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# Personality and European Union attitudes: Relationships across European Union attitude dimensions

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#### **Abstract**

We still do not fully understand why attitudes toward the European Union differ among citizens. In this study, we turn to the Big Five personality traits: Openness, Conscientiousness, Extraversion, Agreeableness and Neuroticism as antecedents of European Union attitudes. In a national survey, we focus on attitudes toward widening and deepening of the European Union, trust in European Union institutions, identification with the European Union and negative affect experienced toward the European Union. We theorize that the Big Five traits are heterogeneously associated with the different European Union attitudes. We confirm that the Big Five traits are indeed associated with some but not all European Union attitudes. Accordingly, personality is expected to shape how citizens' respond to changes in the institutional set-up of the European Union.

# **Keywords**

Big Five, European Union attitudes, personality

# Introduction

Citizens differ profoundly in their attitudes toward the European Union (EU). EU attitudes influence citizens' vote choice in elections for the European parliament

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(de Vries and Tillman, 2011), EU referendums (Hobolt, 2005) and national elections (de Vries, 2007). Extant research has documented that socio-economic status, political sophistication and evaluations of the government and the economy are antecedents of EU attitudes (Franklin et al., 1994; Gabel, 1998; Ray, 2003; Tillman, 2012). Likewise, anti-immigrant attitudes, political ideology and national identity have been shown to predict EU attitudes (Boomgaarden et al., 2011; Carey, 2002; Harteveld et al., 2013; Hobolt, 2014; Kritzinger, 2003). Yet, we still do not fully understand why attitudes toward the EU differ among citizens.

Recent research re-emphasizes that personality is an important antecedent of political attitudes (Gerber et al., 2010; Mondak and Halperin, 2008). A commonly employed model of personality is the Big Five model which isolates the traits Openness (to Experience), Conscientiousness, Extraversion, Agreeableness and Neuroticism (Digman, 1990; Goldberg, 1992). Big Five traits shape political attitudes when the attitude involves specific goals and values that relate to one or more Big Five traits (Gerber et al., 2010; Jost et al., 2009; Mondak, 2010). In the only study up to this point, Schoen (2007) showed that support for further integration of the EU is associated with high levels of Openness and Agreeableness but low levels of Conscientiousness.

The literature on EU attitudes has, however, demonstrated that EU integration is only one of multiple EU attitude dimensions (Boomgaarden et al., 2011; Hobolt and Brouard, 2010). For instance, attitudes toward EU integration can be divided into (1) support for the *widening* of the EU by enlarging the number of member states and (2) support for the *deepening* of the EU by further integrating existing policies (Hobolt, 2014; Karp and Bowler, 2006). Others have isolated trust in EU institutions (Harteveld et al., 2013; Lubbers, 2008), identification with the EU (Bruter, 2003; Hobolt and Brouard, 2010; Lubbers, 2008) and negative affect toward the EU (Boomgaarden et al., 2011) as EU attitudes. These attitudes influence vote choice in European elections and referenda (Hobolt and Brouard, 2010; Maier et al., 2015; van Spanje and De Vreese, 2011). Accordingly, it is important to study the antecedents of the different EU attitude dimensions.

We turn to the Big Five personality traits as antecedents of EU attitudes. We argue, and confirm in a national survey conducted in the Netherlands, that Big Five personality traits correlate heterogeneously with the different EU attitudes. This article, for instance, shows that the Big Five trait Openness is positively associated with the support for widening of the EU, but this trait is unrelated to deepening of the EU. The effects of the Big Five traits on EU attitudes are independent of commonly identified antecedents of EU attitudes such as government evaluation, economic outlook, national identity and anti-immigrant attitudes.

The contribution of this study is twofold. First, by establishing the associations between the Big Five traits and EU attitudes, we demonstrate that personality is an important antecedent of EU attitudes. Second, this study has isolated a set of personality characteristics which should interact with the environment in shaping citizens' attitudes toward the EU. For instance, our findings suggest that the openminded, agreeable and neurotic citizens will respond positively to expansion of the

EU. Acknowledging differences in personality traits, politicians, policy makers and the news media could tailor their messages to the motives and needs rooted in the specific Big Five traits in order to inform the public and increase the legitimacy of the EU.

# Big Five personality traits and political attitudes

A rich body of research has studied the association between citizens' personality and political attitudes (Gerber et al., 2010; Jost et al., 2009; Mondak and Halperin, 2008). Often these studies employ the Big Five model of personality that encapsulates a wide variety of individual differences in the traits Openness, Conscientiousness, Extraversion, Agreeableness, and Neuroticism (Digman, 1990; Goldberg, 1992). Specifically, people open to experience have a lively imagination, are curious and open-minded. Conscientious persons prefer order, adhere to social norms, plan and organize tasks, are goal oriented and are reluctant to change. Extraverts seek excitement, are outgoing and social. Agreeable citizens are tender-minded, trusting, altruistic and caring. Lastly, neurotic persons are self-conscious and have a tendency to experience negative affect such as anger, anxiety and depression.

Big Five traits are *core characteristics* that share a set of attributes which make it possible to assume that they shape attitudes and behaviors (Asendorpf and van Aken, 2003). Specifically, they are heritable (Yamagata et al., 2006), robust across cultures (McCrae and Terracciano, 2005) and relatively stable over time (Roberts et al., 2006). Accordingly, Big Five traits can be seen as 'stable individual level differences in people's motivational reactions to circumscribed classes of environmental stimuli' (Denissen and Penke, 2008: 1286). The attitudes and behaviors that are influenced by personality traits, so-called *surface characteristics*, are less stable and more adaptable to cultural and social influences (Asendorpf and Denissen, 2006). Surface characteristics are likely to develop over time as the product of the interaction between core characteristics and experiences from the environment (McCrae, 2009).

Political attitudes are a typical example of surface characteristics. Big Five traits are likely to shape attitudes when the issue involves specific goals and values that relate to these traits (Jost et al., 2009). For instance, Big Five traits have shown to be antecedents of attitudes toward moral issues (Gerber et al., 2010; Mondak, 2010) and anti-immigrant attitudes (Dinesen et al., 2014). Importantly, the strength and direction of the associations between personality traits, such as the Big Five traits and political attitudes is conditional upon the attitude of interest (Carney et al., 2008; Feldman and Johnston, 2014).

# Big Five personality traits and EU attitudes

The association between personality traits and support for integration of the EU was addressed by Schoen (2007) who demonstrated that high scorers on Openness

and Agreeableness are supportive of further integration of the EU and the introduction of the Euro. Moreover, Conscientiousness was associated with opposition to EU integration. Support for EU integration itself is, however, only one of multiple EU attitudes (Boomgaarden et al., 2011; Hobolt, 2014; Hobolt and Brouard, 2010). In this study, we focus upon attitudes toward (a) *widening* of the EU, (b) *deepening* of the EU, (c) *trust* in EU institutions, (d) *identification* with the EU and (e) *negative affect* toward the EU.

We theorize that the Big Five traits correlate heterogeneously with the different EU attitudes. Importantly, formulating our expectations we observe three different patterns. First, there are associations between Big Five traits and EU attitudes which, supported by earlier research, lead to directional expectations. An example is the expected positive association between Openness and support for widening of the EU. Second, some expectations are not necessarily fueled by earlier research but can be inferred from research outside the domain of politics. The expected positive association between Neuroticism and the experience of negative affect toward the EU fits within this category. Third, some expectations are necessarily more explorative due to competing insights based upon earlier literature or the paucity of extant research. For instance, the association between Extraversion and most EU attitudes falls within this category. In the remainder of this section, we develop an argument for the expected relationships between the Big Five traits and the five EU attitudes.

Deepening and widening. We start with the association between Big Five traits and attitudes toward the integration of the EU. Attitudes toward EU integration can be divided into the attitude toward widening of the EU and the attitude toward deepening of the EU (Hobolt, 2014; Karp and Bowler, 2006). Widening of the EU taps into the attitude toward new member states in general or admission of specific countries such as Turkey (Hobolt, 2014; Karp and Bowler, 2006; McLaren, 2007). The deepening of the EU taps into the attitude toward further integrating the common policies of the EU such as the implementation of a common currency and the integration in a common foreign policy (Hobolt, 2014; Karp and Bowler, 2006). We argue that Big Five traits are differentially associated with attitudes toward widening and deepening of the EU. We thereby expand the work by Schoen (2007) who treated support for EU integration as a unidimensional construct.

Persons high on Openness are more likely to support the widening of the EU because they are imaginative, curious and tolerant. Imaginativeness and open-mindedness increase the likelihood to consider alternatives (Hart et al., 2012). Tolerance rooted in Openness leads to positive attitudes toward out-group members (Dinesen et al., 2014). Lastly, the drive for new activities makes high scorers on Openness the most likely to migrate to another country (Canache et al., 2013). In sum, we expect that Openness is positively associated with the widening of the EU. We do not think that policies that foster further deepening of the European Union will resonate with the motives rooted in Openness. Therefore, we do not expect that Openness is associated with the support for deepening the EU.

Conscientious persons prefer order, plan and organize tasks, control impulses, are goal oriented and reluctant to change. We could expect that Conscientiousness is positively associated with opposition to the widening and deepening of the EU as they are reluctant to change and prefer the status quo (Schoen, 2007). However, conscientious individuals are also dutiful and strive for achievement (Costa et al., 1991). In order to achieve some of their goals, they could support the widening and deepening of the EU. Given these competing insights, we do not formulate directional expectations regarding the associations between Conscientiousness and deepening and widening of the EU.

The widening of the EU is expected to resonate with the trusting, caring and tender-minded motives rooted in Agreeableness. We do not expect to find an association between Agreeableness and the deepening of the EU as the development of these, mostly abstract, EU policies does not resonate with the motives rooted in Agreeableness.

Neurotic persons adopt political attitudes which accommodate the experienced negative affect. For instance, neurotic persons support left-wing economic policies that accommodate the anxiety experienced by the competitive economic system (Gerber et al., 2010). Widening as well as deepening of the EU would accommodate the experienced fear caused by, for instance, globalization. Therefore, we expect to find positive associations between Neuroticism and both widening and deepening of the EU.

Lastly, the association between Extraversion and political attitudes is generally not well understood (Gerber et al., 2010; Mondak and Halperin, 2008). Therefore, we do not formulate directional expectations.

Trust in EU institutions. We expect to observe an association between Agreeableness and trust in EU institutions. Highly agreeable citizens are trusting, altruistic, tender-minded and value cooperation. Agreeable persons trust the political establishment (Mondak and Halperin, 2008) and support parties that are part of the political establishment (Gerber et al., 2011).

Trust in EU institution does not directly resonate with the motives and needs rooted in the traits Openness, Conscientiousness, Extraversion and Neuroticism. For instance, Neuroticism taps into the tendency to experience negative affect, self-consciousness and insecurity. We do not expect that this trait correlates with the trust in EU institutions. Similar arguments can be made for the other three Big Five traits.

European identity. Next, we turn to the identification with the EU. Open-minded citizens are less likely to commit themselves to organizations such as political parties (Bakker et al., 2015a, 2015b; Gerber et al., 2012). Moreover, Openness is unrelated to the identification with the nation (Duckitt and Sibley, 2014; Sagiv et al., 2012). Consequently, we do not expect an association between Openness and the identification with the EU.

Conscientiousness is associated with a preference for structure and order. The identification with groups, such as the EU, could accommodate this preference for order and structure. However, the association of Conscientiousness with national identification is inconsistent (Duckitt and Sibley, 2014; Sagiv et al., 2012).

Accordingly, it is an open-ended question whether conscientious individuals also identity with the EU.

Agreeable citizens might identify with in-groups as they are attracted by the 'communal and cooperative components' of group identification (Gerber et al., 2012: 661). Indeed, Agreeableness was positively associated with national identification (Duckitt and Sibley, 2014; Sagiv et al., 2012). This could imply that Agreeableness is negatively associated with EU identification (Carey, 2002). However, the association between Agreeableness and *national* identity does not exclude the formation of a strong EU identity (Boomgaarden et al., 2011; Hooghe and Marks, 2005). Therefore, we do not formulate a directional hypothesis.

Turning to Neuroticism, recent research observed a negative association between Neuroticism and national identification (Duckitt and Sibley, 2014; Sagiv et al., 2012). This is explained by stressing that identification with an in-group could foster emotional stability, which leads to a negative association between Neuroticism and in-group identification. However, identification with the ingroup could also reduce the negative affect experienced by neurotic persons. If this is the case, then we should find a positive association between Neuroticism and EU identity. Given these competing expectations, we do not formulate a directional expectation.

Lastly, Extraverts commit themselves to organizations (Erdheim et al., 2006) such as political parties (Bakker et al., 2015a, 2015b; Gerber et al., 2012) because the group membership provides them the opportunity to interact with other people. However, identification with a nation, or supra-national entity, does not offer the same social benefits as identification with more social groups such as political parties. Accordingly, Extraversion was unrelated to national identification (Duckitt and Sibley, 2014; Sagiv et al., 2012). Following this line of reasoning, we do not expect that Extraversion is associated with EU identification.

Negative affect. Emotions receive increasing attention in the study of political behavior (Druckman and McDermott, 2008; Garry, 2014). Boomgaarden et al. (2011) demonstrated that negative affect toward the EU makes up a distinct EU attitude dimension. Neurotic citizens are prone to experience fear, anxiety, anger and depression. Consequently, we expect that neurotic persons express negative affect toward the EU. Neuroticism is the only Big Five trait which clearly captures the tendency to experience negative affect. Accordingly, we do not expect associations between the other traits and negative affect toward the EU.

To summarize, we expect that personality traits are heterogeneously associated with EU attitudes (see Table 1 for an overview). First, we believe that support for widening of the EU is associated with high levels of Openness, Agreeableness and Neuroticism, while support for deepening of the EU is expected to be related with high levels of Neuroticism. Second, we put forward that Agreeableness is positively associated with the trust in EU institutions. Third, we do not expect any associations between personality traits and identification with the EU. Lastly, we predict

	Widening	Deepening	Trust	Identity	Negative affect
Openness	+				
Conscientiousness					
Extraversion					
Agreeableness	+		+		
Neuroticism	+	+			+

**Table 1.** Overview of the associations between Big Five Traits and EU attitudes.

Note:(+) signals a positive association between the trait and the EU attitude dimension. A blank space indicates that we expect no association between a specific EU attitude dimension and a Big Five trait.

that Neuroticism is positively associated with the negative affect experienced toward the EU.

# **Methods**

To test our hypotheses we use original data from a survey conducted in the context of the 2014 European Parliament election (De Vreese et al., 2014). The fieldwork was conducted by the survey company TNS NIPO. The sample was drawn from a 240,000 person database which is representative of the Dutch adult population. High-speed internet penetration in the Netherlands is extraordinarily enabling a high quality sample. In the first wave, 2803 respondents were invited to participate in the study. The first wave of the study took place between 13 December and 26 December 2013. In total, 2189 panelists responded to the survey which equals a 78.1% response rate. The first wave of the survey contained the attitudinal variables of interest, while the Big Five personality traits were included in the fifth wave of the survey. The fifth wave consisted of panelists that were re-contacted after they had completed the fourth wave of the survey. The fifth wave was fielded between 20 June and 26 June 2014. In total, 1379 respondents were contacted and 1174 responded which equals an 85.1% re-contact rate. In this study, we rely upon the 1174 respondents that completed the first and fifth wave of the survey.

A total of 14 items measured attitudes toward *widening* of the EU, *deepening* of the EU, *trust* in EU institutions, *identification* with the EU and *negative affect* toward the EU (see Table 2). Here, we discuss the operationalization of each attitude briefly. Three items tapped into widening of the EU by asking respondents to indicate to what extent they agree with inclusion of specific countries into the EU (Hobolt and Brouard, 2010; Karp and Bowler, 2006; McLaren, 2007), in this case Turkey, Montenegro and Iceland. Deepening of the EU was measured by asking to what extent citizens support the further integration of the EU by asking about their attitudes toward integration in general (Boomgaarden et al., 2011; Lubbers, 2008). Two items measure trust in EU institutions, namely the European Parliament and

Table 2. Item wording and confirmatory.	Factor analysis results for	the Five EU attitude
dimensions.		

#	Item wording	Widening	Deepening	Trust	Identity	Negative Affect
Т	Admission of Turkey <sup>a</sup>	0.71				
2	Admission of Iceland <sup>a</sup>	0.57				
3	Admission of Montenegro <sup>a</sup>	0.88				
4	'The European Union should become one country'		0.68			
5	'I am in favor of efforts being made to unify Europe'		0.95			
6	Trust in European Parliament <sup>b</sup>			0.93		
7	Trust in European Commission <sup>b</sup>			0.95		
8	'Being a citizen of the European Union means a lot to me'				0.86	
9	'The European flag means a lot to me'				0.78	
10	'I am proud to be a European citizen'				0.82	
П	'I am afraid of the European Union'					0.78
12	'I am threatened by the European Union'					0.82
13	'I am angry about the European Union'					0.82
14	'I am disgusted about the European Union'					0.83

Note: Model fit indices:  $Chi^2 = 337.695$ ; RMSEA = 0.059 (0.053, 0.065); CFI = 0.972; TLI = 0.962; SRMR = 0.040.

the European Commission (Boomgaarden et al., 2011; Gabel, 1998; Harteveld et al., 2013). Three items encapsulate the European identity. The first item taps into the extent to which respondents are proud to be a European (Karp and Bowler, 2006; Lubbers, 2008). The second item asks respondents about the extent to which they feel connected to the EU, while the third item taps into feelings toward European symbols such as the flag (Boomgaarden et al., 2011; Bruter,

<sup>&</sup>lt;sup>a</sup>For each of the following countries, to what extent are you in favor of or against it becoming a member of the EU? 'This is followed by the presentation of three items measuring the admission of Turkey, Iceland and Montenegro'.

<sup>&</sup>lt;sup>b</sup>\*Now, thinking about political institutions for a moment. Using a scale that reaches from 1 to 7, on which 1 means that you have no trust at all and 7 means that you have a great deal of trust, how much trust do you have in the following institutions?' This was followed by a list of national institutions as well as the European Parliament and the EU Commission.

	М	SD	Alpha	1	2	3	4	5
EU attitudes								
<ol> <li>Widening</li> </ol>	0.39	0.24	0.74	_				
2. Deepening	0.27	0.25	0.78	0.33*	_			
3. Trust	0.34	0.22	0.93	0.44*	0.51*	_		
4. Identity	0.28	0.22	0.85	0.34*	0.63*	0.63*	_	
5. Negative affect toward the EU	0.36	0.26	0.89	-0.36*	-0.32*	-0.57*	-0.35*	-
Big Five traits				6	7	8	9	10
6. Openness	0.60	0.17	0.58	_				
7. Conscientiousness	0.71	0.18	0.71	0.07*	_			
8. Extraversion	0.55	0.20	0.77	0.21*	0.07*	_		
9. Agreeableness	0.70	0.18	0.77	0.16*	0.27*	0.22*	_	
10. Neuroticism	0.38	0.20	0.76	-0.16*	-0.16*	-0.20*	-0.07*	_

**Table 3.** Descriptive statistics of the dependent and independent variables.

2003). Four items tapping into fear, threat, anger and disgust measure negative affect toward the EU (Boomgaarden et al., 2011).

Results of a confirmatory factor analysis confirm that there are five distinct EU attitudes (see Table 2). Next, we created five additive scales, one for each EU attitude. Table 3 provides the descriptive statistics of the five attitude dimensions.<sup>2</sup>

The Big Five traits were measured using the valid and reliable 20-item mini-International Personality Item Pool (henceforth, mini-IPIP; Donnellan et al., 2006). The Big Five traits were included in the fifth wave of the survey. We believe that this is not a problem, because personality traits are relatively stable over time (Gerber et al., 2013) and robustly associated with political attitudes over time (Bloeser et al., 2013). Participants were asked to respond to items such as 'I get easily upset' scored on a seven-point Likert scale from very inaccurate (1) through very accurate (7). Online Appendix A provides the item wording of all mini-IPIP items. The internal reliabilities of the five personality dimensions were acceptable (see Table 3) and we have confirmed the factor structure of the mini-IPIP (Online Appendix B).

To summarize, the dataset employed in this study has three advantages compared to existing datasets. First, our sample is among the first studies to include an extensive battery of EU attitude dimensions (Boomgaarden et al., 2011; Hobolt and Brouard, 2010). Second, we use a valid and reliable personality inventory that relied upon four items per trait. The use of a somewhat larger personality inventories has the advantage that we decrease the risk to underestimate or overestimate the influence of personality on EU attitudes (Credé et al., 2012). Third, our dataset is unique because it combines the multidimensional operationalization of EU

<sup>\*</sup>p < 0.05; All scales are scored from 0 to 1. N = 1174.

attitudes with a personality inventory which is, to our best knowledge, not possible using alternative datasets.

In order to isolate the effect of personality on EU attitudes, we estimate OLS regression models in which we control for a set of variables that have been used as predictors of EU attitudes. We control for indicators of socio-economic status, namely gender, age, education and income (Gabel, 1998; Gabel and Palmer, 1995; Hakhverdian et al., 2013; Lubbers and Jaspers, 2011). Moreover, we control for government approval (Anderson, 1998; Franklin et al., 1994), economic outlook (Anderson and Reichert, 1996; Gabel and Whitten, 1997), political interest and political knowledge (Boomgaarden et al., 2011; Gabel, 1998; Tillman, 2012), national identity (Harteveld et al., 2013; Kritzinger, 2003) and anti-immigrant attitudes (Azrout et al., 2011; De Vreese et al., 2008; McLaren, 2002).<sup>3</sup> In order to assess the effects of the personality traits on EU attitudes, we calculate the predicted mean EU attitude among respondents that score two standard deviations below the mean on the personality trait and respondent that score two standard deviations above the mean on the personality trait while keeping the control variables at their central tendencies. Moreover, we report the increase in R-squared when including the Big Five traits into the models.

# Results

Table 4 shows the results for our analyses in five columns, one model for the association between each EU attitude and the Big Five traits. We start with attitudes toward widening the EU (see Table 4, column 1) which was scored from opposition to the widening of the EU (0) through support for widening of the EU (1). In line with our expectations, Openness is positively associated with support for widening the EU. Specifically, respondents that score high on Openness (e.g. two standard deviations above the mean) are more supportive of widening the EU (0.43; 95% CI = [0.39, 0.46]) compared to respondents that score low (e.g. two standard deviations below the mean) on Openness (0.32; 95% CI = [0.29, 0.36])while keeping all other variables at their central tendencies. Also in line with our expectations, respondents that score high on Agreeableness are more supportive of widening the EU (0.41; 95% CI = [0.38, 0.44]) compared to respondents that score low on Agreeableness (0.33; 95% CI = [0.30, 0.37]). Likewise, we observe that highly neurotic respondents are more supportive of widening the EU (0.42; 95% CI = [0.39, 0.45]) compared to low neurotic respondents (0.34; 95%) CI = [0.31, 0.36]). Conscientiousness is indeed unrelated to attitudes toward widening the EU. Unexpectedly we find that high scorers on Extraversion are less supportive of widening the EU (0.34; 95% CI = [0.31, 0.37]) compared to respondents that score low on Extraversion (0.41; 95% CI = [0.38, 0.44]).

The effects of the Big Five traits on the attitudes toward widening the EU are substantive. To illustrate this, we compare the reported effects of the Big Five traits with the effects of government approval on support for widening the EU. Respondents that have a positive evaluation of the government (e.g. score two

**Table 4.** The relationship between personality traits and deepening the EU, widening the EU, trust toward EU institutions, identification with the EU and negative affect toward the EU.

	Widening (1)	Deepening (2)	Trust (3)	Identity (4)	Negative affect toward the EU (5)
Openness	0.15*	0.07	0.02	-0.02	-0.05
	(0.04)	(0.04)	(0.03)	(0.04)	(0.04)
Conscientiousness	-0.01	0.11*	0.06*	-0.02	-0.07
	(0.04)	(0.04)	(0.03)	(0.03)	(0.04)
Extraversion	-0.09*	0.06	0.02	0.06	0.00
	(0.04)	(0.04)	(0.03)	(0.03)	(0.04)
Agreeableness	0.11*	-0.14*	0.00	-0.03	-0.01
	(0.04)	(0.04)	(0.03)	(0.04)	(0.04)
Neuroticism	0.12*	0.08*	0.03	0.04	0.07*
	(0.03)	(0.04)	(0.03)	(0.03)	(0.04)
Sex	-0.01	-0.00	0.02	0.03*	-0.01
	(0.01)	(0.01)	(0.01)	(0.01)	(0.01)
Age	0.00	0.01*	-0.00	-0.00	-0.01
	(0.00)	(0.01)	(0.00)	(0.00)	(0.01)
Education	0.02*	-0.00	0.00	-0.00	-0.02*
	(0.00)	(0.00)	(0.00)	(0.00)	(0.00)
Income	0.00	0.00	-0.00	0.00	0.00
	(0.00)	(0.00)	(0.00)	(0.00)	(0.00)
Government approval	0.18*	0.19*	0.32*	0.19*	-0.23*
	(0.03)	(0.03)	(0.03)	(0.03)	(0.03)
Economic outlook	0.17*	0.14*	0.30*	0.23*	-0.35*
	(0.04)	(0.04)	(0.03)	(0.03)	(0.04)
Political interest	0.03	0.10*	0.09*	0.11*	0.02
	(0.03)	(0.03)	(0.02)	(0.02)	(0.03)
Political knowledge	0.02	-0.07*	-0.06*	-0.10*	0.02
	(0.03)	(0.03)	(0.03)	(0.03)	(0.03)
Anti-immigrant	-0.11*	-0.11*	-0.14*	-0.11*	0.14*
	(0.03)	(0.03)	(0.02)	(0.03)	(0.03)
National identity	-0.08*	<b>−</b> 0.1 <b>7</b> *	-0.11*	-0.06*	0.18*
	(0.03)	(0.03)	(0.03)	(0.03)	(0.03)
Constant	0.08	0.16*	0.14*	0.18*	0.58*
	(0.06)	(0.06)	(0.05)	(0.05)	(0.06)
N	1174	1174	1174	1174	1174
$R^2$	0.20	0.15	0.41	0.20	0.31
F-test	7.82	4.47	ns	ns	2.37
$\Delta R^2$	0.025	0.016	_	_	0.007

Note: OLS regression coefficients with standard errors reported in parentheses. Weights are applied. \*p < 0.05.

standard deviations above the mean on governmental approval) are more supportive of widening of the EU (0.43; 95% CI = [0.41, 0.45]) compared to respondents that score two standard deviations below the mean on governmental approval (0.32; 95% CI = [0.29, 0.34]). We thereby demonstrate that effects of the Big Five traits on attitudes toward widening of the EU are comparable to the effect of governmental approval on attitudes toward widening of the EU.

Turning to the deepening of the EU, we observe a different pattern (Table 4, column 2). The deepening of the EU was scored on a scale ranging from opposition to deepening of the EU (0) through support for deepening of the EU (1). In line with our expectations, Neuroticism is positively associated with the support for deepening the EU. Specifically, highly neurotic persons are more supportive of deepening the EU (0.28; 95% CI = [0.25, 0.31]) compared with low neurotic respondents (0.23; 95% CI = [0.20, 0.26]). As expected, Openness and Extraversion were unrelated to attitudes toward deepening the EU. We did not formulate a directional hypothesis for Conscientiousness. Here, we observe that Conscientiousness is positively associated with support for deepening the EU. Specifically, we observe that conscientious respondents are more supportive of deepening the EU (0.29; 95% CI = [0.26, 0.31]) compared with low conscientiousness respondents (0.22; 95% CI = [0.19, 0.25]). This could suggest that conscientious persons see the EU as a way to achieve their goals.

The effects of Neuroticism and Conscientiousness on attitudes toward deepening of the EU are modest compared with the effect of government approval on deepening of the EU. Specifically, a positive approval of the government leads to more support for deepening of the EU (0.31; 95% CI = [0.29, 0.33]) compared with a negative evaluation of the government (0.19; 95% CI = [0.17, 0.21]). Note that we also find a negative effect of Agreeableness on attitudes toward deepening of the EU.

Trust in the EU was scored to range from low trust (0) to high trust (1). Contrary to our expectations, Agreeableness was not associated with trust in EU institutions (Table 4, column 3). Instead, we observe that the conscientious citizens trust the EU more compared to low conscientious citizens. We discuss the implications of these unexpected finding below.

Next, we turn to the association between the Big Five traits and identification with the EU. This scale was scored to range from low identification with the EU (0) through high identification with the EU (1). In line with our expectations, we do not find any associations between the Big Five traits and identification with the EU (Table 2, column 4).

Finally, we discuss the association between the Big Five traits and the experience of negative affect toward the EU. As expected, we observe that highly neurotic respondents experience more negative affect (0.41; 95% CI = [0.38, 0.44]) compared to lowly neurotic respondents (0.36; 95% CI = [0.34, 0.39]). The effect of Neuroticism is smaller compared with covariates such as governmental approval. For instance, positive government approval is associated with the experience of less negative affect (0.46; 95% CI = [0.43, 0.48]) compared with a negative government approval (0.32; 95% CI = [0.29, 0.34]).

In sum, we find evidence that the Big Five traits are associated with some but not all EU attitudes. The effects are substantive but generally small compared to the effects of other antecedents of EU attitudes. This is also signaled by the modest increases in R-squared when the Big Five traits are included in the models. Next, we will briefly discuss the associations between the control variables and the EU attitudes. First, a positive governmental approval and economic outlook were associated with support for widening and deepening of the EU, the trust in EU institutions and the identification with the EU. Moreover, governmental approval and economic outlook were negatively associated with the experience of negative affect. The effects of political interest and knowledge on EU attitudes are modest and less consistent (see also Boomgaarden et al., 2011). Lastly, anti-immigrants are consistently negatively associated with the different EU attitudes.

# Discussion and conclusion

In this study, we have established that Big Five personality traits are antecedents of a diverse set of EU attitudes. The widening of the EU is associated with high levels of Openness, Agreeableness and Neuroticism and low levels of Extraversion. Deepening of the EU is positively associated with Neuroticism as well as Conscientiousness. Trust in EU institutions is positively associated with Conscientiousness, whereas we expected Agreeableness to be an antecedent of this trait. The identification with the EU is unrelated to personality traits. Lastly, the experience of negative affect toward the EU is associated with high levels of Neuroticism. We thereby demonstrate that the Big Five traits do not correlate homogenously with the EU attitudes. The effects of the personality traits on EU attitudes are smaller compared to the other antecedents employed in this study. Yet, this might not be surprising as other antecedents of the EU attitudes, such as governmental approval, economic outlook, anti-immigrant attitudes and national identity, are conceptually closer related to EU attitudes.

We observed some unexpected associations between personality traits and EU attitudes. Specifically, the absence of the expected association between Agreeableness and trust in EU institutions could have at least two alternative explanations. First, this could imply that the trust in supranational level institutions is too distant or abstract compared to, for instance, trust in national politicians. Second, our null finding could also be driven by the operationalization of the dependent or independent variable. The dependent variable is operationalized in line with earlier research (Harteveld et al., 2013; Lubbers, 2008) which makes it unlikely to underlie the null finding. Personality traits were measured using the 20-item mini-IPIP which is a reliable and valid instrument of the Big Five traits (Donnellan et al., 2006). Future research could turn to more elaborate personality inventories in order to explore associations between trust in EU institutions and the sub-dimensions of Agreeableness (Osborne et al., 2013). To conclude, future research will have to address the association between Agreeableness and the trust in EU institutions. Similarly, the unexpected positive association between

Conscientiousness and trust in the EU needs to be replicated before conclusions can be drawn.

This study opens up for a few agenda's for further research. First, we build upon the commonly made assumption that personality traits shape attitudes toward the EU. Yet, political attitudes are also relatively stable over time (Ansolabehere et al., 2008) and also develop before adulthood (Hatemi et al., 2009). Moreover, twin studies find that personality traits and political attitudes are correlated but point out that the influence of genes on political attitudes is only to a limited extent mediated by personality traits (Funk et al., 2013). These insights raise awareness that not all studies support the assertion that personality traits shape political attitudes and further research is necessary to address the nature of this relationship (Feldman, 2013).

Second, future research should assess the association between personality and EU attitudes across political contexts. Generally, personality traits are distributed similarly across, western, countries (McCrae and Terracciano, 2005). However, the associations between personality traits and EU attitudes could vary across different political contexts (see for instance, Malka et al., 2014). Comparative research should therefore theorize and assess whether the associations between Big Five traits and EU attitudes are moderated by the political context. For instance, the associations between Openness and attitudes toward widening of the EU might only be present among current member states but not among candidate member states. These and other hypotheses could be explored in future research.

Third, Maier et al. (2015) demonstrate that implicit attitudes toward the EU influence Eurosceptic voting. Future research could theorize and assess whether Big Five traits are also correlates of implicit attitudes and whether these associations differ from the associations between Big Five traits and explicit measures of EU attitudes.

Fourth, the EU is an ongoing project which has been marked by large changes in the institutional set-up which influence the attitudes of citizens toward the EU (Hakhverdian et al., 2013; Semetko et al., 2003). Future research could explore if and to what extent personality traits shape the response to changes in the institutional set-up of the EU. For instance, personality traits could condition how citizens respond to the admission of new member states or the further deepening of the EU.

Fifth, personality traits should interact with the political environment in shaping EU attitudes. Page and Shapiro (1992) argued that media are likely to shape perceptions of international and foreign policy issues. Zaller (1992) noted that personality shapes how citizens respond to situational stimuli. Citizens are especially influenced by situational stimuli such as campaign adds or frames when the content of the stimuli resonates with the personality trait (Dinesen et al., 2014; Gerber et al., 2013). When it comes to EU attitudes, Schuck and De Vreese (2006), for instance, demonstrated that a frame which stresses the risk associated with further EU integration make citizens less likely to support EU integration. It is possible that this frame is especially effective among low scorers on Openness who are

reluctant to try new activities and unlikely to take risks. Future research could theorize and assess whether personality traits interact with news frames in shaping EU attitudes.

Finally, EU attitudes influence the likelihood to cast an Eurosceptic vote (Hobolt and Brouard, 2010; Maier et al., 2015; van Spanje and De Vreese, 2011). Political psychology research has shown that political attitudes, at least to some extent, mediate the association between Big Five personality traits and vote choice (Mondak, 2010; Schoen and Schumann, 2007). Future research could study the associations between personality traits, multidimensional EU attitudes and vote choice. The tendency to vote for Eurosceptic parties could, at least partly, be explained by the fact that closed-minded voters oppose the widening of the EU. The association between personality, multiple EU attitude dimension and vote choice could help to refine the understanding of Eurosceptic voting.

To conclude, this study offers three implications for the study of the public opinion toward the EU. First, we started out with the observation that we still do not fully understand why attitudes toward the EU differ among citizens. It is important to understand the determinants of EU attitudes because they support, at least partly, the legitimacy of the EU. We have theorized and demonstrated that Big Five traits are to different degrees and regularities associated with EU attitudes independent from well-known antecedents of EU attitudes. This implies that public opinion toward the EU, and thereby the legitimacy of the EU, is at least partly influenced by citizens' personality. In doing so, this study contributes to the understanding of the dynamics of public opinion toward the EU and accordingly its legitimacy.

Second, we have shown that personality traits are to different degrees and regularities associated with the different EU attitudes. Accordingly, the decision to include the Big Five traits in the study of EU attitudes will depend on the EU attitude of interest. This study, as well as the work by Schoen (2007), could thereby serve as the starting point for decisions to focus upon personality. For instance, scholars interested in attitudes toward widening of the EU should take the Big Five traits into account, whereas most Big Five traits are unrelated to the identification with the EU. Yet, at this point it will be important that the here documented pattern of associations will be replicated in other samples across political contexts.

Third, the results of our study imply that personality traits are likely to condition citizens' responses to changes in the institutional set-up of the EU. Media increasingly pay attention to the EU (Koopmans, 2007). Accordingly, personality traits could condition the effects of the media on EU attitudes. For instance, the open-minded, agreeable and neurotic will respond welcoming to the admission of new countries to the EU. In the short run, this insight will, hopefully, raise awareness among politicians, policy makers, the news media and European citizens that personality traits, at least partly, underlie the roots of political conflict. In the long run, politicians, policy makers and the news media could utilize the knowledge that personality underlies EU attitudes in order to tailor their communication more effectively to the motives rooted in personality traits.

Tailoring information to the personality traits of voters could have positive as well as negative consequences for the democratic legitimacy of the EU. On the one hand, elites can better inform citizens about the upcoming changes in the institutional set-up of the EU. The positive consequence of an informed public is that this will increase the democratic legitimacy of the EU (Trenz, 2008). On the other hand, the increased tailoring of information to the personality traits of citizens could have negative consequences for the legitimacy of the EU. The shared information environment will become smaller and voters will be less exposed to information that challenges their beliefs. As a consequence attitudes could polarize (Taber and Lodge, 2006). We believe that, eventually, research addressing the association between personality and EU attitudes could play a key role in the discussion of the democratic legitimacy of the EU. Our study just marks the starting point.

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### **Notes**

- Tillman (2013: 573) showed that high scorers on authoritarianism tend to experience more 'fears about the building of the European Union'. Authoritarianism is, however, associated with low levels of Openness and Agreeableness (Sibley and Duckitt, 2008). This confirms that high scorers on Openness and Agreeableness should support EU integration.
- Online Appendix C provides the correlations between the dependent variables and the independent variables.
- 3. See Appendix C for the item wordings and descriptive statistics of the control variables.
- 4. Throughout the study we will compare the effects of personality with governmental approval. See Online Appendix E for the predicted EU attitudes of all independent variables that were associated with the EU attitude dimension at two standard deviations above and below the mean.
- 5. One might put forward that personality traits influence EU attitudes via their effect on other political attitudes (Mondak, 2010: 5). We have assessed the possibility of these indirect associations between personality traits and EU attitudes using a structural equation model. In Online Appendix F, we demonstrate that personality only directly influences EU attitudes and that the effects are not mediated or suppressed by the control variables.
- 6. Some existing datasets could be utilized in this regard. Yet, these studies are not without limitations when it comes to the measures of EU attitudes and the operationalization of personality. Some samples only contain measures of some but not all Big Five traits

(i.e. European Social Survey), while others measure the Big Five traits but only contain a limited number items tapping into EU attitudes (i.e. World Values Surveys).

#### References

- Anderson CJ (1998) When in doubt use proxies: Attitudes to domestic politics and support for the EU. *Comparative Political Studies* 31(5): 569–601.
- Anderson CJ and Reichert MS (1996) Economic benefits and support for membership in the E.U.: A cross-national analysis. *Journal of Public Policy* 15(3): 231–249.
- Ansolabehere S, Rodden J and Snyder JM (2008) The strength of issues: Using multiple measures to gauge preference stability, ideological constraint, and issue voting. *American Political Science Review* 102(2): 215–232.
- Asendorpf JB and Denissen JJA (2006) Predictive validity of personality types versus personality dimensions from early childhood to adulthood: Implications for the distinction between core and surface traits. *Merrill-Palmer Quarterly* 52(3): 486–513.
- Asendorpf JB and van Aken MAG (2003) Personality–relationship transaction in adolescence: Core versus surface personality characteristics. *Journal of Personality* 71(4): 629–666.
- Azrout R, van Spanje J and de Vreese C (2011) Talking Turkey: Anti-immigrant attitudes and their effect on support for Turkish membership of the EU. *European Union Politics* 12(1): 3–19.
- Bakker BN, Hopmann DN and Persson M (2015a) Personality traits and the stability and change in party identification. *European Journal of Political Research* 54(2): 197–215.
- Bakker BN, Klemmensen R, Nørgaard AS, et al. (2015b) Stay loyal or exit the party? How openness to experience and extraversion explain vote switching. *Political Psychology*, Epub ahead of print 4 May 2015. DOI: 10.1111/pops.12257.
- Bloeser AJ, Canache D, Mitchell D-G, et al. (2013) The temporal consistency of personality effects: Evidence from the British Household Panel Survey. *Political Psychology*, Epub ahead of print 15 August 2013. DOI: 10.1111/pops.12067.
- Boomgaarden HG, Schuck ART, Elenbaas M, et al. (2011) Mapping EU attitudes: Conceptual and empirical dimensions of Euroscepticism and EU support. *European Union Politics* 12(2): 241–266.
- Bruter M (2003) Winning hearts and minds for Europe: The impact of news and symbols on civic and cultural European identity. *Comparative Political Studies* 36(10): 1148–1179.
- Canache D, Hayes M, Mondak JJ, et al. (2013) Openness, extraversion and the intention to emigrate. *Journal of Research in Personality* 47(4): 351–355.
- Carey S (2002) Undivided loyalties: Is national identity an obstacle to European integration? *European Union Politics* 3(4): 387–413.
- Carney DR, Jost JT, Gosling SD, et al. (2008) The secret lives of liberals and conservatives: Personality profiles, interaction styles, and the things they leave behind. *Political Psychology* 29(6): 807–840.
- Costa PT, McCrae RR and Dye DA (1991) Facets scales for agreeableness and conscientiousness: A revision of the NEO personality inventory. *Personality and Individual Differences* 12(9): 887–898.
- Credé M, Harms P, Niehorster S, et al. (2012) An evaluation of the consequences of using short measures of the big five personality traits. *Journal of Personality and Social Psychology* 102(4): 874–88.

- Denissen JJA and Penke L (2008) Motivational individual reaction norms underlying the five-factor model of personality: First steps towards a theory-based conceptual framework. *Journal of Research in Personality* 42(5): 1285–1302.
- De Vreese CH, Azrout R and Moller J (2014) 2014 European Parliament Election Campaign Study: Data and Documentation. Amsterdam: University of Amsterdam.
- De Vreese CH, Boomgaarden HG and Semetko HA (2008) Hard and soft: Public support for Turkish membership in the EU. *European Union Politics* 9(4): 511–530.
- De Vries CE (2007) Sleeping giant: Fact or fairytale?: How European integration affects national elections. *European Union Politics* 8(3): 363–385.
- De Vries CE and Tillman ER (2011) European Union issue voting in East and West Europe: The role of political context. *Comparative European Politics* 9(1): 1–17.
- Digman JM (1990) Personality structure: Emergence of the five-factor model. *Annual Review of Psychology* 41(1): 417–440.
- Dinesen PT, Klemmensen R and Nørgaard AS (2014) Attitudes toward immigration: The role of personal predispositions. *Political Psychology*, Epub ahead of print 15 May 2014. DOI: 10.1111/pops.12220.
- Donnellan MB, Oswald FL, Baird BM, et al. (2006) The mini-IPIP scales: Tiny-yet-effective measures of the Big Five factors of personality. *Psychological Assessment* 18(2): 192–203.
- Druckman JN and McDermott R (2008) Emotion and the framing of risky choice. *Political Behavior* 30(3): 297–321.
- Duckitt J and Sibley CG (2014) Personality, ideological attitudes, and group identity as predictors of political behavior in majority and minority ethnic groups. *Political Psychology*, Epub ahead of print 2 July 2014. DOI: 10.1111/pops.12222.
- Erdheim J, Wang M and Zickar MJ (2006) Linking the big five personality constructs to organizational commitment. *Personality and Individual Differences* 41(5): 959–970.
- Feldman S (2013) Political ideology. In: Huddy L, Sears DO and Levy JS (eds) Oxford Handbook of Political Psychology. New York: Oxford University Press, pp. 590–626.
- Feldman S and Johnston CD (2014) Understanding the determinants of political ideology: Implications of structural complexity. *Political Psychology* 35(3): 337–358.
- Franklin M, Marsh M and McLaren L (1994) Uncorking the bottle: Popular opposition to European unification in the wake of Maastricht. *Journal of Common Market Studies* 32(4): 455–472.
- Funk CL, Smith KB, Alford JR, et al. (2013) Genetic and environmental transmission of political orientations. *Political Psychology* 34(6): 805–819.
- Gabel MJ (1998) Public support for European integration: An empirical test of five theories. *The Journal of Politics* 60(2): 333–354.
- Gabel MJ and Palmer HD (1995) Understanding variation in public support for European integration. *European Journal of Political Research* 27(1): 3–19.
- Gabel MJ and Whitten GD (1997) Economic conditions, economic perceptions, and public support for European integration. *Political Behavior* 19(1): 81–96.
- Garry J (2014) Emotions and voting in EU referendums. *European Union Politics* 15(2): 235–254.
- Gerber AS, Huber GA, Doherty D, et al. (2010) Personality and political attitudes: Relationships across issue domains and political contexts. *American Political Science Review* 104(1): 111–133.
- Gerber AS, Huber GA, Doherty D, et al. (2011) The big five personality traits in the political arena. *Annual Review of Political Science* 14(1): 265–287.

Gerber AS, Huber GA, Doherty D, et al. (2012) Personality and the strength and direction of partisan identification. *Political Behavior* 34(4): 653–688.

- Gerber AS, Huber GA, Doherty D, et al. (2013) Assessing the stability of psychological and political survey measures. *American Politics Research* 41(1): 54–75.
- Gerber AS, Huber GA, Doherty D, et al. (2013) Big five personality traits and responses to persuasive appeals: Results from voter turnout experiments. *Political Behavior* 35(4): 687–728.
- Goldberg LR (1992) The development of markers for the big-five factor structure. *Psychological Assessment* 4(1): 26–42.
- Hakhverdian A, van Elsas E, van der Brug W, et al. (2013) Euroscepticism and education: A longitudinal study of twelve EU member states, 1973–2010. *European Union Politics* 14(4): 522–541.
- Hart W, Adams JM, Alex Burton K, et al. (2012) Shaping reality vs. hiding from reality: Reconsidering the effects of trait need for closure on information search. *Journal of Research in Personality* 46(5): 489–496.
- Harteveld E, van der Meer T and de Vries CE (2013) In Europe we trust? Exploring three logics of trust in the European Union. *European Union Politics* 14(4): 542–565.
- Hatemi PK, Funk CL, Medland SE, et al. (2009) Genetic and environmental transmission of political attitudes over a life time. *The Journal of Politics* 71(3): 1141–1156.
- Hobolt SB (2005) When Europe matters: The impact of political information on voting behaviour in EU referendums. *Journal of Elections, Public Opinion and Parties* 15(1): 37–41.
- Hobolt SB (2014) Ever closer or ever wider? Public attitudes towards further enlargement and integration in the European Union. *Journal of European Public Policy* 21(5): 664–680.
- Hobolt SB and Brouard S (2010) Contesting the European Union? Why the Dutch and the French rejected the European constitution. *Political Research Quarterly* 64(2): 309–322.
- Hooghe L and Marks G (2005) Calculation, community and cues: Public opinion on European integration. *European Union Politics* 6(4): 419–443.
- Jost JT, Federico CM and Napier JL (2009) Political ideology: Its structure, functions, and elective affinities. *Annual Review of Psychology* 60: 307–337.
- Karp JA and Bowler S (2006) Broadening and deepening or broadening versus deepening: The question of enlargement and Europe's 'hesitant Europeans'. *European Journal of Political Research* 45(3): 369–390.
- Koopmans R (2007) Who inhabits the European public sphere? Winners and losers, supporters and opponents in Europeanised political debates. *European Journal of Political Research* 46(2): 183–210.
- Kritzinger S (2003) The influence of the nation-state on individual support for the European Union. *European Union Politics* 4(2): 219–241.
- Lubbers M (2008) Regarding the Dutch 'Nee' to the European constitution: A test of the identity, utilitarian and political approaches to voting 'No'. *European Union Politics* 9(1): 59–85.
- Lubbers M and Jaspers E (2011) A longitudinal study of euroscepticism in the Netherlands: 2008 versus 1990. *European Union Politics* 12(1): 21–40.
- McCrae RR (2009) The physics and chemistry of personality. *Theory and Psychology* 19(5): 670–687.

- McCrae RR and Terracciano A (2005) Universal features of personality traits from the observer's perspective: Data from 50 cultures. *Journal of Personality and Social Psychology* 88(3): 547–561.
- McLaren LM (2002) Public support for the European Union: Cost/benefit analysis or perceived cultural threat? *The Journal of Politics* 64(2): 551–566.
- McLaren LM (2007) Explaining opposition to Turkish membership of the EU. *European Union Politics* 8(2): 251–278.
- Maier M, Maier J, Jahn N, et al. (2015) Measuring citizens' implicit and explicit attitudes towards the European Union. *European Union Politics* 16(3): 369–385.
- Malka A, Soto CJ, Inzlicht M, et al. (2014) Predictors of cultural and economic conservatism. *Journal of Personality and Social Psychology* 106(6): 1031–1051.
- Mondak JJ (2010) Personality and the Foundations of Political Behavior. Cambridge: Cambridge University Press.
- Mondak JJ and Halperin KD (2008) A framework for the study of personality and political behaviour. *British Journal of Political Science* 38(2): 335–362.
- Osborne D, Wootton LW and Sibley CG (2013) Are liberals agreeable or not? Politeness and compassion differentially predict political conservatism via distinct ideologies. *Social Psychology* 44(5): 354–360.
- Page BI and Shapiro RY (1992) The Rational Public. Fifty Years of Trends in Americans' Policy Preferences. Chicago: University of Chicago Press.
- Ray L (2003) Reconsidering the link between incumbent support and pro-EU opinion. *European Union Politics* 4(3): 259–279.
- Roberts BW, Walton KE and Viechtbauer W (2006) Patterns of mean-level change in personality traits across the life course: A meta-analysis of longitudinal studies. *Psychological Bulletin* 132(1): 1–25.
- Sagiv L, Roccas S and Hazan O (2012) Identification with groups: The role of personality and context. *Journal of Personality* 80(2): 345–374.
- Schoen H (2007) Personality traits and foreign policy attitudes in German public opinion. *Journal of Conflict Resolution* 51(3): 408–430.
- Schoen H and Schumann S (2007) Personality traits, partisan attitudes, and voting behavior. Evidence from Germany. *Political Psychology* 28(4): 471–498.
- Schuck ART and de Vreese CH (2006) Between risk and opportunity. *European Journal of Communication* 21(1): 5–32.
- Semetko HA, Van Der Brug W and Valkenburg PM (2003) The influence of political events on attitudes towards the European Union. *British Journal of Political Science* 33(4): 621–634.
- Sibley CG and Duckitt J (2008) Personality and prejudice: A meta-analysis and theoretical review. *Personality and Social Psychology Review* 12(3): 248–279.
- Taber CS and Lodge M (2006) Motivated skepticism in the evaluation of political beliefs. *American Journal of Political Science* 50(3): 755–769.
- Tillman ER (2012) Support for the euro, political knowledge, and voting behavior in the 2001 and 2005 UK general elections. *European Union Politics* 13(3): 367–389.
- Tillman ER (2013) Authoritarianism and citizen attitudes towards European integration. *European Union Politics* 14(4): 566–589.
- Trenz H-J (2008) Understanding media impact on European integration: Enhancing or restricting the scope of legitimacy of the EU? *Journal of European Integration* 30(2): 291–309.

Van Spanje J and de Vreese C (2011) So what's wrong with the EU? Motivations underlying the Eurosceptic vote in the 2009 European elections. *European Union Politics* 12(3): 405–429.

- Yamagata S, Suzuki A, Ando J, et al. (2006) Is the genetic structure of human personality universal? A cross-cultural twin study from North America, Europe, and Asia. *Journal of Personality and Social Psychology* 90(6): 987–998.
- Zaller JR (1992) *The Nature and Origins of Mass Opinion*. Cambridge: Cambridge University Press.