

DEMOCRACY AND QUALITY OF LIFE IN EU COUNTRIES

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Abstract: *The purpose of this paper was to explore the relationship between the state of democracy and quality of life. Statistical analyses of data from Economist Intelligence Unit (EIU) and European Quality of Life Survey were used to study the influence of the democracy on several subjective dimensions of the quality of life namely happiness, satisfaction with life, interpersonal trust, social exclusion and material deprivation over a sample of the 28 EU member states. The findings of this study pointed out a positive influence of the state of democracy on the quality of life. They also highlighted the similarities and the differences across the EU members in terms of democracy and quality of life.*

Key words: *democracy, quality of life, trust, differences, European Union.*

JEL Classification: I30, P10.

INTRODUCTION

The existing reports point out a stagnation of democracy worldwide, with significant erosion in Western Europe and poor performance in Eastern Europe in the recent years (EIU, 2012, pp.18-20).

In terms of the state of democracy, the EU societies can be divided into two main categories: *full democracies* (Spain, Belgium, Czech Republic, United Kingdom, Malta, Germany, Ireland, Austria, Luxemburg, Netherlands, Finland, Denmark, Sweden) and *flawed democracies* (Romania, Bulgaria, Croatia, Hungary, Latvia, Poland, Lithuania, Cyprus, Slovakia, Estonia, Greece, Italy, France, Slovenia, Portugal) (EIU, 2012, pp. 3-5).

Data on the subjective quality of life show variations across EU countries (European Quality of Life Survey, 2012).

The literature on the relationship between democracy and quality of life provides two competing views. In one perspective, researchers reached the conclusion that *democracy has a positive effect on the quality of life*. In a cross-national study over 28 countries, Dorn, Fischer, Kirchgassner & Sousa-Poza (2007) found a positive significant relationship between democracy and happiness, the effect of democracy being stronger in more democratic societies. Owen, Videras & Willemsen (2008) research results showed a positive correlation between democracy and individual levels of well-being. On the other hand, a second set of research results prove that democracy has no effect on the quality of life. When examining democracy and quality of life in Asian societies, Sasaoka & Seki (2011) reached the conclusion that country-level characteristic of the political regime has no effect on quality of life; more specific, this variable is positively influenced by the individual-level satisfaction with democracy.

When reviewing the literature on the causal relationship between democracy and quality of life and taking into consideration the nature of the variables used in the existing studies, the same researchers identify four approaches. *Approach 1* uses country-level variables as both the dependent and independent variable. *Approach 2* employs the individual-level data as the dependent variable, and country-level data as the independent variable. *Approach 3* uses as independent variable individual-level data

and country-level data, as the dependent variable. In *Approach 4* both dependent and independent variables are taken from individual-level data (Sasaoka&Seki, 2011, pp.344-345).

This paper takes Approach 2 in order to explore the relationship between democracy and quality of life at EU level and to examine the influence the state of democracy has on the quality of life.

MATERIAL AND METHODS

In order to analyze the relationship between democracy and quality of life in EU countries we used *the Democracy Index 2012* from The Economist Intelligence Unit (EIU), a country-level variable and *five dimensions of Quality of Life (happiness, satisfaction with life, interpersonal trust, social exclusion and material deprivation)* from European Quality of Life Survey 2012, which are subjective, individual-level variables. The sample comprises the 28 EU members, the reference year being 2012.

Table No 1 presents a more detailed description of the variables used in this analysis.

Table No 1
Presentation of variables

Variable	Description (from source)	Source
Democracy Index	A composite index which provides an image of the state of democracy worldwide. The index takes into consideration five categories: electoral process and pluralism; civil liberties; the functioning of government; political participation; political culture.	EIU, Democracy index 2012. Democracy at a standstill
Happiness	The mean value of the people per country, all ages, when asked "Taking all things together, how happy would you say you are?"	European Quality of Life Survey 2012
Satisfaction with life	The mean value of the people per country, all ages, when asked "How satisfied are you with your life these days?"	European Quality of Life Survey 2012
SocExIndex	The mean value of the people per country, all ages, when asked "Social Exclusion Index".	European Quality of Life Survey 2012
Interpersonal trust	The mean value of the people per country, all ages, when asked "Would you say that most people can be trusted or that you can't be too careful in dealing with people?"	European Quality of Life Survey 2012
Deprindex	The mean value of the people per country, all ages, when asked "Deprivation index: Number of items household cannot afford".	European Quality of Life Survey 2012

The following hypotheses were formulated:

H1. The state of democracy is positively related with the level of happiness.

H2. The state of democracy is positively related with the level of satisfaction with life.

H3. The state of democracy is negatively related with social exclusion.

H4. The state of democracy is positively related with the level of interpersonal trust.

H5. The state of democracy is negatively related with the level of material deprivation.

In order to observe the interaction between the variables and to measure the strength of the relationships between them, for the sample of 28 EU members, we studied the bivariate correlation between Democracy Index and the Quality of Life indicators, using Pearson correlation coefficient and Student t – test to verify its statistical significance.

Regression analysis is used to find a causal relationship between the state of democracy, measured with the Democracy index, as independent variable and the five subjective dimensions of Quality of Life, as dependent variables.

We also used graphical representation with scatter plots to provide an image on the 28 EU members from the point of view of the analyzed variables.

RESULTS AND DISCUSSION

Descriptive statistics are shown in Table No 2. As can be observed, descriptive statistics indicate that the average Democracy Index is 7.94 across the 28 countries of our sample. It ranges from 6.54 in Romania to 9.73 in Sweden. The average level of happiness is 7.3, with variations from 6.3 in Bulgaria to 8.2 in Denmark. Satisfaction with life is 7.0 on average, ranging from 5.5 in Bulgaria to 8.4 in Denmark. The level of interpersonal trust also presents large variations, from 1.9 in Cyprus to 7.1 in Finland. The average Social exclusion index is 2.2 across the 28 countries while the Deprivation index is 1.5 on average and it ranges from 0.3 in Luxemburg to 2.9 in Bulgaria.

Table No 2
Descriptive statistics

	Mean	Min	Max	Std. dev.
Democracy Index	7.94	6.54	9.73	0.83
Happiness	7.3	6.3	8.2	0.47
Satisfaction with life	7.0	5.5	8.4	0.69
SocExIndex	2.2	1.6	3.0	0.28
Interpersonal trust	5.0	1.9	7.1	1.02
Deprindex	1.5	0.3	2.9	0.84

Table No 3 presents the correlation matrix for the variables employed in the analysis.

Table No 3
The correlation coefficient between Democracy Index and the Quality of Life indicators

	Democracy Index	Happiness	Satisfaction with life	SocExIndex	Interpersonal trust	Deprindex
Democracy Index	1					
Happiness	.766	1				
Satisfaction with life	.820	.952	1			
SocExIndex	-.686	-.572	-.611	1		
Interpersonal trust	.710	.603	.671	-.772	1	
Deprindex	-.846	-.821	-.866	.685	-.684	1

Note. Correlations are significant at the 0.01 level (2-tailed).

The estimated values of Pearson correlation coefficients show significant correlations between the state of democracy and the analyzed quality of life indicators namely, positive correlations between the *State of democracy* and the reported level of *Happiness*, *Satisfaction with life*, and *Interpersonal trust* and negative correlations

between the *State of democracy* and the level of *Social exclusion* and *Material deprivation*.

The scatter plots provide an overview on the relationship of the state of democracy and the five quality of life dimensions and allow the identification of the similarities or differences at the level of EU countries

Figure No. 1 presents the positive relationship between the state of democracy and the level of happiness. The regression results show that democracy has a positive influence on the level of happiness. The estimated value of the coefficient of determination (R squared) is statistically significant pointing that the variation of the reported level of *Happiness* is 58.7% explained by the variation of the *Democracy index*.

Our results are in accordance with the existing studies which, using different measures for both variables, conclude on the positive strong relationship between happiness and democracy (Inglehart, 1990; Inglehart & Klingemann, 2000; Frey & Stutzer, 2000). When it comes to causality, several scholars argue that the relationship is reciprocal (Inglehart & Welzel, 2005). Also, several other factors had been explored as linked to happiness: gender equality (Schyns, 1998; Inglehart & Welzel, 2005), tolerance of outgroups (Inglehart & Welzel, 2005), the extent to which a society allows free choice (Inglehart, Foa, Peterson & Welzel, 2008), individual-level satisfaction with democracy (Sasaoka & Seki, 2011) etc.

Figure No. 1 also shows that the people in the most democratic EU countries (Sweden and Denmark) declare a higher level of happiness. Romania, Bulgaria, Latvia, and Hungary, on the other side, are characterized by lower levels of democracy and lower levels of happiness.

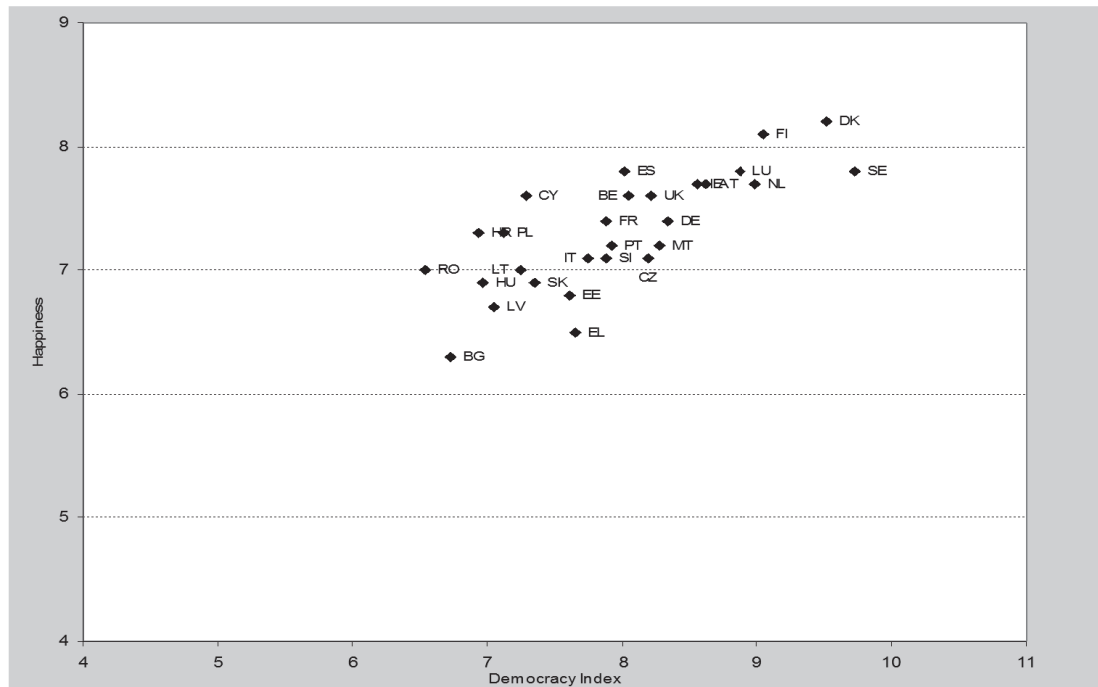


Figure No. 1 The positive relationship between the state of democracy and the level of happiness
(Source: Author's presentation)

Note. Linear regression with R squared=0.587 and P-value<0.01

Figure No.2 shows the positive relationship between the state of democracy and the level of satisfaction with life. When observing the positioning of the countries, the situation is similar as the one previously described: with Denmark and Sweden, on one side, people reporting a high level of satisfaction with life and Bulgaria and Hungary, on the other, characterized by low levels of satisfaction with life. Regression results

show that the variation of the level of *Satisfaction with life* is 67.2% explained by the variation of the *Democracy index*.

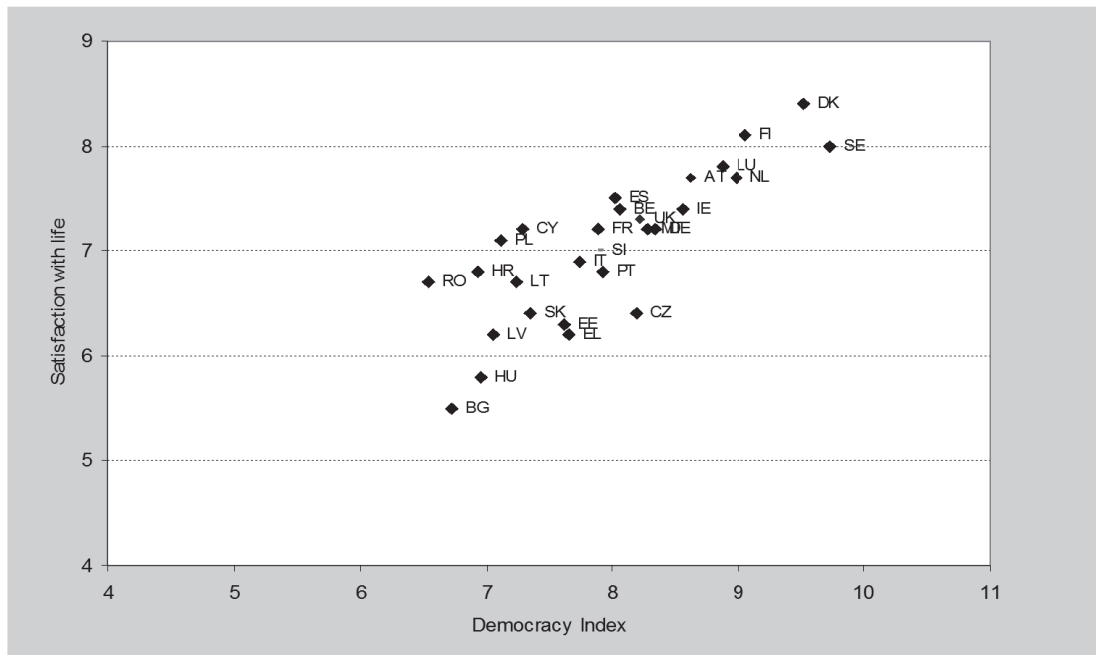


Figure No. 2 The positive relationship between the state of democracy and the level of satisfaction with life (Source: Author's presentation)

Note. Linear regression with R squared=0.672 and P-value<0.05

The negative relationship between the state of democracy and the level of social exclusion is shown in Figure No. 3. It can be noticed that Bulgaria, Croatia, Romania, Hungary are the EU countries with low levels in state of democracy and high levels of social exclusion while Denmark and Sweden display the opposite situation.

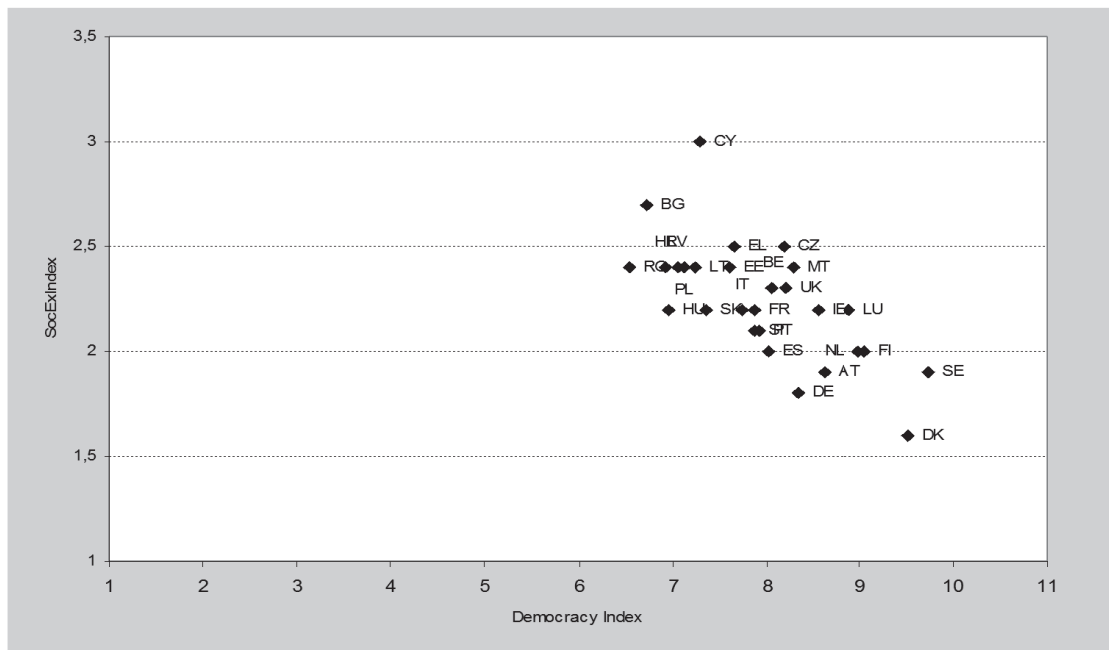


Figure No. 3 The negative relationship between the state of democracy and the level of social exclusion (Source: Author's presentation)

Note. Linear regression with R squared=0.471 and P-value<0.01

Figure No. 4 provides an image of the positive relationship between the state of democracy and the level of interpersonal trust. $R^2 = 0.503$, also statistically significant shows that the variation of the dependent variable *Interpersonal trust* is 50.3% explained by the variation of the state of democracy.

In literature, the relationship between democracy and trust is a controversial one. On one side, there is evidence which supports the idea that the state can build social trust (Levi, 1998). At the same time there are researchers who, agreeing that “democracies are more trusting”, prove that “societies do not become trusting because they are more democratic” (Uslaner, 2003, p.173) but due to state policies and to an equitable distribution of resources (*Idem*). Other determinants of social trust empirically proven are the level of a country’s development (Inglehart, 1999), the level of postmaterialism (*Idem*), corruption (LaPorta, Lopez-Silanes, Schleifer & Vishney, 1997) etc.

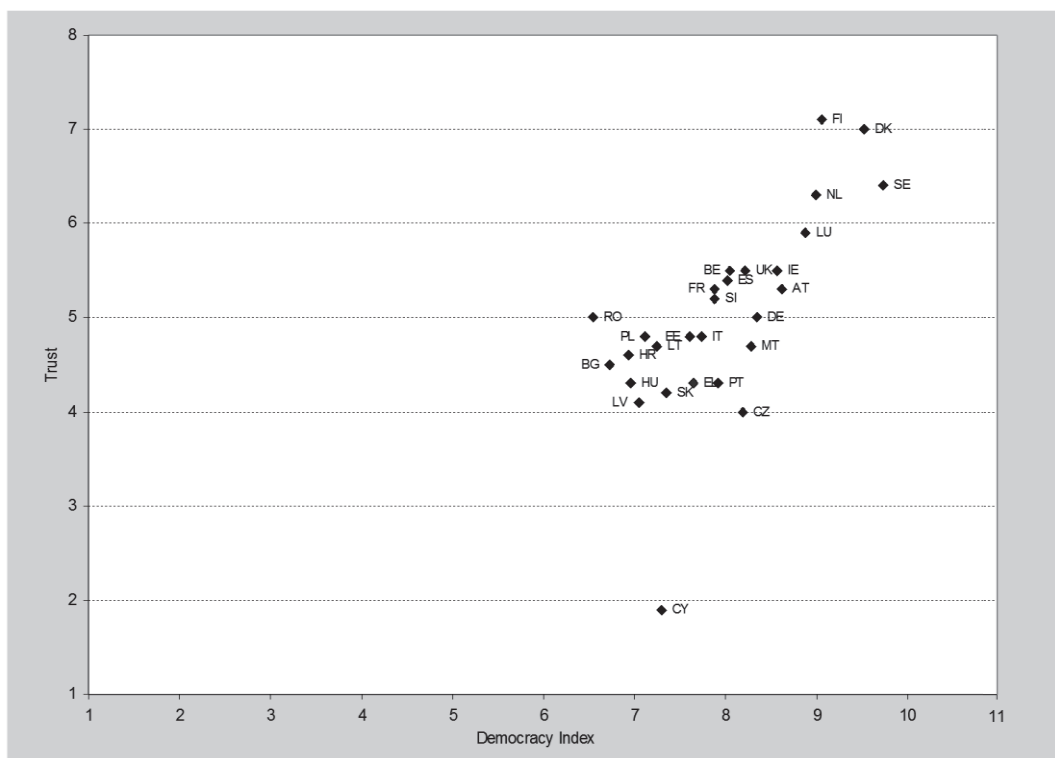


Figure No. 4 The positive relationship between the state of democracy and the level of interpersonal trust (Source: Author’s presentation)

Note. Linear regression with R squared=0.503 and P-value<0.01

The relationship between the state of democracy and the level of material deprivation can be visualized in Figure No.5. The state of democracy has a negative influence on the level of material deprivation. Moreover, the variation of democracy explains 71.6% of the variation of material deprivation. Bulgaria, Hungary, Latvia, Romania are the countries with a high level of material deprivation and low levels for democracy. The opposite situation can be noticed in Sweden and Denmark.

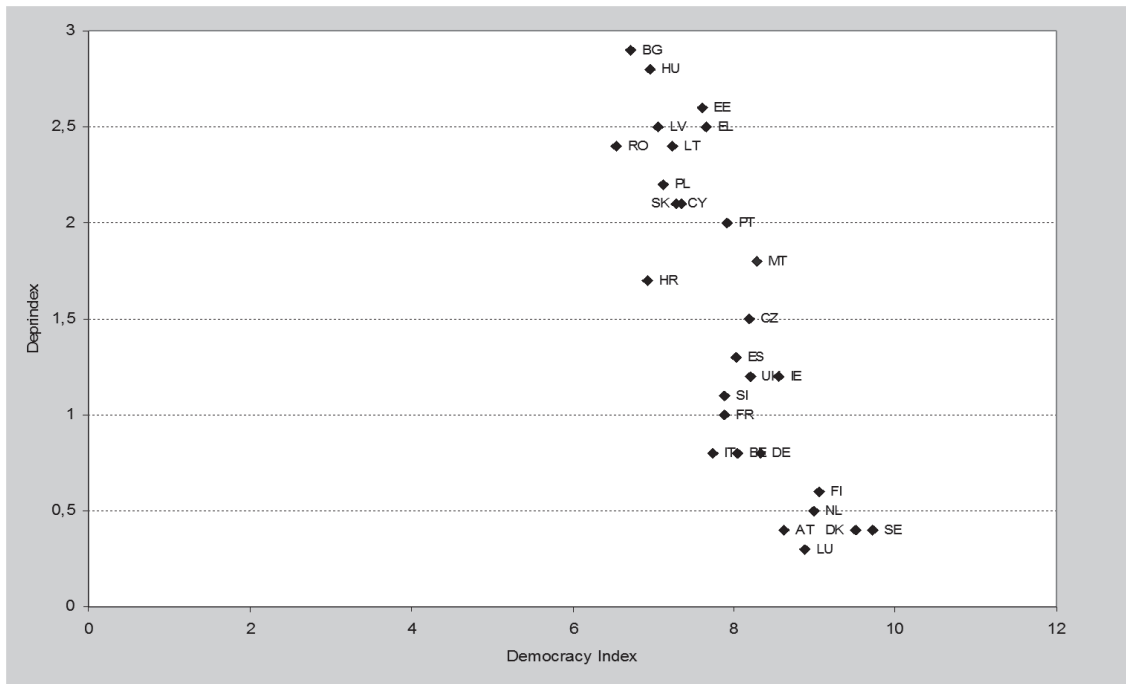


Figure No. 5 The relationship between the state of democracy and the level of material deprivation
(Source: Author's presentation)

Note. Linear regression with R squared=0.716 and P-value<0.01

CONCLUSIONS

The present paper has analysed the relationship between the state of democracy and several dimension of quality of life, using a sample comprising the 28 EU countries. Our results support the five research hypotheses.

The results of the correlation analysis show that the state of democracy, measured by the Democracy index, is significantly correlated with dimensions of Quality of Life. There is a positive correlation between the state of democracy and the reported levels of happiness, satisfaction with life and interpersonal trust and a negative one between the state of democracy and the level of social exclusion and the level of material deprivation.

The regression analysis results show the positive influence the state of democracy has on each subjective dimension of the Quality of Life. All estimated values of the coefficients of determination (R squared) being statistically significant the variations of the dependent variables are, to a certain extent, explained by the variation of state of democracy.

In the EU countries with a better state of democracy people report a better quality of life. The graphical representations with scatter plots allowed us to highlight the similarities and the differences across the EU members from the perspective of the variables included in the analysis. Our results show that the most significant differences are among *Sweden* and *Denmark* on one side, both full democracies with high quality of life and *Romania*, *Bulgaria*, *Hungary*, *Latvia*, on the other, which are flawed democracies where citizens report much lower quality of life.

This paper contributes to the existing literature by providing an overview of the relationship between democracy and the subjective quality of life over a sample of the 28 EU members. However, a number of limitations should be addressed by further research. Our sample is limited to EU members. Also, the data used for the analysis do not include all aspects related to democracy and quality of life and they are registered for 2012 and, consequently, they are biased by the economic crisis. Further research is

also necessary in order to identify other factors that influence the quality of life since the state of democracy explains its variation across countries only to some extent.

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