strongly motivated to apply the concept of green marketing to their operations" (Laroche et al., 2002, p. 268).

Behavioural observations over ecologically concerned consumption show that the main obstacle to green consumption in forms such as recycling, buying organic food or using environmentally friendly means of transport and so on, are the expenses (including monetary costs, time, efforts, compromises) for having such behaviour (Jackson, 2005). In a similar way, the low level of knowledge, inadequate, insufficient or lack of information are mentioned as barriers to the introduction and implementation of schemes for recycling, composting, ethical purchases, etc. (NCC, 2002, 2003). According to one commonly cited research on the topic, in order to raise environmental concern the "first and most important goal is to raise the level of knowledge" (Arbuthnot, 1974). Later on, Oskamp et al. (1991) found that the demographic characteristics of the consumers were not affecting the green behaviour as much as the knowledge about environmental problems and protection. It is reported that as the environmental knowledge of consumers increases, a growing segment of individuals rewards businesses that address ecological issues in their marketing practices (Laroche et al., 2002).

It is a general conception that people are not well informed and they do not have in depth knowledge about the state and the genesis of the environmental problems. The means used to increase public knowledge include popular and scholarly books, periodicals, presentations and events organieed by environmental groups and authorities, or mass rallies such as Earth Day. Research has proven that generally people do not make conscious efforts to improve their environmental literacy – they do not seek for external information and if they occasionally do, the easiest to consume media (such as documentaries, news, publicity broadcasts, and

newspapers) is preferred (Yankelovich, 2007). The lack of knowledge *shines* with more specific questions on topics related to global warming, carbon footprint, renewable energy etc. On the other hand the subjective self-assessment of people on their knowledge of environmental problems in the recent years has been relatively high.

The early research of Jack Arbuthnot and Sandra Lingg (1975) on multicultural comparison of environmental behaviours, knowledge and attitudes shows that the American's environmental attitudes were more pro-ecological and internally consistent, and were more likely to be related to environmental behaviour and knowledge and other attitudinal and personality variables than the French. Similarly, results from another study indicate "that francophones have lower scores on eco-literacy and concern for local environmental issues than Ontario anglophones" (Laroche et al., 1996, p. 196) but six years later the results of another research indicate that French-Canadians, as opposed to their English counterparts were more knowledgeable and concerned about ecological issues and consider environmental issues to a greater extent when making a purchase while English-Canadians were more likely to recycle and were more willing to pay premium price for ecologically compatible products (Laroche et al., 2002). It was also found that environmental knowledge predicted environmental actions for the Americans but not for the French (Arbuthnot & Lingg, 1975). Later on, Thomas Arcury (1990) found out that environmental knowledge was constantly and positively related to environmental attitudes, although the relationship was not especially strong. Similar findings were reported by Maloney and Ward (1973), and also Ramsey and Rickson (1976). Both knowledge and attitudes were assumed to be important for changing human actions toward the environment and for intelligent environmental policy making. More recent studies found that pro-environmental purchasing behaviour was correlated positively and moderately with environmental knowledge (Tilikidou, 2006) and "environmental attitudes have a significant effect on ecological behaviour and that the level of environmental knowledge moderates this relationship" (Fraj-Andrés, 2007, pp. 73-74).

Such findings motivate the increase in the information flow about the environment in order to increase awareness and knowledge among people as a precondition for some change in attitudes. This long term goal has been slowly achieved in some countries. While in the 70s of the 20th century the average person claimed to know very little about the ecology (Maloney & Ward, 1973), for the last 20 years the awareness and knowledge about the environmental state of the planet have increased and uncertainty has diminished. In the 90s, 5 of 10 people reported having good or fairly good knowledge of environmental issues, and in 2011 the number of those which gave the same answer was 7 of 10 people (GFK, 2011).

The relationship between environmental knowledge and green consumption intentions has often been assumed to be positive. The National Geographic and GlobeScan worldwide tracking survey (Greendex, 2014b) shows that when asked to think of the knowledge they have about the impact of food consumption on the environment and then indicate their intention to change their consumption behaviours for environmental reasons, a majority of consumers say they intend to change their food habits. According to the survey results Latin Americans, Chinese and South Koreans are among the people most likely to say they intend to change their behaviour, while British, German, Australian, American, Canadian, and Japanese consumers are less likely to say they plan to change their consumption patterns to mitigate their environmental footprint (Greendex, 2014a).

Figure 1. Environmental knowledge - USA citizens (%)
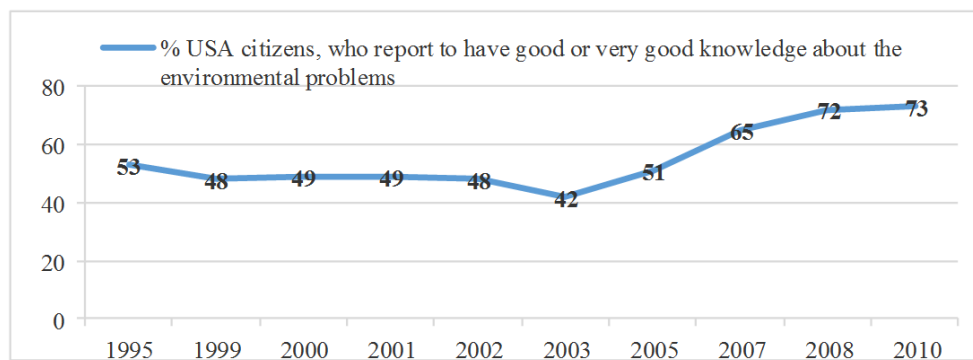
Source: GFK. (2011). The Environment: Public Attitudes and Individual Behavior - A Twenty-Year Evolution. Roper Organization (now a part of GfK), Green Gauge (SC Johnson study), p.9.

### 3.1. General Knowledge and Knowledge about Different Ecological Problems

A great deal of research has been directed toward environmental issues. Those of them which investigate how much the public knows about the environment and those which explore the relationship between knowledge and environmental attitudes (Arbuthnot, 1977; Arcury, 1990) are of higher importance for the current study. Taking into account previous research measures of environmental knowledge (Arcury & Johnson, 1987; Arcury, 1986; Maloney et al., 1975), a measure scale is developed and the socio-demographic characteristics correlated with such knowledge are further analysed.

As far as the Bulgarians are concerned, in 2015 less than half of them (42.5%) reported to be informed about questions related to the environmental problems, and 12.8% of all found themselves very well informed. In comparison, 73.0% of the

US adults in 2010 (GFK, 2011) reported to be informed about such questions, and 25.0% of them in 2007 (Yankelovich, 2007) found themselves very well informed. The level of environmental self-reported knowledge by the Bulgarians equals the lowest level of self-reported knowledge by the US citizens in 2003/4 (Figure 1).

The results of the current research to some extent confirm the common conclusions that people are more interested in the problems that could affect them personally and directly (Figure 2). To the question "Which problems affect them personally?", most of the US citizens answer that it is the air and water pollution (Yankelovich, 2007). Similar picture at first sight is outlined in Bulgaria: more than twice as many Bulgarians are informed about the deterioration of environmental conditions in the cities and their impact on our health as those who are informed about generally global problems related to the exhaustion of primary energy sources and destruction of the ozone layer and the greenhouse effect.

Figure 2. Environmental knowledge - Bulgarian citizens (%)
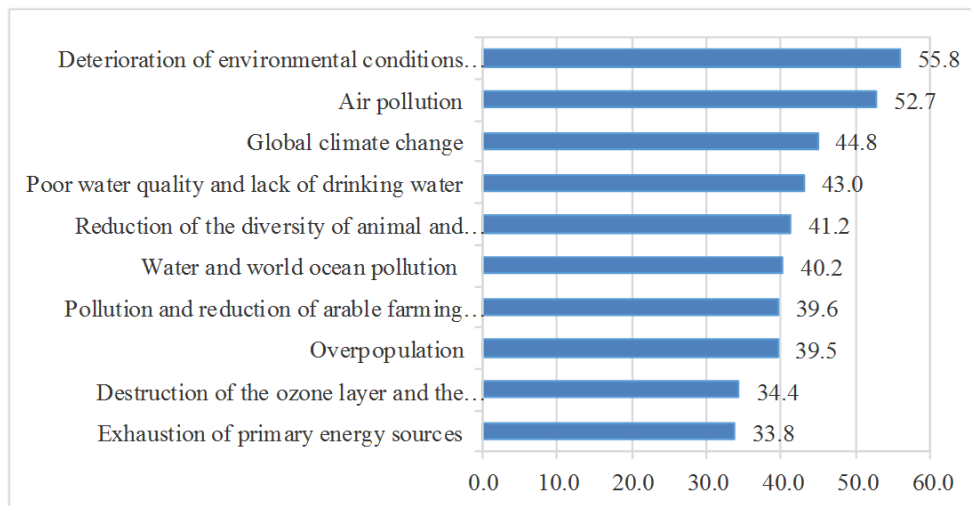
Source: Author's calculations based on data collected for an ongoing research project entitled "Green consumption in Bulgaria: Attitudes, intentions and behaviour", UNWE research contract № NID NI 1-3/2015.

3.2. Depth of Knowledge

In 2015 one fourth of the Bulgarians stated that they were not informed about any of the listed environmental problems of the contemporary world (Table 1)[1]. Approximately the same is the number of the Bulgarian adults who reported to be

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[1] The answers *very good* and *good* are counted.

informed about 3-4 environmental problems. The other 46.9% of the people found themselves more knowledgeable, claiming that they were aware of 5 to 10 environmental questions.

Taken all of the stated above into account, it can be concluded that the overall and in-depth environmental knowledge of the Bulgarians are moderate and with this the first hypothesis is rejected. (1)

Table 1. Depth of knowledge (%)

Depth of knowledge	N	% of all	Cumulative %
0	493	24.4	24.5
1	126	6.2	30.7
2	155	7.7	38.4
3	148	7.3	45.7
4	148	7.3	53.1
5	203	10.1	63.1
6	165	8.2	71.3
7	128	6.3	77.7
8	97	4.8	82.5
9	99	4.9	87.4
10	254	12.6	100.0

Source: Author's calculations based on data collected for an ongoing research project entitled "Green consumption in Bulgaria: Attitudes, intentions and behaviour", UNWE research contract № NID NI 1-3/2015.

3.2.1. Knowledge between Different Demographic Groups

Around 30 years ago research showed "that public environmental knowledge remains painfully low, and that the major correlates of environmental knowledge are education, income, and sex" (Arcury & Johnson, 1987, p. 31; Arcury et al., 1987). To explore the state of this problem in Bulgaria in 2015, cross tabulation is used and the demographic profiles of two different segments of Bulgarian adults are outlined according to their knowledge about the environmental problems of the contemporary world.

1) More knowledgeable are people who: are better educated, younger, living in the cities, wealthier.

2) Less knowledgeable are people who: are not so well-educated, older, living in the villages, poorer.

As a result of this, it can be assumed that the better educated, younger, living in the cities and wealthier people, have better self-reported knowledge about the environmental problems and this supports the second hypothesis. (2)

3.2.2. Hypothesis Tests for Difference of Means

To test the assumption stated above, hypothesis tests for difference of means between two independent samples (nonparametric U test Mann-Whitney) is used. The results of the test prove the above assumption to be true (Table 2).

Table 1. Hypothesis tests for difference of means between two independent samples

	Demographic information	Mean rank	U	Z	P value
Education	Primary school or less	527.68	49841	-8.746	0.000<0.05
	High school or college	1030.81	49841	-8.746	0.000<0.05
Age	18-65	1043.82	251722	-5.730	0.000<0.05.
	Over 66	855.43	251722	-5.730	0.000<0.05.
Citizenship	City	1064.10	281598	-8.088	0.000<0.05
	Village	822.23	281598	-8.088	0.000<0.05
Material status	Good	1114.42	393649	-6.438	0.000<0.05
	Not as good	942.67	393649	-6.438	0.000<0.05

Source: Author's calculations based on data collected for an ongoing research project entitled "Green consumption in Bulgaria: Attitudes, intentions and behaviour", UNWE research contract № NID NI 1-3/2015.

3.3. Local and Global Knowledge

In order to find out if there are different groups of people with similar types of knowledge about the environmental problems, cluster analysis (K-means cluster) is applied. The data from Table 3 helps to outline the following segments:

1) Not informed (36.0%). These people find themselves not informed about all of the listed environmental problems of the contemporary world.

2) Locally informed (17.0%)**.** These people find themselves informed about questions on which they have direct observations and which affect them personally.

3) Overall informed (24.0%). These people find themselves informed about different aspects of the environmental problems (global and local).

4) Globally informed (21.0%). These people find themselves to be more informed about global ecological problems then problems on which they have direct observation and which affect them personally.

One of the advantages of the method of treatment of overall monthly average is

Table 3. Knowledge (final cluster centres)

	Cluster			
	1	2	3	4
Global climate change	.07	.15	.89	.84
Overpopulation	.04	.16	.85	.71
Air pollution	.06	.50	.98	.89
Water and world ocean pollution	.04	.28	.96	.52
Destruction of the ozone layer and the greenhouse effect	.03	.12	.93	.42
Exhaustion of primary energy sources	.03	.26	.92	.29
Pollution and reduction of arable farming land	.04	.74	.88	.22
Poor water quality and lack of drinking water	.02	.79	.91	.32
Reduction of the diversity of animal and plant species	.06	.66	.91	.29
Deterioration of environmental conditions in cities and their impact on our health	.13	.80	.97	.63

Source: Author's calculations based on data collected for an ongoing research project
entitled "Green consumption in Bulgaria: Attitudes, intentions and behaviour",
UNWE research contract № NID NI 1-3/2015.

The group of the not informed (36.0%) people is the largest one, followed by the groups of the overall informed (24.0%) and the globally informed (21.0%). The group of the locally informed (17.0%) people is the smallest one. This shows that more people in Bulgaria, probably influenced by the global media information, know more about the ecological problems that exist in the world than the problems at home. The smaller number of locally informed people could be explained with the fact that the ecological problems are not among the priority topics of the day,

and therefore the attention of the people is not directed towards them. With this conclusion hypothesis number three is rejected. (3)

**Figure 3. Classification of Bulgarian adults
according to their environmental knowledge**
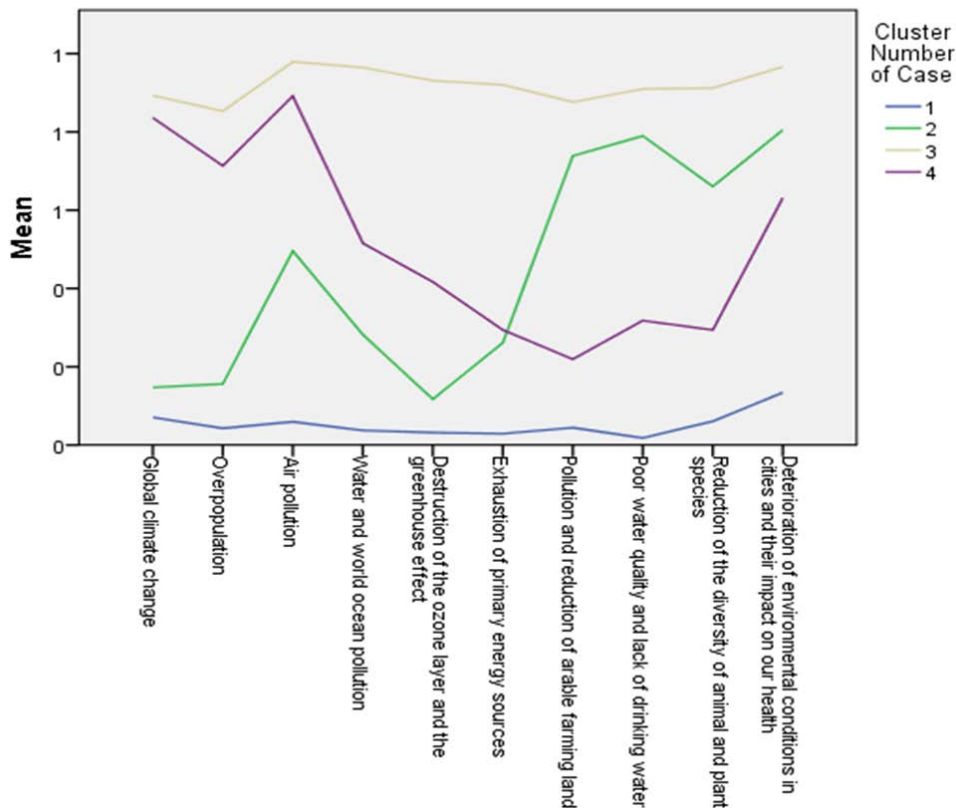
4. The Relationship between Knowledge and Attitudes

Ecological concern and inconvenience are among the most studied attitudes in green consumption research (Laroche et al., 2001). The ecological concern is the extent to which one finds the ecological problems to be important no matter if he finds them of importance for himself or for the whole society. The inconvenience is determined by the extent to which someone has difficulties and he needs to make compromises when it comes to green consumption (Yankelovich, 2007) or in other words inconvenience refers to how inconvenient it is perceived for the individual to

behave in an ecologically favourable fashion (Laroche et al., 2001). The inconvenience may be related to lack of information, need of extra efforts, product availability or higher price, lower functionality of a product or lower overall quality and so on. For example, a person may feel that buying biodegradable products is important for the society well-being, but he or she may also feel that it is personally inconvenient. On the other hand a person may know that the use of plastic bottled water will harm the environment, but still buy such products because they are convenient. The willingness to make compromises may explain the consumer predisposition for green consumption. It is questionable though whether this predisposition will transform into green behaviour and consumption or not. Regardless of how much concerned about the environment the individuals believe they are, the perception of the inconvenience of green activities may have a greater influence on their actions. Many individuals may have high ecological concern, but feel that someone else, for example the government and/or private companies are responsible for the preservation of the environment.

Research into green consumption has overemphasized objective factors related to knowledge and attitudinal rationality, whereas in practice, intuitive and emotional responses such as fear, anger, guilt, shame, or pride could be more important in shaping behavioural change (Peattie, 2010). Linking emotions to green consumption represents a potential future research opportunity. Another potentially influential factor is a consumer's sense of self identity which can influence his or her pro-environmental behaviour.

4.1. Environmental Concern

While economic problems continue to be among the top concerns for consumers in most countries, overall concern for environmental issues has increased since 2012 according to National Geographic and GlobeScan worldwide tracking survey "Consumer Choice and the Environment" (Greendex, 2014b). Despite its comparatively large size, the research literature suffers from an overuse of very broad environmental measures of concern or "general conservation stance" (Peattie, 2010). The environmental concern is thought to be a consideration of the environmental protection as an important issue that needs to be addressed and it is often considered to be a precondition for socially responsible (including green) behaviour (Jackson, 2005; Roberts & Bacon, 1997). Despite this, research shows that only a small share of the consumers have socially responsible behaviour in the marketplace (Roberts, 1996). Almost half of the US adults (48.0%) stated that they were concerned about the environment, but there were more important issues to be solved first, and 41.0% of them agreed with the statement that they needed to take care of the economic stability first and then they might search for solutions of the environmental problems (GFK, 2011). Similarly, more recent research shows that more than half of the consumers worldwide are very concerned about

environmental problems and "four out of ten believe that environmental problems are having a negative impact on their health" (Greendex, 2014b, p. 44). According to the same survey the environmental concern has increased since 2012 among consumers in 11 of the 18 countries under study. Furthermore, the Euromonitor global report for 2015 indicates that 64% of consumers across the world claimed that they tried to have a positive impact on the environment on an everyday basis (Euromonitor, 2015).

The current research shows that the Bulgarian people are highly concerned about the environment: for 76.0% of them the pollution in the country is really important problem and for almost all of them (94.2%) the problem is important. However, this is not the most important question for the Bulgarians because only 12.2% state it as being such.

The data in Table 4 shows a positive correlation between the depth of knowledge about environmental problems and the environmental concern. The chi-square test for independence indicates that this relationship is statistically significant (p=0.000<0.05), and it is moderately strong (Cramer's V= 0.241, which is close to 0.3). The two conditions for running a chi-square test are met - the minimum expected count is 23.14>1 and 0 cells (0.0 %< 20%) have expected count less than 5. Based on this it can concluded that there is a statistically significant relationship between knowledge and environmental concern and this relationship is moderately strong. The better in-depth knowledge people have, the more conscious people are about the importance of the environmental pollution. Along with this, another relationship between the two variables can be seen – a larger proportion of the people who are informed on every separate aspect of the ecological problems think that the pollution of the environment is an important problem. With this, hypothesis four is proved: the environmental knowledge of the Bulgarians affects their environmental concern in a positive way. (4)

Table 2. Knowledge and environmental concern (%)

Environmental concern (Is the problem important?)	Knowledge										
	0	1	2	3	4	5	6	7	8	9	10
Not important (or don't know)	38.1	27.0	32.3	21.6	18.9	21.7	22.4	12.5	20.6	8.1	9.4
Important	61.9	73.0	67.7	78.4	81.1	78.3	77.6	87.5	79.4	91.9	90.6
Total	100	100	100	100	100	100	100	100	100	100	100

Source: Author's calculations based on data collected for an ongoing research project entitled "Green consumption in Bulgaria: Attitudes, intentions and behaviour", UNWE research contract № NID NI 1-3/2015.

4.2. Predisposition for Green Consumption

More than half of the Bulgarians (57.7%) feel predisposed to make a compromise with the functional quality of a product if this product is less polluting the environment. To the question "Are you willing to agree to use less polluting detergents, even though the laundry is not as white or brilliant?", 36.9% of the people responded that they were more likely to be willing, and 20.8% were absolutely willing. Almost everyone in Bulgaria claimed being concerned about the conservation of the environment but a little more than half of the people (57.7%) were willing to make a compromise with the quality of the product provided it was not polluting the environment that much. In comparison, around the same percentage of people worldwide (58.0%) feel predisposed to make a compromise with the price but the motive is different (personal benefit, rather than environmental consciousness) "I am willing to pay more for an energy-saving product if it will save me money over the product's life because of lower energy costs" (Greendex, 2014b, p.69). The predisposition for green consumption, measured by the efforts people worldwide put into the attempts to reduce their own negative impact on the environment, is about average – 48.0% of the people in 18 countries claim to do so, and among them the majorities are from China, Brazil, Mexico and India while the minorities are from the western industrialized countries: Japan, Germany, Sweden, Great Britain, Spain, North America (Greendex, 2014b). Another common measure of predisposition for green consumption is the compromise with the price– in 1989 67.0% of the US citizens were willing to pay 5-10% more for environmentally friendly products and respectively until 1991 up to 15-20% (Laroche et al., 2001). In 2010 only 35.0% of the US citizens were willing to compromise with the price (Mintel, 2010). Our research shows that in 2015 the majority of the Bulgarians were not willing to pay more for green products and on average the Bulgarian consumer was willing to pay a premium of 12.46% for green products.

The data in Table 5 shows no positive correlation between the depth of knowledge about the environmental problems and the predisposition for green consumption (measured by the willingness to compromise with the product quality). The more people know about the environmental problems does not make them more willing to compromise with the quality of a product in order to be green in their consumption. But there is a difference between the willingness to compromise between the people who know something and those who do not know anything about the environmental problems of the contemporary world. Greater share of the knowledgeable people are willing to compromise (over 50.0-60.0%). The chi-square test for independence indicates that the relationship between environmental knowledge and the predisposition to green consumption is statistically significant (p=0.000<0.05), but this relationship is week (Cramer's V= 0.155<0.3). The two conditions for running a chi-square test are met - the minimum expected count is 40.83>1 and 0 cells (0.0 %< 20%) have expected count

less than 5. This leads to the conclusion that there is a statistically significant relationship between the two variables and this relationship is week. The knowledge about the environmental problems affects the predisposition to green consumption in a positive way and the depth of knowledge does not. With this, hypothesis five is proved: the environmental knowledge of the Bulgarians affects their predisposition for green consumption in a positive way. (5)

Table 3. Knowledge and predisposition to green consumption (%)

Predisposition to compromise	Knowledge										
	0	1	2	3	4	5	6	7	8	9	10
I'm not willing or rather I tend	52.3	33.3	48.4	34.5	47.3	38.6	38.8	34.4	47.4	34.3	33.9
I am willing	47.7	66.7	51.6	65.5	52.7	61.4	61.2	65.6	52.6	65.7	66.1
Total	100	100	100	100	100	100	100	100	100	100	100

Source: Author's calculations based on data collected for an ongoing research project entitled "Green consumption in Bulgaria: Attitudes, intentions and behaviour", UNWE research contract № NID NI 1-3/2015.

5. Conclusion

Based on summaries (1), (2), (3), (4) and (5) the final conclusions indicate that the general overall and the in-depth knowledge of the Bulgarians are moderate. The environmental knowledge differs between different demographic groups: the better educated, younger, those living in the cities and wealthier people have better self-reported knowledge about the environmental problems. A large proportion of people in Bulgaria don't find themselves informed about the environmental problems and among those who do the people with overall or global knowledge are majorities. The environmental knowledge affects both the environmental concern and the predisposition for green consumption in a positive way. The depth of knowledge influences the environmental concern but does not influence the predisposition for green consumption. The results of this study show that environmental educators, media and the environmental movement still have not done much in Bulgaria to educate the general public. Green marketers not only can target the environmentally knowledgeable people as potential green consumers but also influence them to further educate other people. Policy makers need to focus on educating the people about the local environmental problems because the personal relevance of the problem is expected to drive more action than the overall environmental knowledge would do.

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ZNANJA I STAVOVI O *ZELENOJ* POTROŠNJI U BUGARSKOJ

Apstrakt: Ovaj rad ispituje znanje stanovnika Bugarske o životnoj sredini i njegov odnos sa brigom o životnoj sredini i predispozicijom za kompromis kao dva najčešće ispitivana odnosa prema *zelenoj* potrošnji. Korišćen je kvota uzorak od 2.018 odraslih (kvote za uzrast i pol) iz svih regiona u Bugarskoj. Istraživačko sredstvo korišćeno za intervju licem-u-lice i internet ankete je strukturirani intervju. Metode koje su primenjene za analizu su: deskriptivna statistika, testiranje hipoteze o razlici aritmetičkih sredina dva skupa, korelaciona analiza (hi-kvadrat test nezavisnosti obeležja) i *k-means* klaster analiza. Rezultati pokazuju da stanovnici Bugarske imaju umereno znanje o problemima životne sredine, kao i da je dubina znanja umerena. Znanje o životnoj sredini se razlikuje između različitih demografskih grupa: obrazovaniji, mlađi, oni koji žive u gradovima i bogati ljudi poseduju viši nivo znanja o ekološkim problemima. Veliki broj odraslih ne smatra sebe

informisanim o problemima životne sredine, a među onima koji smatraju sebe informisanim većinu čine oni koji imaju opšte znanje. Znanje o životnoj sredini pozitivno utiče i na brigu o životnoj sredini i predispozicije za *zelenu* potrošnju.

Ključne reči: znanje o životnoj sredini, *zeleni* stavovi, *zelena* potrošnja, održivost, briga o životnoj sredini, ponašanje potrošača

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Borislava Stoimenova graduated from the University of National and World Economy, Sofia, Bulgaria in 2009. She received her Bachelor's and Master's degrees in Marketing and completed doctoral studies at the Department of Marketing and Strategic Planning in 2014. Since 2011, she has been teaching at the same department as well as pursuing a marketing career in the private sector in Bulgaria. In 2014, she became a full time assistant professor for the subject of Marketing, Marketing planning, Customer relationship management (CRM) and Visual design. Her doctoral dissertation entitled "Motives for customer loyalty to an organizational brand" outlines the areas of her academic interests and applied business activities: Branding, CRM, Organizational and Consumer Behaviour.