

Institutions, culture and migrants' preference for state-provided welfare.

Longitudinal evidence from Germany

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Abstract

Using the difference-in-differences estimator and data provided by the German Socio-Economic Panel, this article explores migrants' preferences for state-provided welfare. The study finds evidence that over time, the preferences of immigrants and natives become more similar. We interpret this finding as evidence that the culture of home countries does not have a time-invariant effect, and that immigrants' welfare preferences are subject to a socializing effect of the host countries' welfare regime.

Key words: Migrants, Welfare Attitudes, Culture, Institutions, German Socio-economic Panel, Difference-in-Differences, Germany

Introduction

The consequences of migration for public support of the welfare state are hotly debated. Building on US-American research about the influence of racial heterogeneity on the welfare preferences of white US-Americans (Alesina et al., 2001; Gilens, 1999), some scholars argue that migration could undermine natives' support for welfare. Recently, increasing ethnic diversity of European countries has raised the question of whether European welfare states might be pushed towards lower, more US-American-like levels of welfare spending (Alesina and Glaeser, 2004: 175; Van Oorschot, 2006). The underlying assumption of these inquiries is that natives' welfare preferences shape the future welfare state via the democratic process of representation. Several studies which focused on European countries have found that migration and attitudes towards migrants affect Europeans' preferences for redistribution (for recent overviews see Brady and Finnigan, 2014; Schmidt and Spies, 2014; Schmidt-Catran and Spies, forthcoming).

Surprisingly, migrants' own welfare preferences are largely missing from this body of research, with few notable exceptions (Luttmer and Singhal, 2011; Reeskens and Van Oorschot 2015). However, migrants' preferences are of vital importance for several reasons. Firstly and quite generally, migrants' welfare preferences are of interest because as they gain the right to vote in their host countries, they also have the potential of directly shaping the future welfare states. Welfare regimes promote justice principles which are shared among the population (Arts and Gelissen, 2001; Clasen and Van Oorschot, 2002). Popular support for a welfare system depends on this consensus and is crucial for its persistence (Brooks and Manza, 2006). If welfare preferences from countries of origin are persistent—as argued by Luttmer and Singhal (2011), then the inflow of immigrants could undermine social consensus about the state's role in welfare distribution. If immigrants adapt their

preferences to those in the host country, no radical change of this social consensus would occur. Our study provides evidence for this debate. Second, since previous research demonstrated that natives perceive immigrants as undeserving welfare abusers (Crepaz, 2006; Van Oorschot, 2006), knowing whether immigrants themselves are actually more in favour of welfare redistribution than natives are, puts these perceptions into perspective. Third, exploring migrants' welfare preferences also has consequences for the theoretical debate on the drivers of these preferences. On one hand, welfare regime theory assumes that welfare regimes reflect a dominant logic of solidarity (re-)produced by the institutional setting (Larsen, 2008; Mau, 2004). Thus, if migrants come in contact with the host country's welfare institutions, they will adopt that country's preferences. On the other hand, migrants carry their home countries' culture, including values which reflect individuals' reliance on the state for welfare provision. To the extent that these cultural values are stable, migrants' welfare preferences will be different from those of natives, *and* the differences will persist over time (Luttmer and Singhal, 2011). Researching migrants' preferences with longitudinal data as we do in this paper enables a direct test of the implications of these theories. This article answers two interrelated questions. First, are there general differences between immigrants' and natives' welfare attitudes? Second, do the welfare attitudes of immigrants and natives converge over time? Our study finds clear evidence that over time, the preferences of immigrants and natives become more similar. We interpret this finding as indication that home countries' culture does not have a time-invariant effect, and that immigrants' welfare preferences are subject to the socializing effect of the host countries' welfare regime.

In this article, we use panel data from the German Socio-Economic Panel Study (GSOEP) to compare the preferences of migrants from Turkey, Southern and Eastern Europe to those of native (West) Germans. The data allows us to contribute to the inchoate literature on migrants' welfare preferences in two ways. First, while most of previous research has been purely cross-sectional (Dancygier and Saunders, 2006; Luttmer and Singhal, 2011; Reeskens and Van Oorschot, 2015) and therefore unable to directly address issues of change over time, we are able to give a methodologically sound answer to the question of whether immigrants' and natives' attitudes converge over time. Second, unlike previous studies, which use single items (Luttmer and Singhal, 2011) or simple mean-scores (Reeskens and Van Oorschot, 2015) to measure welfare attitudes, we develop a measurement model of welfare attitudes that is tested for comparability between natives and migrants. That is, the measurement model is tested for measurement invariance across the groups under investigation and also across time to make sure that our comparisons are statistically valid. Although we analyze data from Germany only, we believe these insights are valuable for the more general debate, because Germany, like other western European countries, has long experience with a heterogeneous group of immigrants and because its conservative welfare system is typical for a larger group of European countries (Esping-Andersen, 1990; Arts and Gelissen, 2002).

After a brief introduction on immigration and welfare system in Germany, we review the literature on welfare attitudes. Building on two theoretical explanations for migrants' welfare preferences, the cultural and institutional approaches, we propose two hypotheses. We then present the data and methods, and the results of our analysis. We conclude with reflections on the future of the welfare state.

Immigration and welfare distribution in Germany

After the Second World War, Germany has faced a permanent immigration flow of guest workers, family members of residents or asylum seekers and refugees. The proportion of foreign nationals rose from 1% in 1951 to 8.9% in 2002 (Riphahn, 2004) and to ca. 10.11% in 2014 (DeStatis, 2014).

At the beginning of 2000s minimum income support in Germany has been reformed. Before the reform, the main pillars of this systems were "unemployment benefit", "unemployment assistance" and "social assistance". Unemployment benefit was an insurance-based benefit, whose amount depended on duration and amount of payments. It was paid in full (60 to 67% of the previous net salary) for a period between 12 and 36 months (depending upon the claimant's age and work history). In case of continued unemployment, a person would receive unemployment assistance, amounting to 53 to 57% of the last net salary. Social assistance was divided into general income support and support for special circumstances, and eligibility was independent of nationality and based only on residence and work history. However, in case of immigrants, different regulations applied. For example, ethnic German returning to Germany received full benefits, on equal basis to the natives, while immigrants on temporary residence permits were at risk of losing them in case of reliance on welfare benefits (Riphahn, 2004, Castronova et al., 2001). At the beginning of 2000 a set of reforms has changed the structure of minimum income support in Germany. The final step of these reforms known as Hartz IV combined unemployment assistance and social assistance in the "unemployment benefit II". This benefit is a flat-rate benefit independent of prior earnings, which can be claimed by individuals who exhaust their unemployment benefit I entitlements. Persons in need can also claim it regardless of previous insurance contributions or unemployment benefit I receipt. Benefits are paid to

those able to work at least 15 hours per week. Those not able to work, e.g. due to sickness, disability, or care responsibilities, are entitled to social assistance instead, whose eligibility conditions remained the same to the ones before the reform. As in the period pre-reform, immigrants have access to these benefits if they fulfill the eligibility conditions.

Although immigrants are a relatively small fraction of the population of Germany, they account for a much larger proportion among welfare recipients. For example, in 2002, they accounted for 22.3% of welfare recipients, and 23.30 in 2014. Figures OA1 and OA2 show that this is true for most of the postwar period. Given these numbers, the question of explaining the differences between immigrants' and natives' takeup of welfare benefits naturally emerged. Research has found that given eligibility, immigrants are not more likely to take up benefits than natives (Castronova et al., 2001), but immigrants are more likely than natives to find themselves in need. For example, in Germany 23.6% of migrant household are below poverty line, compared to only 6.3% of native households (Morissens and Sainsbury, 2005). Other studies showed that immigrants' higher welfare dependency rates (Boeri et al., 2002; Muenz and Fassmann, 2004) are linked to their socio-economically vulnerable position, characterized by lower education and income, and higher unemployment (Heath et al., 2008). Several studies have found that the use of welfare benefits differs across immigrant groups. For example, majority of recent intra-EU immigrants are more likely to find and take up employment, contribute with about 3% of total government revenue, and consume about 2.2% of total benefits distributed in Germany (see Tables OA1 and OA2 in the online appendix)¹ (ECAS 2014). Riphahn et al. (2013) argue

¹ In this version of the manuscript the online appendix is included at the end of the Tables and Figures Section. The final published paper will have an online appendix.

that although welfare users' numbers are overall higher among Turks compared to natives, the difference between first-generation Turks and natives disappears after controlling for relevant socio-economic variables. The authors concluded that immigrants in Turkey are more likely to rely on welfare not because they are immigrants but because of their – on-average – lower socio-economic position (also see Barrett and McCarthy, 2008). If immigrants' reliance on welfare is well-documented, it is less known what drives their preferences for welfare distribution. To this issue we turn now.

Immigrants' welfare preferences—theory and hypotheses

This article, while recognizing that preferences for welfare distribution are influenced by personal economic situation (poverty, large number of dependents, difficult (re)insertion on the labour market), explores another set of determinants of welfare preferences, namely values and norms. On the one hand, individual values and norms are developed through family socialization and other formative experiences at the individual level, and their impact on individuals policy and political preferences are well researched (for preferences for redistribution, see Neundorf and Soroka unpublished manuscript, for effects on general economic preferences see also Giuliano and Spilimbergo 2009, Malmendier and Nagel 2011, Ehrmann and Tzamourani 2012). On the other hand, there are societal values and norms, whose impact remains hotly debated. The welfare state literature largely agrees that welfare regimes promote a dominant logic of solidarity (Andreß and Heien, 2001; Clasen and Van Oorschot, 2002; Esping-Andersen, 1990; Larsen, 2006, 2008; Mau, 2004). However, what lies behind this logic of solidarity is less clear. In our reading, the existing literature identifies two possible channels through which the logic of solidarity is transmitted: culture and institutions. These two channels are often not clearly separated, primarily because they are

empirically hard to disentangle (Alesina and Giuliano, 2013; Luttmer and Singhal, 2011: 157). This is because, as the normative institutionalism posits (Larsen, 2006: 4-5), a welfare state's "institutional logic" reflects the cultural background of a society. However, studying immigrants opens an insight into the effects of culture and institutions because, as they move between cultural and institutional contexts, they provide the researcher with a setting similar to a natural experiment (Alesina and Giuliano, 2013: 15-16; Dinesen, 2013).

Culture and welfare preferences

Culture can be defined as "customary beliefs and values that ethnic, religious, and social groups transmit fairly unchanged from generation to generation" (Guiso et al., 2006: 23). It has been argued that cross-country differences in beliefs about self-determination, and therefore perceived causes of poverty, wealth and social mobility, are deeply rooted cultural traits. This in turn explains why public support for welfare is higher in some countries than in others (Alesina et al., 2001; Alesina and Glaeser, 2004). At societal level, these cultural beliefs are covered by the concepts of individualism and its opposite, collectivism, which encompass sets of interconnected ideas about the individuals-society-state nexus. More precisely, from the individualist perspective, individuals are responsible for their own welfare (Barry, 1999; Pinch, 1997), success and failure in life are attributed to individual factors (Kluegel and Smith, 1986), and the "State delivery of welfare is seen as creating a culture of dependency [...] and it should be limited to minimum levels" (Sabbagh and Vanhuyse, 2006: 613). Using Hofstede's individualism measure (Hofstede 2001), Berigan and Irwin (2011) demonstrate that it is negatively related to public support for income redistribution. Following the same logic, this result can be extrapolated to other welfare-

related dimensions. We therefore infer that support for state-distributed welfare services is likely to be lower in more individualistic countries (also compare Breznau, 2013).

Institutions and welfare preferences

As noted above, institutions reflect cultural backgrounds. However, Larsen (2006: 18, 45; 2008) argues that welfare institutions themselves shape the perception of poverty and deservingness and consequently welfare attitudes. The implication is that individuals' view of the world is not directly influenced by culture but rather through transmission via institutions. This interpretation conforms to Homans' argument that "the rule of distributive justice is a statement of what ought to be, and what people say ought to be is determined, in the long run, and with some lag, by what they find in fact to be the case" (1974: 249-250).

These institutional arguments suggest that selective welfare policies create a division between payers and receivers. This division not only lowers the perceived reciprocity of the system, but provides ground for discussion of whether receivers are actually needy, deserving and sufficiently grateful (Rothstein, 1998: 159). This stigmatization of the needy in selective welfare systems generates vicious circles because welfare receivers react negatively to their stigmatization, fostering the negative image that net-contributors have of them. On the contrary, universal welfare systems "instead of defining a line between 'them' and 'us', [...] actually help define everybody within the nation-state as belonging to one group. The vicious cycle of selective welfare policy is replaced by a positive circle" (Larsen, 2008: 153). For the purpose of our argument, from the institutional approach we derive the implication that preferences for state-provided welfare are likely to be positively related to the degree of universalism of a welfare regime.

Hypotheses

Based on the two inferences following from the cultural and the institutional approaches, we can now formulate our expectations. But before, a clarification is needed: This analysis relies on a comparison between immigrants and West Germans. We use West Germans as the main comparison group of our analysis for two reasons: first, because before 1989, Western Germany was the main target of immigration; and second, because the conservative welfare system of West Germany was extended to include the new *Länder* after reunification. However, we also include the East German group in the analysis, because the East-West German comparison—given that East Germans experience a change from universalistic to conservative welfare system—provides supplementary evidence for the theoretical debate this paper addresses.

We start with the cultural perspective. Hofstede's individualism measure shows remarkable differences between Germany and the immigrants' countries of origin which are part of our sample. According to this measure, Germany is a rather individualistic country with a score of 67 out of 100.² The average score of all post-socialist countries, from which we observe immigrants and for which data is provided³, equals 47. The average score of the Southern European countries from which we observe immigrants in our sample⁴ is 47.25, and the score of Turkey is 37. Following the rationale of the first inference, we expect that immigrants have stronger preferences for state-provided welfare than (West) Germans as they originate from less individualistic cultures.

² All reported measures from <http://geert-hofstede.com/countries.html> (accessed at 12/19/2013).

³ Romania, Slovenia, Croatia, Poland, Hungary, Bulgaria, Czech Republic, Russia, Latvia, Slovakia, Lithuania, Serbia.

⁴ Italy, Spain, Portugal, Greece.

To back up this intuition, Figure 1 shows a measure of support for state-provided welfare which we derived from the European Social Survey 2008 (ESS, Round 4).⁵ The figure includes all countries that are represented in the ESS *and* as countries of origin in our immigrant sample from the GSOEP. Unfortunately, the ESS does not include all countries of origin that we observe in the GSOEP. Nevertheless, Figure 1 provides support for the culture-hypothesis formulated above: Migrants from post-socialist and Mediterranean countries (including Turkey) should show stronger support for state-provided welfare than native West Germans.

[Figure 1 about here]

As we have discussed above, these cultural difference overlap with the welfare regime types. On the one hand, socialist countries have had universal welfare states, with the state providing a wide range of benefits to everyone regardless of their contributions, a visible difference from the conservative regime of Germany, where benefits are strongly bound to individual contributions. Empirical analyses found that individuals living in these types of welfare states are more in favour of state-provided welfare than people from conservative welfare states (Arts and Gelissen, 2001; Roosma et al., 2013). On the other hand, the current consensus is that Mediterranean countries form a distinct welfare regime type (see Arts and Gelissen, 2002, for an overview of the debate), as “Their social security systems are immature because, on the one hand, there is no articulated net of minimum

⁵ The measure shown in Figure 1 and 2 has been derived by an exploratory factor analysis of six items on governments’ responsibility to provide “jobs”, “health care”, “standard of living for the old”, “standard of living for unemployed”, “child care services” and “paid leave from work”. Each item was measured on an 11-point scale ranging from “not government’s responsibility at all” [0] to “entirely government’s responsibility” [10]. The (maximum likelihood) factor analysis gave two factors with the first factor having an Eigenvalue of 3.16 (second factor = 0.43, unrotated solution). The measure shown in Figure 1 and 2 is the factor score of the first factor.

social protection but, on the other, some benefits are very generous and some provisions are universal.” (Arts and Gelissen, 2001: 286). The Mediterranean cluster includes Spain, Portugal, Italy and Greece. To this cluster, Turkey has recently been added (Gal, 2010; Grütjen, 2008). After the Second World War, The Turkish welfare state has started to develop along the lines of a Bismarckian model (Şahin, 2008), and successive changes and recent reforms have brought it closer to the Mediterranean model (Grütjen, 2008; for a comparison, see Table OA3 in the online appendix).

Following the rationale of our second inference, that the institutional setting of country of origin matters, we expect that immigrants from these areas are more in favour of state-provided welfare than West German natives. This expectation is based on the following rationale: Migrants originating in the former socialist countries were socialized in a strongly universal welfare state where the state was the main provider - and consequently continued to express preference for state-provision of welfare benefits after migration. Migrants originating in Southern Europe and Turkey were socialized in a welfare system which combined state provision for certain groups and some universal benefit categories with strong family provision. As migration disrupts the reliance on families, as family networks are being torn apart, these migrants are also expected to turn to the state for support. Figure 2 shows general support for state-provided welfare, the same factor score as in Figure 1, by welfare regimes. As expected, average support for state-provided welfare is much lower in West Germany, the prototype of a conservative regime, than in all other regimes types.

[Figure 2 about here]

To summarize, the cultural and the institutional approach suggest that immigrants from former socialist and Mediterranean welfare regimes are more in favour of state-provided welfare than persons socialised in conservative welfare systems. Among migrants, the former should have the strongest preference for state-provided welfare, because in the socialist regimes the state provided universal support, unlike Mediterranean regimes, where state support is directed to certain categories only. We expect to observe larger differences between West German natives and immigrants from countries with most different welfare system, namely post communist countries.⁶ Moreover, given that East Germans have experienced a change of welfare system similar to immigrants from Eastern Europe (from universal to conservative), we expect them to display a similar pattern of welfare preferences.

However, although the institutional and the cultural approaches produce similar predictions with regard to initial differences between migrants and natives, they *differ* in their predictions as to the trend of these differences over time. Our specific hypotheses regard this trend. *Hypothesis 1*: If the culture approach is correct and the values are transmitted “fairly unchanged from generation to generation” (Guiso et al., 2006: 23), the above-mentioned differences remain stable over time. *Hypothesis 2*: If the institutional approach is correct, and the institutions shape preferences, then immigrants’ opinions about state’s responsibility for welfare distribution converge over time with those of natives.

⁶ Note that Figure 2 does not support the hypothesis that support is highest in post-socialist countries. In contrast, the figure seems to indicate that support is highest in Mediterranean countries. However, statistically there is no significant difference between the three groups “Mediterranean”, “East Germany” and “Post-socialist”. All of these groups, however, show significantly more support for state-provided welfare than West Germans.

Alternative explanations: Selection effects

If immigrants were a selected group with regard to their welfare preferences (this is, not representative for their origin countries), our expectation about the direction of the initial differences between immigrants and natives would be at stake. The hypotheses, however, remain valid as they relate only to convergence over time. Nevertheless, we will briefly discuss possible selection effects. The welfare magnet hypothesis (Borjas, 1999), argues immigrants with strong welfare preferences are attracted by countries with generous welfare states. There is some evidence that immigrants are attracted by more generous benefits (Heitmuller, 2005, Karidis and Quinn, 2006). But these studies do not factor in the fact that host countries, although they often provide more generous benefits in terms of amount compared to sending countries, also implement measures which restrict immigrants' access to these benefits (see for example Emmenegger and Careja, 2012, Kurekova, 2013, Careja, Emmenegger and Kvist, 2015).

In contrast to the welfare magnet hypothesis, the self-selection hypothesis (Chiswick, 1999), presents immigrants as a self-selected group, characterized by self-confidence and risk acceptance. Since risk aversion is related to demand for welfare provision (Alesina and Ferrara, 2005), the self-selection hypothesis suggests that immigrants are less likely to demand state-provided welfare. Empirical evidence is ambiguous, with supporting (Borjas, 1999; Brueckner, 2000: 514, 523) and disproving (Bonin et al., 2009; Brueckner, 2000: 523) findings. Therefore, while acknowledging possible selection effects, we maintain that, even if immigrants are a selected group, the question at the centre of this study, whether this group's welfare attitudes are different from those of German natives and whether these differences decline over time, remains valid.

Data and methods

Data

We use data from two waves (1997 and 2002) of the German Socio-Economic Panel Study (SOEP, 2011), which contain questions asking respondents' opinions on state responsibility for distributing welfare benefits. The GSOEP samples all private households in Germany and oversamples immigrants' households, therefore providing a unique opportunity to research immigrants' attitudes. Our analysis is restricted to immigrants who permanently live in Germany but were born in another country.

We distinguish immigrant groups based on the welfare regime in their home countries. The sample does not include enough immigrants from social-democratic or liberal welfare regimes but allows us to analyze immigrants from post-socialist and Mediterranean regimes. Table A1 in the appendix lists all origin countries, regime types to which they are assigned, and the number of respondents from each origin country. The Turks are the largest group of immigrants in Germany. The sample of Turkish immigrants is large enough to allow a separate analysis. Within each group, we additionally differentiate between migrants who had lived in Germany for up to ten years and migrants who had lived in Germany for more than ten years (as of 1997). If the hypothesis of converging welfare attitudes is true, we can expect that migrants who had lived longer in Germany are (already) more similar to Germans than those who have recently arrived.⁷

Attitudes towards the government's responsibility for welfare have been surveyed in 1997 and 2002 with a battery of 11 items:

⁷ However, differences between these two groups could also be due to cohort differences. Therefore, the effect of the time of residence should be much more reliable if it is based on the observation of change over time within these groups as compared to an estimate that is based on a comparison between groups.

“At present a multitude of social services are provided not only by the state but also by private free-market enterprises, organizations, associations, or private citizens. What is your opinion on this? Who should be responsible for the following areas”?

All items could be answered on a five-point scale ranging from [1] “only the state” to [5] “only private forces”. We reversed all scales to measure a positive attitude towards state responsibility. The single items cover five different areas of welfare:

- Family and children: “financial security of families”, “caring for preschoolers”, “caring for school children”
- Unemployment/provision of jobs: “financial security in case of unemployment”, “job creation measures”
- Health care: “financial security in case of illness”, “care and help for the sick”
- Old-age: “financial security for old-age”, “care and help for the aged”
- General care: “financial security for persons needing care”, “care and help for persons needing care”

We performed confirmatory factor analysis (CFA) to summarize the 11 items into factor scores. Our analysis revealed three factors that underlie the 11 items: *(un-)employment*, *old-age/care/sickness*, and *family and children*. The three factors are first-order factors that underlie a second-order factor which we termed *general welfare*. Figure 3 shows the structure of our final measurement model (Table A2 in the appendix presents the parameters). To derive a well fitting model, it was necessary to include error correlations between all items that ask for “financial security” and two additional error correlations between care-related and sickness-related items (see Figure 3).

[Figure 3 about here]

We performed a variety of invariance tests to make sure that the latent factors can be compared across groups and years. Firstly, we fitted the model on the data from 1997 and tested for full scalar measurement invariance across the three groups West Germans, East Germans and migrants (CFI=.95, TLI=.95, RMSEA=.06, SRMR=.09). Secondly, we tested the model for full scalar measurement invariance between the three groups on the data from 2002 (CFI=.94, TLI=.94, RMSEA=.06, SRMR=.11). Although the model fit of these two multi-group CFAs is not perfect it can be considered a fairly good fit (Hu and Bentler, 1998: 449) and therefore suggests that we can compare levels of the latent variables between groups. Finally, we tested for measurement invariance across the two waves. Full scalar invariance did not hold and we therefore specified a model which allowed one item intercept to differ across years (care for school children). The intercept allowed to vary was chosen based on modification indices. This partial scalar invariance model has a reasonable fit (CFI=.98, TLI=.97, RMSEA=.05, SRMR=.04) and should still allow to compare the levels of the latent variable across time (Steenkamp and Baumgartner, 1998: 82). From this measurement model, we predicted the three first-order factors and the higher-order factor for use as the dependent variables in the following analyses. Table 1 shows the correlations between the higher-order factor *general welfare* and its three sub-dimensions (Table OA4 in the online appendix reports the correlations of the four factor scores and all 11 observed items on which the measurement model is based).

[Table 1 about here]

To get estimates of the native-migrant-differential net of any self-interested related effects, all self-interest-related variables associated with migrant status and welfare attitudes have to be controlled for. We control for the respondents' age class (<25, 26-35, 36-45, 46-55, 56-

65, 66-75, >75), gender, income (equivalized disposable household income; square root scale), education (ISCED categories 1-6 and a dummy for “still in education”), labour force status (employed, unemployed, retired, non-working), household type (one-person, couple without children, single parents, couple with children under 16, couple with children older than 16, couple with children younger and older than 16, multiple-generation household, other household type), satisfaction with health, self-assessed language proficiency⁸ and the cumulated experience of unemployment. The final data set has been obtained by listwise deletion. Tables OA5 and OA6 (online appendix) report correlations and summary statistics of all variables involved in the regression analyses.

Method

Our analysis has the purpose of estimating how differences between migrants and natives develop over time. To this end, we estimate the difference-in-differences (DID) (Wooldridge, 2002: 130) based on data from 1997 and 2002. The DID estimator is usually applied to cross-sectional data, where the estimates are often disturbed by sampling errors. In our analysis, we can be certain that the differences observed in 1997 can be compared with the differences observed in 2002 because at both points our sample consists of the same

⁸ Only migrants who have arrived after 1983 have been asked questions about their language proficiency. All native Germans and migrants that arrived before 1984 have been assigned to the category “very good”. We build an index from two items: spoken language proficiency and written language proficiency (Cronbach’s alpha = 0.93 [1997] and 0.93 [2001]). Questions about language proficiency were not asked in 2002 but in 2001. We substituted the values for 2002 from the 2001 data. For those migrants that have participated in 2002 but not in 2001, we imputed the values for language proficiency using an estimated language-learning function (37 cases). We regressed migrants’ language proficiency in 2002 on their proficiency in 1997 and used this estimate combined with the individual values of 1997 to impute language proficiency values for missing cases in 2002.

respondents.⁹ Since the DID estimator applied here is a cross-sectional model, we use cluster-adjusted standard errors to estimate valid test statistics.

The model has the following form:

$$\hat{y} = \beta_0 + \delta_0 d_{t=2002} + \beta_1 \delta_{migrant} + \delta_1 d_{t=2002} \cdot \delta_{migrant} + \beta X$$

where $d_{t=2002}$ is a dummy variable indicating the second measurement (2002=1, 1997=0) and $\delta_{migrant}$ is a dummy variable indicating whether the respondent is a migrant (migrant=1, native=0). The vector X includes all control variables. The coefficient β_1 gives the difference between migrants and natives in the first period (1997) and the coefficient δ_1 gives the difference-in-differences; i.e., the change in the differences between migrants and natives from 1997 to 2002. In practice, we do not have a dichotomous dummy variable ($\delta_{migrant}$) but a group of dummy variables because we compare four groups: West German natives; East German natives; migrants with up to ten years of residence; and migrants with more than ten years of residence.

Results

Derived from a full regression model of the general welfare factor, Table 2 presents predictive margins for each survey-year and all groups under investigation (see Table A3 in the appendix for the full regression model). Predictive margins are more intuitive compared to the standard regression tables because our model includes a variety of interaction terms which complicate the interpretation. The margins are predicted with all covariates at their mean and their differences can therefore be understood as the native-migrant-differentials

⁹ By applying the model to panel data and restricting our sample to those respondents observed in both years, the cross-sectional DID estimator is conceptually identical to the panel DID estimator (Wooldridge, 2002: 284).

net of any differences in socio-economic characteristics. The columns “Difference Natives West” provide the difference between the respective group and the reference group of West German natives. The columns “DID” provide the differences-in-differences estimators.

[Table 2 about here]

We have estimated one model in which we compare West Germans to all migrants and three additional models in which we compare West Germans to the three specific immigrant groups (Turks, immigrants from Mediterranean countries and immigrants from post-socialist countries). Thus, the models “Turks”, “Mediterranean” and “Post-socialist” are each based on a subsample of the full sample used in the model “All Migrants”. We expected that the results for the entire group of immigrants show higher demand for state-provided welfare compared to West German natives. Table 2 shows that the difference between West Germans and all recent immigrants—that is, immigrants who live in Germany for a maximum of 10 year—is .0458 in 1997 and .0370 in 2002. These differences are significant in both years. The differences in the differences (DID) is calculated as the difference between the values in 2002 and 1997 (.0370-.0458=-.00087). The DID is negative, which supports our general expectation of a convergence between natives and immigrants, but, in this case, it is not significant. For immigrants who live in Germany for more than 10 years, the difference to West German natives is .0373 in 1997 and .0097 in 2002. The DID (-.0276) is significant at the 1%-level, indicating a significant convergence between West German natives and these immigrants. The remaining difference in 2002 (.0097) is no longer significant. For East Germans we observe a similar pattern: A significant convergence with West German natives (-.0248***), although the remaining difference in 2002 is still significant in this case (.0616***).

For recent Turkish immigrants we observe a significant difference to West German natives in 1997 (.0687*) that turns into a non-significant difference in 2002 (.0237); however, the DID estimator (-.0450) is not significant in this case. For Turkish immigrants who reside in Germany for more than 10 years we find a significant difference in 1997 (.0523**) which turns into a non-significant difference in 2002. The convergence of attitudes towards state-provided welfare between these immigrants and West German natives is significant (-.0331*). The immigrants from the other Mediterranean countries show no significant difference to West German natives already in 1997. We cannot tell whether there have been initial differences which vanished before we observed these immigrants or whether there have not been any differences from the beginning; but we can state that these findings are not contradicting our hypothesis of a convergence in attitudes.

Finally, for recent immigrants from post-socialist countries we find a significant difference to West German natives in 1997 (.0467**) and in 2002 (.0481**). In contrast, for immigrants from post-socialist countries that live in Germany for more than 10 years, we find a significant convergence with natives from West Germany (-.0330*). The difference in 1997 was .0382 and significant at the 1%-level, while the difference in 2002 is only .0051 and no longer significantly different from zero.¹⁰

Summing up, our analysis has produced two main findings. First, although we do not observe that Eastern European immigrants display the largest differences to the German natives compared to other immigrant groups, we observe that immigrants in general are more in favour of state-distributed welfare benefits than the West German natives, as

¹⁰ We have performed the same analyses with the three sub-dimensions of our general welfare factor but we do not present these analyses in the paper. Interested readers can see the full regression tables (OA7, OA8, OA9) and the marginal effect tables (OA10, OA11, OA12) of the additional analyses in the online appendix.

expected. We found that recent Eastern European immigrants display significant differences from the West German natives in 1997 *and* in 2002, while the attitudes of recent Mediterranean and Turkish immigrants have converged with the attitudes of West German natives by 2002. This lends some support to the expectation that immigrants from countries whose welfare regime is most different from the one of Germany (i.e., universal) are also most different in their expectations. Second, when the longitudinal patterns are analyzed, which is the main aim of this paper, the overwhelming majority of the models show either that over time there are no differences between immigrants and natives at all or that differences decline. Even if the DID estimator is not significant in every model, we interpret these findings as strong evidence for the institutional hypothesis. We do not observe any indication of a cultural effect, which would imply lasting differences between natives and immigrants.¹¹

Although it is not a central part of this analysis, the pattern observed in the case of East Germans deserves discussion, as it may shed light on the patterns displayed by the immigrant groups. East Germans have been socialized under a universal welfare system and have been incorporated in the conservative welfare system after the unification of Germany in 1989. Thus, they experience a similar pattern of change of institutional context as Eastern European immigrants. The results show three interesting details. First, compared with West Germans, in all instances East Germans prefer more state intervention, confirming expectations that people socialized in universal welfare states expect more state-distributed

¹¹ A possible alternative explanation could be that migrants welfare attitudes are not formed by contact to institutions but simply by contact with Germans. To rule out this alternative explanation, we performed an additional robustness test in which we included contact with Germans as an additional control variable ("contact" is a dummy variable, being 1 if a respondent is German or if she is a migrant that has visited and got visits from Germans in the last year). This variable has no effect. The analysis is shown in Table OA13 in the online appendix.

welfare. Second, the difference between Eastern Germans and their western counterparts significantly diminishes between 1997 and 2002. These findings confirm the previous results by Alesina and Fuchs-Schündeln (2007). The convergence observed in this study between East and West Germans follows the same pattern observed in the case of the three immigrant groups, which we interpret as an indication of the socialization effect of welfare state institutions. East and West Germans share a cultural background, while they were exposed to different institutions. If we follow the logic of our research design, these differences lead us to conclude that the exposure to welfare institutions rather than the cultural background is the driver of welfare attitudes. Thus, the differences observed between East and West Germans are an additional indicator in favour of the institutional explanation which has been supported in the case of immigrants.

Third, the differences between East and West Germans are still significant in 2002. This finding differs from the pattern observed in the case of immigrants who, by 2002, show little to no differences compared to the Western Germans. We cannot offer an explanation for this pattern with SOEP data. Alesina and Fuchs-Schündeln (2007) argue that the effect of communism (due to indoctrination or increased dependency on state) is likely to last very long. They estimated that it would take between 20 and 40 years for Eastern Germans' and Western Germans' attitudes to fully converge. However, this explanation is likely to be weakened by the evidence from Eastern European immigrants, especially those residing for more than 10 years. We would like to propose another explanation and set the task for future studies to test it. This explanation rests on the observation that unlike immigrants, East Germans have not moved from one country to another. Immigrants' moving from one country to another is accompanied by a double pressure to adapt to the social and cultural

environment of their host countries. On the one hand, immigrants are motivated to adapt especially if they perceive adaptation as increasing their chances in the host country (Berry, 1997). Indeed, it has been shown that such an acculturation process takes place in particular with respect to work and economic and social integration (Navas et al., 2007). On the other hand, immigrants are expected to adopt social and cultural values of the host society. Arguably, part of these values is transmitted through civic integration as well as language and culture classes that immigrants are expected to take (Joppke, 2007). Thus, this double pressure creates mechanisms through which institutions lead to preference changes and thus might explain the disappearance of differences even in the case of recently arrived immigrants. The absence of similar pressures in the case of Eastern Germans might explain the resilience of different preferences.

Discussion and conclusion

This study tested implications derived from cultural and institutional approaches to welfare preference formation. Given the differences between countries with respect to their citizens' expectations with respect to welfare, the cultural approach sees immigrants' welfare preferences as stable over time and likely to remain different than those of natives. The institutional approach, on the contrary, sees preferences as malleable and shaped by contact with institutions. Thus it predicts that over time, immigrants' welfare preferences become similar to those of natives.

Our analysis produced two main results. First, it showed that different immigrant groups have different welfare preferences. This does not come as a surprise and is anticipated by both cultural and institutional theories. Second, it showed that over time,

regardless of the country of origin, immigrants' preferences become similar to those of native West Germans.

Our findings speak to the culture-institutions debate in formation of welfare preferences. Studying individuals who move across institutional contexts opens the opportunity to observe whether they maintain preferences associated to the home countries or adopt their preferences to the new contexts. We observe differences between immigrants' and natives' preferences, which indicate that immigrants travel with certain expectations about the role of the state, expectations which may be the reflection of their original welfare culture. But over time, these differences disappear. We interpret the observed convergence of natives' and immigrants' preferences as a strong indication in favour of institutional arguments.

Our findings also speak to the literature concerned with the future of European welfare states. The debate has been heated by the publication of Alesina and Glaeser's (2004) work, which famously linked the increased ethnic heterogeneity of European countries to the unavoidable contraction of their welfare states. In a recent article, Luttmer and Singhal (2011) have shown that the preferences of immigrants are different from those of natives and are likely to remain different. The authors argued that this difference is due to the fact that preferences are rooted in the culture of countries of origin and is likely to affect the future welfare policy of host countries. Our findings, indicating that the preferences of natives and immigrants converge over time, speak against the warnings that ongoing immigration erodes a country's populations' consensus on welfare. Converging welfare preferences of natives and immigrants coupled with immigrants' increasing enfranchisement

at local and national levels might in fact lead to support for the current forms of welfare states.

References

- Alesina A and Ferrara EL (2005) Preferences for redistribution in the land of opportunities. *Journal of Public Economics* 89(5): 897-931.
- Alesina A and Fuchs-Schündeln N (2007) Good-bye Lenin (or not?): The effect of Communism on people's preferences. *American Economic Review* 97: 1507-1528.
- Alesina A and Giuliano P (2013) Culture and Institutions. *NBER Working Paper Series* No. w19750. Cambridge: National Bureau of Economic Research.
- Alesina A, Glaeser E and Sacerdote B (2001) Why doesn't the United States have a European-style welfare state? *Brookings Papers on Economic Activity* Fall 2001: 187-277.
- Alesina A and Glaeser EL (2004) *Fighting poverty in the US and Europe: A world of difference*. Oxford: Oxford University Press.
- Andreß HJ and Heien T (2001) Four worlds of welfare state attitudes? A comparison of Germany, Norway and the United States. *European Sociological Review* 17(4): 337-356.
- Arts W and Gelissen J (2001) Welfare states, solidarity and justice principles: Does the type really matter? *Acta Sociologica* 44(4): 283-299.
- Arts WA and Gelissen J (2002) Three worlds of welfare capitalism or more? A state-of-the-art report. *Journal of European Social Policy* 12(2): 137-158.
- Barrett A and McCarthy Y (2008) Immigrants and welfare programmes: Exploring the interactions between immigrant characteristics, immigrant welfare dependence, and welfare policy. *Oxford Review of Economic Policy* 24(3): 542-559.

Barry N (1999) *Welfare*. Minneapolis: University of Minnesota Press.

Berigan N and Irwin K (2011) Culture, cooperation, and the general welfare. *Social Psychology Quarterly* 74(4): 341-360.

Berry J (1997) Immigration, acculturation, and adaptation. *Applied Psychology: An International Review* 46(1): 5-68.

Boeri T, Hanson GH and McCormick B (2002) *Immigration Policy and the Welfare System: A Report for the Fondazione Rodolfo De Benedetti*. Oxford: Oxford University Press.

Bonin H, Constant A, Tatsiramos K and Zimmermann KF (2009) Native-migrant differences in risk attitudes. *Applied Economics Letters* 16(15): 1581-1586.

Borjas GJ (1999) Immigration and welfare magnets. *Journal of Labor Economics* 17(4): 607-637.

Brady D and Finnigan R (2014) Does immigration undermine public support for social policy? *American Sociological Review* 79(1): 17-42.

Breznau N (2013) *The Relationship of Public Opinion and Social Welfare Spending in Advanced Democracies*. University of Bremen.

Brooks C and Manza J (2006) Why do welfare states persist? *The Journal of Politics* 68(4): 816-827.

Brueckner JK (2000) Welfare reform and the race to the bottom: Theory and evidence. *Southern Economic Journal* 66(3): 505-525.

- Castronova EJ, Kayser H, Frick JR and Wagner GG (2001) Immigrants, natives and social assistance: Comparable take-up under comparable circumstances. *International Migration Review* 35(3): 726–748.
- Careja R, Emmenegger P and Kvist J (2015) *An American Dilemma in Europe? Welfare reform and immigration*. Forthcoming in Kettunen P, Michel S and Petersen K (eds) *Race, Ethnicity, and Welfare States: An American Dilemma?* Edwards Elgar.
- Chiswick BR (1999) Are immigrants favorably self-selected? *American Economic Review* 89(2): 181-185.
- Clasen J and Van Oorschot W (2002) Changing principles in European social security. *European Journal of Social Security* 4(2): 89-115.
- Crepaz M (2006) “If you are my brother, I may give you a dime!” Public opinion on multiculturalism, trust, and the welfare state. In: Banting K and Kymlicka W (eds) *From Multiculturalism and the Welfare State: Recognition and Redistribution in Contemporary Democracies*. Oxford: Oxford University Press.
- Dancygier R and Saunders EN (2006) A new electorate? Comparing preferences and partisanship between immigrants and natives. *American Journal of Political Science* 50(4): 962-981.
- DeStatis (2014). 8.2 million foreigners in Germany at the end of 2014. Available online at <https://www.destatis.de/EN/FactsFigures/SocietyState/Population/MigrationIntegration/ForeignPopulation/Current.html>

- Dinesen PT (2013) Where you come from or where you live? Examining the cultural and institutional explanation of generalized trust using migration as a natural experiment. *European Sociological Review* 29(1): 114-128.
- ECAS (2014) *Fiscal impact of EU migrants in Austria, Germany, the Netherlands and the UK*. European Citizen Action Service. Brussels.
- Ehrmann M and Tzamourani P (2012) Memories of high inflation. *European Journal of Political Economy* 28(2): 174–191.
- Emmenegger P and Careja R (2012) From dilemma to dualisation: Social and migration policies in the reluctant countries of immigration. In Emmenegger P, Häusermann S, Palier B and Seeleib-Kaiser M (eds) *The Age of Dualization: Structures, Policies, Politics, and Divided Outcomes*. Oxford: Oxford University Press.
- Esping-Andersen G (1990) *The three worlds of welfare capitalism*. Cambridge, UK: Polity Press.
- ESS Round 4: European Social Survey Round 4 Data (2008). Data file edition 4.0. Norwegian Social Science Data Services, Norway – Data Archive and distributor of ESS data.
- Gal J (2010) Is there an extended family of Mediterranean welfare states? *Journal of European Social Policy* 20(4): 283-300.
- Gilens M (1999) *Why Americans Hate Welfare: Race, Media, and the Politics of Antipoverty Policy*. Chicago: University of Chicago Press.

- Grütjen D (2008) The Turkish welfare regime: An example of the Southern European model? The role of the state, market and family in welfare provision. *Turkish Policy Quarterly* 7(1): 111-129.
- Giuliano P and Spilimbergo A (2009) *Growing up in a recession: Beliefs and the macroeconomy*. Working Paper 15321, National Bureau of Economic Research.
- Guiso L, Sapienza P and Zingales L (2006) Does culture affect economic outcomes? *Journal of Economic Perspectives* 20(2): 23-48.
- Heath AF, Rothon C and Kilpi E (2008) The second generation in Western Europe: Education, unemployment, and occupational attainment. *Annual Review of Sociology* 34: 211-235.
- Heitmueller A (2005) Unemployment benefits, risk aversion and migration incentives. *Journal of Population Economics* 18(1): 93-112.
- Hofstede GH (2001) *Culture's consequences: Comparing values, behaviors, institutions, and organizations across nations*. Thousand Oaks, California: Sage Publications.
- Homans, GC (1974). *Social behavior; its elementary forms*. New York: Harcourt, Brace.
- Hu L and Bentler PM (1998) Fit indices in covariance structure modeling: Sensitivity to underparameterized model misspecification. *Psychological Methods* 3(4): 424-453.
- Joppke C (2007) Transformation of immigrant integration: Civic integration and antidiscrimination in the Netherlands, France, and Germany. *World Politics* 59(2): 243-273.

- Karidis S and Quinn MA (2006) Fiscal harmonization and migration in the European Union. *Brussels Economic Review - Cahiers Economiques de Bruxelles* 49(4):333-352.
- Kluegel JR and Smith ER (1986) *Beliefs About Inequality: Americans' Views of What Is and What Ought to Be*. New York: A. de Gruyter.
- Kurekova L (2013) Welfare systems as emigration factor: Evidence from the new accession states. *Journal of Common Market Studies* 51(4): 721–739.
- Larsen CA (2006) *The Institutional Logic of Welfare State Attitudes: How Welfare Regimes Influence Public Support* Hampshire, Burlington: Ashgate Publishing.
- Larsen CA (2008) The institutional logic of welfare attitudes: How welfare regimes influence public support. *Comparative Political Studies* 41(2): 145-186.
- Luttmer EFP and Singhal M (2011) Culture, context, and the taste for redistribution. *American Economic Journal-Economic Policy* 3(1): 157-179.
- Mau S (2004) Welfare regimes and the norms of social exchange. *Current Sociology* 52(1): 53-74.
- Malmendier U and Nagel S (2011) Depression Babies: Do Macroeconomic Experiences Affect Risk Taking? *Quarterly Journal of Economics* 126(1): 373–416.
- Morissens A and Sainsbury D (2005) Migrants' social rights, ethnicity and welfare regimes. *Journal of Social Policy* 34(4): 356-380.

Muenz R and Fassmann H (2004) *Migrants in Europe and Their Economic Position: Evidence from the European Labour Force Survey and from Other Sources*. EC, DG Employment and Social Affairs. Hamburg: HWWA.

Navas M, Rojas AJ, Garcia M and Pumares P (2007) Acculturation strategies and attitudes according to the Relative Acculturation Extended Model (RAEM): The perspectives of natives versus immigrants. *International Journal of Intercultural Relations* 31(1): 67-86.

Neundorf A and Soroka S (unpublished manuscript). The origins of redistributive policy preferences: Disentangling the effect of past and present economic conditions. Available online at http://aneundorf.net/AnjaNeundorf/Publications_files/NeundorfSoroko_The%20origins%20of%20redistributive%20policy%20preferences_Nov7.pdf.

Pinch S (1997) *World of Welfare*. New York: Routledge.

Reeskens T and Van Oorschot W (2015) Immigrants' Attitudes towards Welfare Redistribution. An Exploration of Role of Government Preferences among Immigrants and Natives across 18 European Welfare States. *European Sociological Review*. Epub ahead of print 6 February 2015. DOI: 10.1093/esr/jcv003.

Riphahn RT (2004) *Immigrant Participation in Social Assistance Programs: Evidence from German Guestworkers*. Available online at <http://www.lsw.wiso.uni-erlangen.de/userfiles/team/riphahn/immigrant%20participation.pdf>

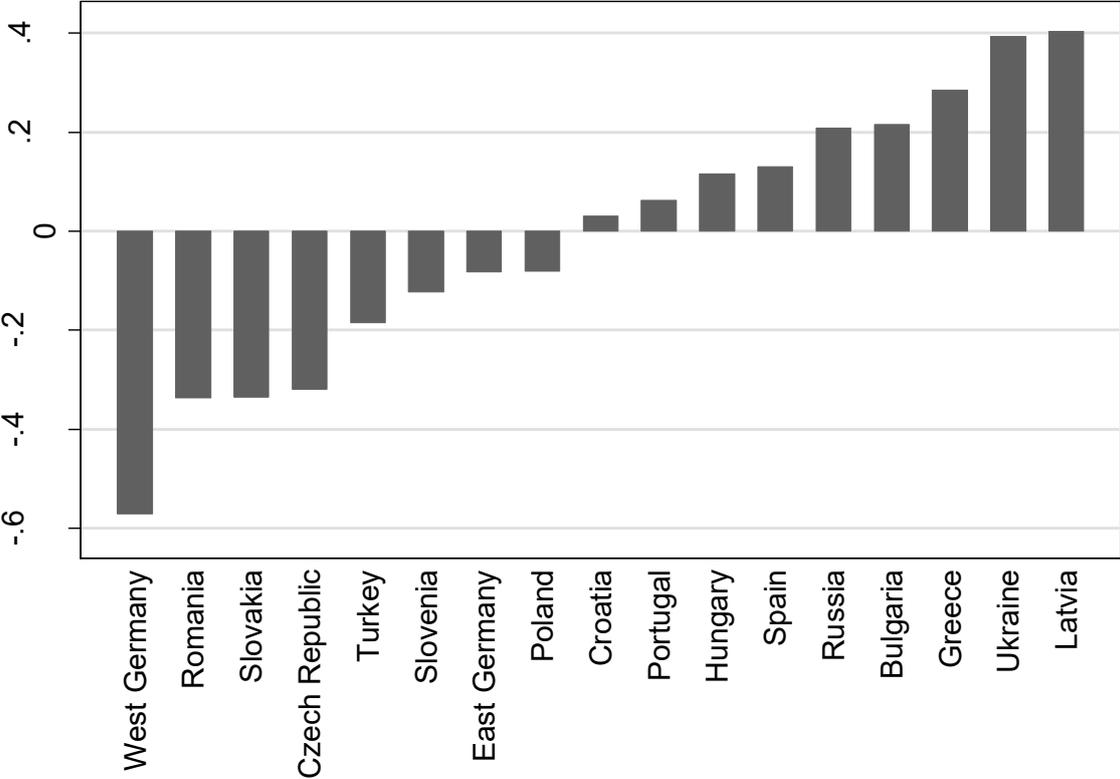
- Riphahn RT, Sander M and Wunder C (2013) The welfare use of immigrants and natives in Germany: The case of Turkish immigrants. *International Journal of Manpower* 34(1): 70-82.
- Roosma F, Gelissen J and van Oorschot W (2013) The multidimensionality of welfare state attitudes: A European cross-national study. *Social Indicators Research* 113(1): 235-255.
- Rothstein B (1998) *Just Institutions Matter: The Moral and Political Logic of the Universal Welfare State*. Cambridge: Cambridge University Press.
- Sabbagh C and Vanhuysse P (2006) Exploring attitudes towards the welfare state: Students' views in eight democracies. *Journal of Social Policy* 35(4): 607-626.
- Şahin Ş (2008) *Transformation of the Turkish welfare regime: The role of the individual pension system and its effect on women's welfare*. Middle East Technical University.
- Schmidt AW and Spies DC (2014) Do parties “playing the race card” undermine natives’ support for redistribution? Evidence from Europe. *Comparative Political Studies* 47(4): 519-549.
- Schmidt-Catran AW and Spies DC (forthcoming) Immigration and Welfare Support in Germany. *American Sociological Review*.
- Socio-economic Panel (SOEP, 2011) Data for years 1984 - 2010, doi: 10.5684/soep.v27.
- Steenkamp J and Baumgartner H (1998) Assessing measurement invariance in cross-national consumer research. *Journal of Consumer Research* 25(1): 78-90.

Van Oorschot W (2006) Making the difference in social Europe: Deservingness perceptions among citizens of European welfare states. *Journal of European Social Policy* 16(1): 23-42.

Wooldridge JM (2002) *Econometric Analysis of Cross Section and Panel Data*. Cambridge, Mass.: MIT Press.

Tables and Figures

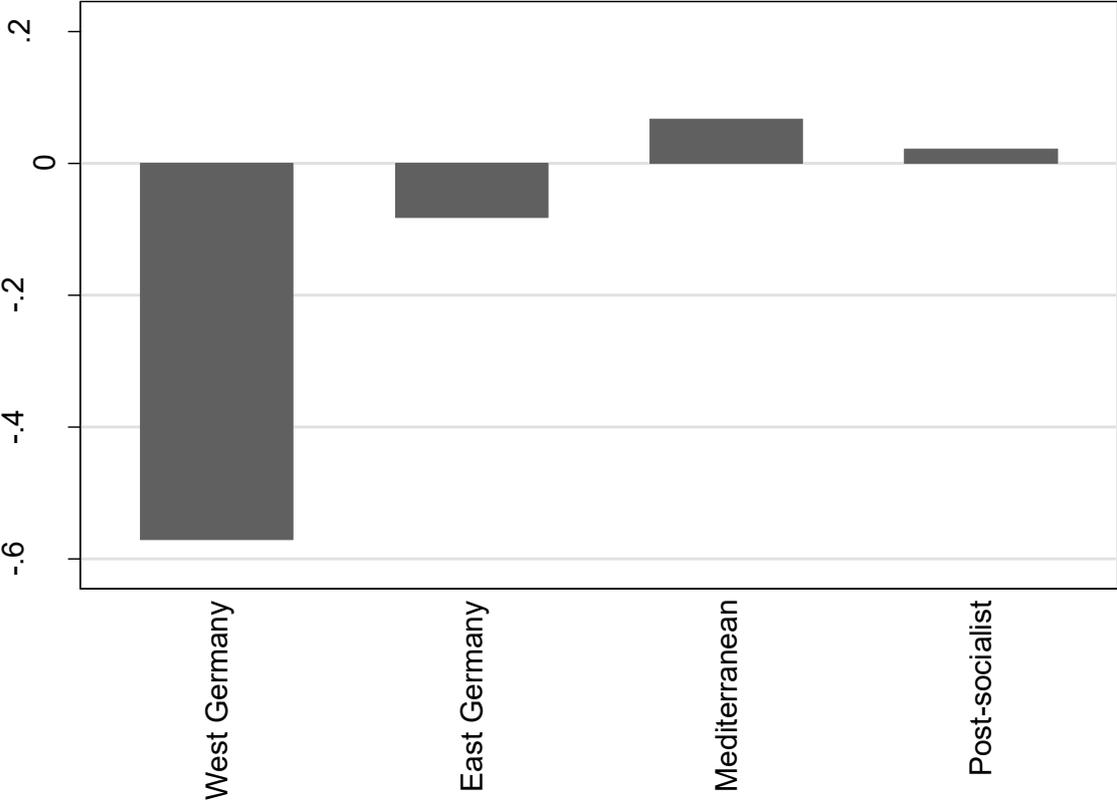
Figure 1: Support for state-provided welfare by origin countries



Notes: General Welfare is a factor score derived from six items from the ESS 2008. See endnote 4 for details.

Source: ESS 2008.

Figure 2: Support for state-provided welfare by welfare regimes



Notes: General Welfare is a factor score derived from six items from the ESS 2008. See endnote 4 for details. Mediterranean = Greece, Portugal, Spain, Turkey; Post-socialist = Bulgaria, Czech Republic, Estonia, Croatia, Hungary, Latvia, Poland, Romania, Russia, Slovenia, Slovakia, Ukraine. Source: ESS 2008.

Figure 3: A second-order measurement model of welfare attitudes

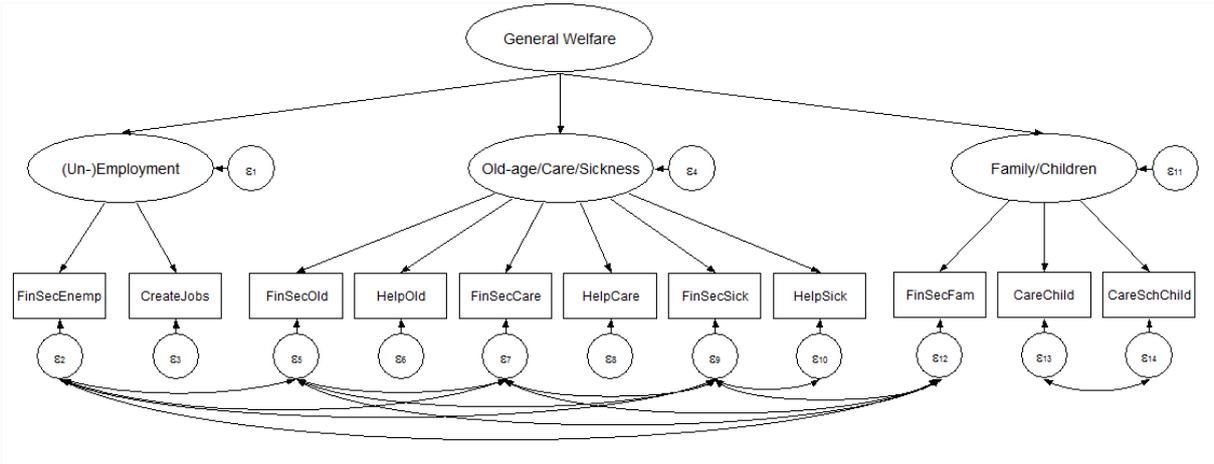


Table 1: Correlation matrix of predicted factors from measurement model of welfare attitudes

	1	2	3	4
1 General welfare (2nd order)	1.000			
2 (Un-)employment (1st order)	0.891	1.000		
3 Old-age, care and sickness (1st order)	0.950	0.758	1.000	
4 Family and children (1st order)	0.859	0.716	0.718	1.000

Source: GSOEP.

Table 2: Native-migrant-differentials in support for general state-provided welfare by year

	Natives West	Migrants (<10years)			Migrants (>10 years)			Natives East		
	Predictive Margins	Predictive Margins	Difference Native West	DID	Predictive Margins	Difference Native West	DID	Predictive Margins	Difference Native West	DID
All Migrants										
1997	-0.0344	0.0114	0.0458 **		0.0029	0.0373 ***		0.0520	0.0864 ***	
2002	-0.0191	0.0179	0.0370 **	-0.0087	-0.0094	0.0097	-0.0276 **	0.0425	0.0616 ***	-0.0248 ***
n	4065	382			820			2638		
Turks										
1997	-0.0365	0.0321	0.0687 *		0.0157	0.0523 **		0.0505	0.0870 ***	
2002	-0.0215	0.0022	0.0237	-0.0450	-0.0023	0.0191	-0.0331 *	0.0408	0.0622 ***	-0.0248 ***
n	4065	67			307			2638		
Mediterranean										
1997	-0.0360	0.0526	0.0887		-0.0315	0.0046		0.0514	0.0874 ***	
2002	-0.0206	0.0278	0.0484	-0.0402	-0.0276	-0.0070	-0.0116	0.0420	0.0626 ***	-0.0248 ***
n	4065	20			242			2638		
Post-socialist										
1997	-0.0369	0.0098	0.0467 **		0.0012	0.0382 **		0.0496	0.0865 ***	
2002	-0.0216	0.0265	0.0481 **	0.0014	-0.0165	0.0051	-0.0330 *	0.0398	0.0615 ***	-0.0251 ***
n	4065	295			271			2638		

Notes: * p<.05, ** p<.01, *** p<.001 (one-sided tests). Margins predicted with all covariates at their mean.

Source: Margins predicted from regression models in Table A3.

Appendix

Table A1: Observations by country of origin

Regime/Country	n
East Germany	2638
West Germany	4065
Post-socialist	
Albania	4
Bosnia-Herzegovina	3
Croatia	5
Czech Republic	8
Eastern Europe without particular country	45
Ex-Yugoslavia	169
Georgia	1
Hungary	4
Kazakhstan	61
Kyrgyzstan	2
Latvia	1
Macedonia	1
Poland	132
Romania	50
Russia	60
Serbia	1
Tajikistan	7
Ukraine	11
Mediterranean	
Greece	82
Italy	140
Portugal	4
Spain	36
Turkey	374
Sum	7904

Notes: N at the person-level. The number of single occasions is n·2.

Source: GSOEP.

Table A2: A second-order measurement model of welfare attitudes

Factor / Item	Loading	Intercept
General welfare (second-order factor)		
(Un-)employment	1	
Old-age, care and sickness	0.98 ***	
Family and children	0.94 ***	
(Un-)employment (first-order factor)		
Financial security if unemployed	1	3.93 ***
Job creation measures	1.26 ***	3.46 ***
Old-age, care and sickness (first-order factor)		
Financial security of sick	1	3.48 ***
Help for sick	1.68 ***	3.32 ***
Financial security for those needing care	1.49 ***	3.55 ***
Help for those needing care	1.86 ***	3.30 ***
Financial security for old-age	1.26 ***	3.48 ***
Help for old-age	1.99 ***	3.29 ***
Family and Children (first order factor)		
Financial security for families	1	3.35 ***
Caring for pre-schoolers	1.38 ***	3.37 ***
Caring for school children	1.17 ***	1997: 3.62 *** 2002: 3.13 ***

Notes: *** p<.001.

Source: GSOEP.

Table A3: Differences-in-differences estimator - general welfare factor

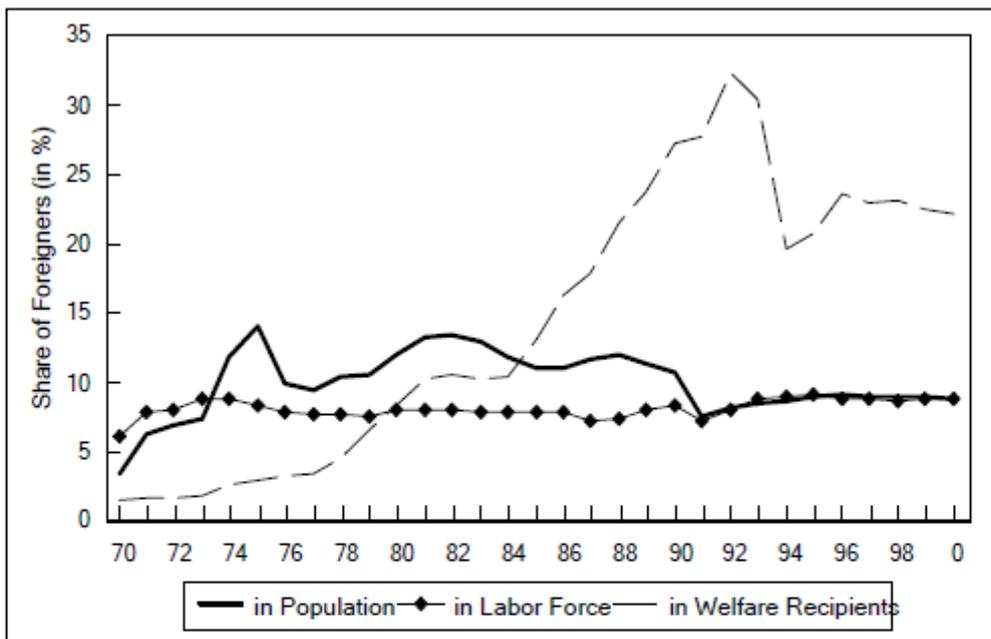
	General Welfare Factor			
	All migrants	Turks	Mediterranean	Post-socialist
Year=2002 (Ref.=1997)	0.0153 ***	0.0151 ***	0.0154 ***	0.0153 ***
<i>Group (Ref.=Natives West)</i>				
Recent Migrants (≤10 years)	0.0458 **	0.0687 *	0.0887	0.0467 **
Non-recent Migrants (>10 years)	0.0373 ***	0.0523 **	0.0046	0.0382 **
Natives East	0.0864 ***	0.0870 ***	0.0874 ***	0.0865 ***
<i>Year X Group</i>				
2002 X Recent Migrants	-0.0087	-0.0450	-0.0402	0.0014
2002 X Non-recent Migrants	-0.0276 **	-0.0331 *	-0.0116	-0.0330 *
2002 X Natives East	-0.0248 ***	-0.0248 ***	-0.0248 ***	-0.0251 ***
Female (Ref.=Male)	-0.0041	-0.0055	-0.0038	-0.0039
<i>Age (Ref.≤25)</i>				
26-35	0.0106	0.0097	0.0141	0.0156 *
36-45	0.0168 *	0.0197 *	0.0216 **	0.0212 **
46-55	0.0130	0.0147	0.0180 *	0.0191 *
56-65	0.0230 **	0.0224 **	0.0285 **	0.0305 ***
66-75	-0.0045	-0.0043	-0.0025	-0.0009
76-max	-0.0111	-0.0145	-0.0124	-0.0087
<i>Empl. Status (Ref.=Non-working)</i>				
Unemployed	0.0070	0.0057	0.0040	0.0032
Working	-0.0070	-0.0105 *	-0.0102 *	-0.0088
Retired	0.0227	0.0207	0.0220	0.0251
<i>Education (Ref.=Still in School)</i>				
Inadequately	0.0243	0.0503 *	0.0518 *	0.0408
General Elementary	0.0197	0.0174	0.0175	0.0173
Middle Vocational	0.0019	0.0002	-0.0042	-0.0007
Vocational plus Abitur	-0.0386 *	-0.0381 *	-0.0449 *	-0.0427 *
Higher Vocational	-0.0227	-0.0246	-0.0295	-0.0276
Higher Education	-0.0370 *	-0.0423 *	-0.0451 *	-0.0397 *
Equiv. HH-income (in 1,000€)	-0.0188 ***	-0.0176 ***	-0.0189 ***	-0.0201 ***
<i>HH-type (Ref.=1-Person HH)</i>				
Couple without Children	-0.0028	-0.0038	-0.0036	-0.0021
Single Parent	0.0011	0.0040	0.0034	0.0024
Couple with Children ≤ 16	0.0092	0.0066	0.0105	0.0099
Couple with Children > 16	-0.0035	-0.0039	-0.0031	-0.0010
Couple with Children ≤ 16 and > 16	0.0012	0.0010	0.0021	0.0035
Multiple Generation HH	-0.0074	-0.0222 *	-0.0189	-0.0103
Other Combination	-0.0029	-0.0150	-0.0157	-0.0049
Satisfaction with Health	-0.0051 ***	-0.0050 ***	-0.0048 ***	-0.0050 ***
Cumulated Unempl. Experience	0.0038 **	0.0036 **	0.0034 *	0.0038 **
Language Proficiency	0.0021	-0.0064	0.0128	-0.0031
Constant	0.0140	0.0265	0.0055	0.0179
<i>Statistics</i>				
N	15810	14154	13930	14538
R2	0.047	0.051	0.053	0.051

Notes: * p<.05, ** p <.01, *** p<.001 (one-sided tests). The model "All Migrants" is based on the full sample of natives and migrants (compare Table A1). The models "Turks", "Mediterranean" and "Post-socialist" are each based on a sub-sample that excludes the other migrant groups.

Source: GSOEP.

Online Appendix

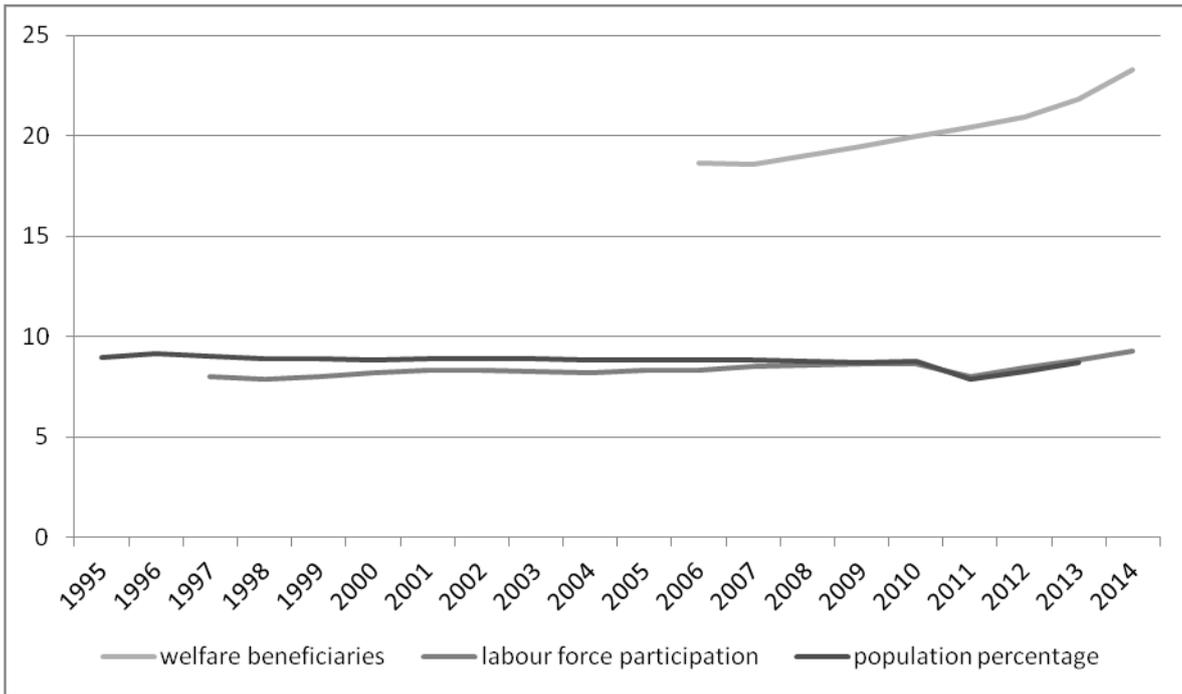
Figure OA1: Share of immigrants in the population, labour force and welfare recipients (Source Riphahn 2004)



Source: Population: Statistisches Bundesamt, Fachserie 1 Reihe 2, various years,
Labor Force: Statistisches Bundesamt, Fachserie 1, Reihe 4.1.1, various years,
Welfare Recipients: Statistisches Bundesamt, Fachserie 13, Reihe 2, various years.

Source: Riphahn (2004) *Immigrant Participation in Social Assistance Programs: Evidence from German Guestworkers*. Available online at <http://www.lsw.wiso.uni-erlangen.de/userfiles/team/riphahn/immigrant%20participation.pdf>

Figure OA2: Share of immigrants in the population, labour force and welfare recipients (own calculations)



Source: own calculations, data from Bundesagentur für Arbeit and DeStatis.

Table OA1: Benefits received by EU migrants in Germany (as a percent of total benefits)

Type of benefit	2007	2008	2009	2010	2011	2012	2013
Sickness and health benefit	2.2%	2.3%	2.3%	2.3%	2.4%	2.6%	2.8%
Disability	2.2%	2.3%	2.3%	2.3%	2.4%	2.6%	2.8%
Old age	0.7%	0.7%	0.8%	0.8%	0.8%	0.9%	1.0%
Survivors	0.7%	0.7%	0.8%	0.8%	0.8%	0.9%	1.0%
Family/Children	1.9%	0.6%	1.9%	2.2%	1.9%	1.9%	2.3%
Unemployment	4.2%	4.4%	4.6%	4.8%	5.0%	5.3%	5.4%
Housing	3.2%	4.2%	3.5%	4.6%	3.1%	2.8%	4.1%
Social exclusion	3.2%	4.2%	3.5%	4.6%	3.1%	2.8%	4.1%
Total	1.5%	1.4%	1.6%	1.7%	1.7%	1.7%	1.9%
Total benefits excl. old-age and survivors' benefits	2.1%	2.0%	2.2%	2.4%	2.2%	2.3%	2.6%

Source: ECAS 2014 , p. 46.

Table OA2: Fiscal contribution of EU migrants in Germany

Type of tax	2007	2008	2009	2010	2011	2012	2013
In EUR million							
Direct	26165	27063	26726	26087	29541	31757	33808
Indirect	4490	4992	4698	4581	5297	5811	6334
Total	30654	32054	31424	30668	34838	37568	40142
As a percent of GDP							
Direct	1.1%	1.1%	1.1%	1.0%	1.1%	1.2%	1.2%
Indirect	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%
Total	1.3%	1.3%	1.3%	1.2%	1.3%	1.4%	1.5%
As a percent of total government revenue							
Direct	2.5%	2.5%	2.3%	2.2%	2.5%	2.7%	2.8%
Indirect	0.4%	0.5%	0.4%	0.4%	0.4%	0.5%	0.5%
Total	2.9%	2.9%	2.7%	2.6%	3.0%	3.2%	3.3%

Source: ECAS 2014, p66.

Table OA3: Comparison between Turkish, Mediterranean, Conservative, Liberal and Social-Democratic welfare systems

Criterion	Turkey	Souther European countries	Conservative (DE) / Liberal (UK) / Social-democratic (SE)
Polarisation and generosity			
Pension Gini coefficient (higher values indicate inequality)	25.1	Greece 26.5 Italy 26.4 Portugal 22.1 Spain 22.1	Germany 20 Sweden 23.7 UK 5.1 OECD average 17.2
Progressivity index (higher values - higher dependency on pre-retirement earnings)	7.8	similar values to Sweden	Germany 26.7 Sweden 12.9 UK 81.1 OECD average 37.5
health system - public coverage	66% recent reforms in the direction of Southern European countries	100%	Germany 90% Sweden 100% UK 100%
State penetration & social assistance			
social protection expenditure % GDP	overall 11.6%, of which 5.5% old-age coverage 4.8% health expenditures	Greece 21.3% Italy 24.2% Portugal 23.5% Spain 20.5%	Germany 27.6% Sweden 31.3% UK 20.15 OECD average 20.7%
poverty alleviation effectiveness % of population at risk of poverty before and after social assistance distribution	before 31%, after 26%	Greece: before 23% after 20% Italy: before 24% after 19% Portugal: before 26% after 20% Spain: before 24% after 20%	Germany: before 24% after 13% Sweden: before 29% after 9% UK: before 31% after 18%
Public-private mix	limited, no legal basis for decentralization at municipal level, welfare distribution at municipal level by charities	high level of public-private mix	Germany: high level of public-private mix Sweden: public provision UK: market/private dominated (charities)
Model	family and kin solidarity	family and kin solidarity	Germany: male breadwinner Sweden: dual breadwinner UK: dual breadwinner
Family support			
Family benefits % GDP	less than 0.5%	Greece <0.5% Italy, Portugal, Spain 0.5%-1%	Germany 1.2% Sweden 1.6% UK 2.2%
Paid parental leave	no	Spain no Portugal no Greece no Portugal 24 weeks	Germany: 104 weeks at 11% allowance Sweden: 51 weeks at 80% allowance
Unpaid parental leave	no	Greece 28 weeks Italy 24 weeks Spain 156 weeks	UK 26 weeks

Source: Author's summary of arguments presented by Grütjen, Daniel (2008): The Turkish welfare regime: An example of the Southern European model? The role of the state, market and family in welfare provision, *Turkish Policy Quarterly* 7(1):111-129.

Table OA4: Correlation matrix of predicted factors and observed items

	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
Factors															
1	1.000														
2	0.891	1.000													
3	0.950	0.758	1.000												
4	0.859	0.716	0.718	1.000											
Observed Items															
5	0.443	0.674	0.290	0.330	1.000										
6	0.504	0.743	0.346	0.371	0.341	1.000									
7	0.452	0.429	0.435	0.345	0.454	0.323	1.000								
8	0.762	0.610	0.797	0.583	0.239	0.265	0.416	1.000							
9	0.629	0.510	0.665	0.461	0.378	0.247	0.468	0.460	1.000						
10	0.791	0.614	0.856	0.571	0.205	0.245	0.325	0.583	0.621	1.000					
11	0.509	0.443	0.516	0.383	0.431	0.271	0.540	0.381	0.535	0.363	1.000				
12	0.862	0.663	0.933	0.629	0.211	0.259	0.323	0.645	0.541	0.706	0.409	1.000			
13	0.409	0.362	0.262	0.623	0.368	0.231	0.382	0.225	0.287	0.162	0.408	0.198	1.000		
14	0.516	0.396	0.357	0.800	0.149	0.148	0.170	0.284	0.206	0.258	0.180	0.277	0.289	1.000	
15	0.425	0.320	0.303	0.652	0.136	0.103	0.143	0.238	0.199	0.218	0.178	0.236	0.231	0.669	1.000

Source: GSOEP.

Table OA5: Correlation matrix of predicted factor and covariates

	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20
1 General welfare factor	1.00																			
2 (Un-)employment factor	0.89	1.00																		
3 Old-age, care and sickness factor	0.95	0.76	1.00																	
4 Family and children factor	0.86	0.72	0.72	1.00																
5 Year=2002 (Ref.=1997)	0.01	0.01	0.02	-0.01	1.00															
6 Natives West	-0.15	-0.17	-0.11	-0.16	0.00	1.00														
7 Recent Migrants (≤10 years)	0.02	0.02	0.02	0.01	0.00	-0.23	1.00													
8 Non-recent Migrants (>10 years)	0.03	0.01	0.04	0.01	-0.01	-0.35	-0.08	1.00												
9 Natives East	0.13	0.16	0.08	0.16	0.01	-0.72	-0.16	-0.24	1.00											
10 Female (Ref.=Male)	0.01	0.04	-0.01	-0.01	0.00	0.01	0.01	-0.03	0.01	1.00										
11 Age ≤25	-0.01	0.00	-0.02	-0.01	-0.11	-0.04	0.05	-0.06	0.06	0.01	1.00									
12 Age 26-35	-0.03	-0.03	-0.03	-0.02	-0.08	0.01	0.07	-0.01	-0.04	-0.01	-0.15	1.00								
13 Age 36-45	0.00	-0.01	0.00	0.01	0.04	0.00	0.01	-0.03	0.01	-0.01	-0.16	-0.28	1.00							
14 Age 46-55	-0.01	-0.01	-0.01	-0.02	0.03	-0.03	-0.04	0.07	0.00	-0.01	-0.13	-0.24	-0.26	1.00						
15 Age56-65	0.04	0.04	0.04	0.03	0.02	-0.02	-0.04	0.04	0.02	-0.02	-0.13	-0.23	-0.25	-0.21	1.00					
16 Age 66-75	0.02	0.02	0.01	0.01	0.05	0.05	-0.04	-0.02	-0.02	0.01	-0.10	-0.17	-0.18	-0.15	-0.15	1.00				
17 Age 76-max	0.00	0.01	0.01	-0.01	0.08	0.06	-0.03	-0.04	-0.03	0.05	-0.06	-0.11	-0.11	-0.10	-0.09	-0.07	1.00			
18 Non-working	0.03	0.04	0.02	0.02	-0.02	0.00	0.03	0.03	-0.04	0.18	0.12	-0.04	-0.12	-0.08	0.34	-0.14	-0.10	1.00		
19 Unemployed	0.06	0.07	0.05	0.06	-0.04	-0.13	0.04	0.04	0.09	-0.02	-0.01	-0.01	0.00	0.03	0.08	-0.09	-0.05	-0.14	1.00	
20 Working	-0.07	-0.08	-0.05	-0.05	-0.02	0.02	-0.01	-0.02	0.00	-0.17	-0.02	0.17	0.25	0.18	-0.21	-0.37	-0.25	-0.62	-0.31	1.00
21 Retired	0.02	0.02	0.02	0.01	0.09	0.07	-0.05	-0.03	-0.03	0.05	-0.11	-0.20	-0.22	-0.18	-0.16	0.77	0.52	-0.21	-0.10	-0.46
22 Still in School	0.00	0.00	-0.01	0.00	-0.09	-0.01	0.00	-0.03	0.03	0.00	0.33	-0.05	-0.05	-0.04	-0.04	-0.03	-0.02	0.17	-0.03	-0.11
23 Inadequately	0.03	0.02	0.03	0.02	-0.04	-0.12	0.04	0.32	-0.10	0.02	0.02	-0.02	-0.03	0.02	0.04	0.00	-0.02	0.06	0.04	-0.06
24 General Elementary	0.04	0.04	0.05	0.03	0.00	0.06	0.03	0.12	-0.16	0.11	0.04	-0.05	-0.09	-0.04	0.04	0.09	0.11	0.06	-0.01	-0.14
25 Middle Vocational	0.04	0.05	0.03	0.02	0.00	0.02	-0.05	-0.09	0.06	-0.02	0.01	0.03	0.00	0.01	-0.01	-0.02	-0.02	0.00	0.05	-0.01
26 Vocational plus Abitur	-0.04	-0.04	-0.04	-0.04	0.01	0.01	0.11	0.01	-0.06	-0.02	0.02	0.08	0.02	-0.03	-0.06	-0.04	-0.02	-0.02	0.00	0.05
27 Higher Vocational	-0.03	-0.03	-0.03	-0.03	0.03	0.06	-0.02	-0.07	-0.01	-0.05	-0.05	0.02	0.05	0.01	-0.02	-0.02	-0.02	-0.04	-0.04	0.07
28 Higher Education	-0.06	-0.08	-0.05	-0.03	0.02	-0.08	-0.03	-0.11	0.17	-0.05	-0.12	-0.01	0.08	0.05	0.01	-0.03	-0.05	-0.09	-0.04	0.14
29 Equiv. HH-income (in 1,000€)	-0.12	-0.13	-0.10	-0.10	0.10	0.19	-0.06	-0.12	-0.10	-0.05	0.01	-0.02	0.06	0.08	-0.06	-0.08	-0.03	-0.11	-0.15	0.23
30 1-Person HH	0.01	0.01	0.01	0.00	0.03	0.07	-0.06	-0.05	-0.02	0.07	-0.05	-0.03	-0.09	-0.05	0.00	0.11	0.22	-0.06	-0.01	-0.10
31 Couple without Children	0.01	0.01	0.01	0.00	0.05	0.03	-0.04	-0.04	0.01	-0.02	-0.10	-0.10	-0.25	-0.02	0.27	0.22	0.05	0.03	-0.01	-0.17
32 Single Parent	0.01	0.00	0.01	0.01	0.00	0.00	0.01	-0.01	0.00	0.06	0.05	0.01	0.03	0.01	-0.05	-0.04	-0.02	-0.02	0.02	0.03
33 Couple with Children ≤ 16	-0.01	-0.01	-0.01	0.01	-0.03	0.02	0.08	0.00	-0.06	-0.01	-0.10	0.30	0.29	-0.15	-0.23	-0.18	-0.11	-0.02	-0.01	0.17
34 Couple with Children > 16	-0.01	-0.02	-0.01	-0.01	-0.01	-0.04	-0.03	0.03	0.04	-0.05	0.16	-0.12	-0.08	0.19	0.02	-0.07	-0.09	0.02	0.00	0.06
35 Couple with Children ≤ 16 and > 16	0.00	0.01	0.00	0.01	-0.04	-0.08	0.02	0.05	0.05	-0.01	0.11	-0.13	0.19	0.06	-0.11	-0.09	-0.06	0.00	0.01	0.07
36 Multiple Generation HH	0.00	0.00	0.00	-0.02	-0.02	-0.05	0.07	0.09	-0.04	0.01	0.01	0.01	-0.02	-0.01	0.01	-0.02	0.02	0.03	0.03	-0.03
37 Other Combination	0.00	-0.01	0.00	0.00	-0.06	0.01	-0.02	-0.02	0.01	-0.01	0.01	0.00	-0.01	0.00	0.02	-0.02	0.00	0.01	0.01	0.00
38 Satisfaction with Health	-0.08	-0.07	-0.08	-0.06	-0.05	0.04	0.05	-0.03	-0.04	-0.03	0.15	0.19	0.07	-0.07	-0.15	-0.13	-0.12	-0.06	-0.05	0.21
39 Cumulated Unempl. Experience	0.07	0.07	0.07	0.05	0.09	-0.10	0.03	0.10	0.03	0.01	-0.09	-0.04	0.02	0.04	0.09	-0.02	-0.04	0.05	0.32	-0.17
40 Language Proficiency	0.04	0.03	0.05	0.02	-0.02	-0.34	0.39	0.63	-0.23	-0.01	-0.04	0.00	-0.02	0.06	0.04	-0.04	-0.05	0.07	0.06	-0.05

Continued on next page

Continuation of Table O45

	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40
21 Retired	1.00																			
22 Still in School	-0.04	1.00																		
23 Inadequately	-0.01	-0.02	1.00																	
24 General Elementary	0.14	-0.04	-0.09	1.00																
25 Middle Vocational	-0.02	-0.09	-0.18	-0.47	1.00															
26 Vocational plus Abitur	-0.04	-0.02	-0.04	-0.10	-0.21	1.00														
27 Higher Vocational	-0.03	-0.03	-0.05	-0.14	-0.29	-0.06	1.00													
28 Higher Education	-0.06	-0.04	-0.08	-0.21	-0.43	-0.09	-0.13	1.00												
29 Equiv. HH-income (in 1,000€)	-0.09	0.02	-0.08	-0.13	-0.08	0.03	0.04	0.24	1.00											
30 1-Person HH	0.22	-0.03	-0.03	0.05	-0.01	0.01	-0.01	-0.01	-0.18	1.00										
31 Couple without Children	0.21	-0.06	-0.03	0.01	0.01	-0.03	0.00	0.02	0.04	-0.25	1.00									
32 Single Parent	-0.04	0.01	0.00	0.02	0.02	0.00	-0.03	-0.02	-0.11	-0.08	-0.15	1.00								
33 Couple with Children ≤ 16	-0.21	-0.05	-0.03	-0.06	0.01	0.03	0.05	0.02	-0.02	-0.20	-0.37	-0.12	1.00							
34 Couple with Children > 16	-0.11	0.08	0.05	-0.01	0.00	0.00	-0.02	-0.01	0.16	-0.17	-0.31	-0.10	-0.25	1.00						
35 Couple with Children ≤ 16 and > 16	-0.11	0.12	0.04	-0.01	-0.02	-0.01	0.01	-0.01	0.01	-0.10	-0.19	-0.06	-0.15	-0.13	1.00					
36 Multiple Generation HH	0.00	-0.01	0.06	0.05	-0.03	0.00	-0.03	-0.02	0.03	-0.06	-0.12	-0.04	-0.09	-0.08	-0.05	1.00				
37 Other Combination	-0.01	-0.01	0.00	0.00	0.00	-0.01	0.00	0.01	0.01	-0.05	-0.09	-0.03	-0.07	-0.06	-0.04	-0.02	1.00			
38 Satisfaction with Health	-0.19	0.05	-0.04	-0.06	0.00	0.04	0.02	0.03	0.11	-0.06	-0.13	0.02	0.14	0.02	0.03	0.01	-0.01	1.00		
39 Cumulated Unempl. Experience	-0.04	-0.04	0.09	0.04	0.03	-0.01	-0.04	-0.07	-0.18	0.04	0.01	0.04	-0.04	-0.02	0.00	0.01	-0.01	-0.10	1.00	
40 Language Proficiency	-0.05	-0.03	0.40	0.13	-0.12	0.03	-0.07	-0.11	-0.14	-0.07	-0.06	-0.03	0.03	0.04	0.06	0.12	-0.03	-0.04	0.13	1.00

Source: GSOEP.

Table OA6: Summary statistics of all variables

	N	Mean	StdDev	Min	Max
General welfare factor	15810	0.002	0.221	-1.022	0.710
(Un-)employment factor	15810	0.003	0.283	-1.296	1.018
Old-age, care and sickness factor	15810	0.002	0.303	-1.150	0.833
Family and children factor	15810	0.003	0.295	-1.234	0.957
Year=2002 (Ref.=1997)	15810	0.500	0.500	0.000	1.000
Natives West	15810	0.514	0.500	0.000	1.000
Recent Migrants (≤10 years)	15810	0.048	0.214	0.000	1.000
Non-recent Migrants (>10 years)	15810	0.104	0.305	0.000	1.000
Natives East	15810	0.334	0.472	0.000	1.000
Female (Ref.=Male)	15810	0.518	0.500	0.000	1.000
Age ≤25	15810	0.075	0.264	0.000	1.000
Age 26-35	15810	0.204	0.403	0.000	1.000
Age 36-45	15810	0.233	0.423	0.000	1.000
Age 46-55	15810	0.179	0.384	0.000	1.000
Age 56-65	15810	0.168	0.374	0.000	1.000
Age 66-75	15810	0.099	0.299	0.000	1.000
Age 76-max	15810	0.041	0.198	0.000	1.000
Non-working	15810	0.217	0.412	0.000	1.000
Unemployed	15810	0.066	0.248	0.000	1.000
Working	15810	0.584	0.493	0.000	1.000
Retired	15810	0.133	0.340	0.000	1.000
Still in School	15810	0.009	0.092	0.000	1.000
Inadequately	15810	0.030	0.171	0.000	1.000
General Elementary	15810	0.182	0.386	0.000	1.000
Middle Vocational	15810	0.492	0.500	0.000	1.000
Vocational plus Abitur	15810	0.044	0.205	0.000	1.000
Higher Vocational	15810	0.080	0.272	0.000	1.000
Higher Education	15810	0.163	0.370	0.000	1.000
Equiv. HH-income (in 1,000€)	15810	1.363	0.659	0.033	10.607
1-Person HH	15810	0.117	0.321	0.000	1.000
Couple without Children	15810	0.314	0.464	0.000	1.000
Single Parent	15810	0.048	0.215	0.000	1.000
Couple with Children ≤ 16	15810	0.228	0.420	0.000	1.000
Couple with Children > 16	15810	0.173	0.378	0.000	1.000
Couple with Children ≤ 16 and > 16	15810	0.075	0.264	0.000	1.000
Multiple Generation HH	15810	0.028	0.166	0.000	1.000
Other Combination	15810	0.017	0.128	0.000	1.000
Satisfaction with Health	15810	6.468	2.139	0.000	10.000
Cumulated Unempl. Experience	15810	0.740	1.662	0.000	26.000
Language Proficiency	15810	1.220	0.679	1.000	5.000

Notes: N at the observational level.

Source: GSOEP.

Table OA7: Differences-in-differences estimator – (un-)employment factor

	(Un-)employment			
	All migrants	Turks	Mediterranean	Post-socialist
Year=2002 (Ref.=1997)	0.0132 **	0.0130 **	0.0135 **	0.0134 **
<i>Group (Ref.=Natives West)</i>				
Recent Migrants (≤10 years)	0.0495 **	0.0522	0.0538	0.0519 **
Non-recent Migrants (>10 years)	0.0340 **	0.0505 *	-0.0049	0.0353 *
Natives East	0.1235 ***	0.1242 ***	0.1247 ***	0.1239 ***
<i>Year X Group</i>				
2002 X Recent Migrants	0.0031	-0.0164	-0.0177	0.0093
2002 X Non-recent Migrants	-0.0200	-0.0291	0.0058	-0.0311
2002 X Natives East	-0.0237 **	-0.0237 **	-0.0237 **	-0.0242 **
Female (Ref.=Male)	0.0119 **	0.0113 *	0.0140 **	0.0129 **
<i>Age (Ref.≤25)</i>				
26-35	0.0092	0.0075	0.0144	0.0155
36-45	0.0127	0.0162	0.0200 *	0.0193 *
46-55	0.0160	0.0172	0.0225 *	0.0230 *
56-65	0.0250 *	0.0230 *	0.0319 **	0.0321 **
66-75	0.0019	-0.0022	0.0005	0.0038
76-max	0.0005	-0.0100	-0.0062	-0.0014
<i>Empl. Status (Ref.=Non-working)</i>				
Unemployed	0.0113	0.0121	0.0079	0.0031
Working	-0.0137 *	-0.0168 **	-0.0183 **	-0.0173 **
Retired	0.0152	0.0176	0.0177	0.0196
<i>Education (Ref.=Still in School)</i>				
Inadequately	0.0294	0.0533 *	0.0600 *	0.0488
General Elementary	0.0307	0.0296	0.0301	0.0291
Middle Vocational	0.0129	0.0124	0.0085	0.0106
Vocational plus Abitur	-0.0427	-0.0438	-0.0533 *	-0.0466 *
Higher Vocational	-0.0193	-0.0212	-0.0254	-0.0249
Higher Education	-0.0515 *	-0.0576 *	-0.0597 *	-0.0539 *
Equiv. HH-income (in 1,000€)	-0.0279 ***	-0.0273 ***	-0.0284 ***	-0.0298 ***
<i>HH-type (Ref.=1-Person HH)</i>				
Couple without Children	-0.0031	-0.0037	-0.0046	-0.0017
Single Parent	-0.0097	-0.0083	-0.0076	-0.0082
Couple with Children ≤ 16	0.0127	0.0069	0.0110	0.0128
Couple with Children > 16	-0.0065	-0.0101	-0.0077	-0.0034
Couple with Children ≤ 16 and > 16	0.0130	0.0085	0.0098	0.0134
Multiple Generation HH	-0.0008	-0.0196	-0.0102	0.0050
Other Combination	-0.0128	-0.0271	-0.0309 *	-0.0139
Satisfaction with Health	-0.0046 ***	-0.0042 ***	-0.0041 ***	-0.0042 ***
Cumulated Unempl. Experience	0.0041 **	0.0037 *	0.0030	0.0042 **
Language Proficiency	0.0013	-0.0098	0.0152	0.0018
Constant	0.0018	0.0168	-0.0114	-0.0012
<i>Statistics</i>				
N	15810	14154	13930	14538
R2	0.059	0.065	0.067	0.064

Notes: * p<.05, ** p <.01, *** p<.001 (one-sided tests).

Source: GSOEP.

Table OA8: Differences-in-differences estimator – old-age/care/sickness factor

	Old-age/care/sickness							
	All migrants		Turks		Mediterranean		Post-socialist	
Year=2002 (Ref.=1997)	0.0251	***	0.0247	***	0.0252	***	0.0251	***
<i>Group (Ref.=Natives West)</i>								
Recent Migrants (≤10 years)	0.0597	**	0.1214	**	0.1135		0.0593	**
Non-recent Migrants (>10 years)	0.0491	***	0.0704	**	0.0014		0.0551	**
Natives East	0.0875	***	0.0882	***	0.0888	***	0.0876	***
<i>Year X Group</i>								
2002 X Recent Migrants	-0.0128		-0.1005	*	0.0167		0.0043	
2002 X Non-recent Migrants	-0.0301	*	-0.0350		-0.0017		-0.0460	*
2002 X Natives East	-0.0408	***	-0.0406	***	-0.0409	***	-0.0411	***
Female (Ref.=Male)	-0.0117	*	-0.0130	*	-0.0119	*	-0.0117	*
<i>Age (Ref.≤25)</i>								
26-35	0.0129		0.0151		0.0212	*	0.0202	*
36-45	0.0229	*	0.0288	**	0.0312	**	0.0283	**
46-55	0.0175		0.0225	*	0.0268	*	0.0263	*
56-65	0.0290	*	0.0317	**	0.0393	**	0.0398	**
66-75	-0.0121		-0.0053		-0.0045		-0.0057	
76-max	-0.0145		-0.0100		-0.0092		-0.0081	
<i>Empl. Status (Ref.=Non-working)</i>								
Unemployed	0.0072		0.0041		0.0031		0.0041	
Working	-0.0033		-0.0074		-0.0050		-0.0048	
Retired	0.0354		0.0290		0.0340		0.0376	
<i>Education (Ref.=Still in School)</i>								
Inadequately	0.0217		0.0578	*	0.0572		0.0491	
General Elementary	0.0162		0.0098		0.0092		0.0112	
Middle Vocational	-0.0069		-0.0097		-0.0182		-0.0111	
Vocational plus Abitur	-0.0575	*	-0.0565	*	-0.0674	*	-0.0644	*
Higher Vocational	-0.0360		-0.0400		-0.0487	*	-0.0433	
Higher Education	-0.0513	*	-0.0588	*	-0.0647	*	-0.0559	*
Equiv. HH-income (in 1,000€)	-0.0215	***	-0.0195	***	-0.0217	***	-0.0225	***
<i>HH-type (Ref.=1-Person HH)</i>								
Couple without Children	-0.0059		-0.0076		-0.0061		-0.0056	
Single Parent	0.0005		0.0036		0.0030		0.0026	
Couple with Children ≤ 16	0.0040		0.0024		0.0075		0.0053	
Couple with Children > 16	-0.0056		-0.0037		-0.0030		-0.0034	
Couple with Children ≤ 16 and > 16	-0.0090		-0.0074		-0.0049		-0.0040	
Multiple Generation HH	-0.0058		-0.0251		-0.0188		-0.0156	
Other Combination	-0.0050		-0.0185		-0.0185		-0.0085	
Satisfaction with Health	-0.0073	***	-0.0075	***	-0.0073	***	-0.0073	***
Cumulated Unempl. Experience	0.0060	***	0.0055	**	0.0059	**	0.0061	**
Language Proficiency	0.0036		-0.0084		0.0184		-0.0071	
Constant	0.0336		0.0488		0.0211		0.0428	
<i>Statistics</i>								
N	15810		14154		13930		14538	
R2	0.032		0.033		0.035		0.033	

Notes: * p<.05, ** p <.01, *** p<.001 (one-sided tests).

Source: GSOEP.

Table OA9: Differences-in-differences estimator – family and children factor

	Family and Children			
	All migrants	Turks	Mediterranean	Post-socialist
Year=2002 (Ref.=1997)	-0.0053	-0.0054	-0.0051	-0.0052
<i>Group (Ref.=Natives West)</i>				
Recent Migrants (≤10 years)	0.0481 **	0.0338	0.1579 *	0.0500 *
Non-recent Migrants (>10 years)	0.0435 **	0.0534 *	0.0278	0.0339
Natives East	0.1039 ***	0.1049 ***	0.1052 ***	0.1039 ***
<i>Year X Group</i>				
2002 X Recent Migrants	-0.0072	0.0050	-0.1953 *	0.0030
2002 X Non-recent Migrants	-0.0422 **	-0.0480 *	-0.0486 *	-0.0272
2002 X Natives East	0.0105	0.0100	0.0105	0.0101
Female (Ref.=Male)	-0.0121 *	-0.0159 **	-0.0128 *	-0.0122 *
<i>Age (Ref.≤25)</i>				
26-35	0.0181	0.0115	0.0126	0.0209 *
36-45	0.0262 *	0.0248 *	0.0249 *	0.0292 **
46-55	0.0118	0.0100	0.0114	0.0166
56-65	0.0289 **	0.0233 *	0.0275 *	0.0355 **
66-75	-0.0046	-0.0122	-0.0084	-0.0031
76-max	-0.0308	-0.0451	-0.0414	-0.0302
<i>Empl. Status (Ref.=Non-working)</i>				
Unemployed	0.0061	0.0045	0.0025	0.0023
Working	-0.0133 *	-0.0189 **	-0.0204 **	-0.0154 *
Retired	0.0307	0.0310	0.0273	0.0337
<i>Education (Ref.=Still in School)</i>				
Inadequately	0.0436	0.0756 *	0.0741 *	0.0484
General Elementary	0.0307	0.0336	0.0345	0.0315
Middle Vocational	0.0066	0.0046	0.0034	0.0049
Vocational plus Abitur	-0.0333	-0.0308	-0.0324	-0.0338
Higher Vocational	-0.0214	-0.0207	-0.0230	-0.0249
Higher Education	-0.0267	-0.0314	-0.0316	-0.0280
Equiv. HH-income (in 1,000€)	-0.0203 ***	-0.0190 ***	-0.0198 ***	-0.0228 ***
<i>HH-type (Ref.=1-Person HH)</i>				
Couple without Children	0.0012	0.0001	-0.0004	0.0025
Single Parent	0.0152	0.0220	0.0189	0.0157
Couple with Children ≤ 16	0.0245 **	0.0217 *	0.0263 **	0.0255 **
Couple with Children > 16	0.0032	0.0014	0.0018	0.0076
Couple with Children ≤ 16 and > 16	0.0095	0.0118	0.0099	0.0113
Multiple Generation HH	-0.0242	-0.0397 *	-0.0457 **	-0.0259
Other Combination	0.0157	-0.0004	0.0007	0.0145
Satisfaction with Health	-0.0061 ***	-0.0059 ***	-0.0055 ***	-0.0059 ***
Cumulated Unempl. Experience	0.0028	0.0035 *	0.0028	0.0030
Language Proficiency	0.0013	-0.0032	0.0055	-0.0033
Constant	0.0122	0.0245	0.0133	0.0164
<i>Statistics</i>				
N	15810	14154	13930	14538
R2	0.045	0.050	0.052	0.048

Notes: * p<.05, ** p <.01, *** p<.001 (one-sided tests).

Source: GSOEP.

Table OA10: Predicted margins and DID estimator from regression models of the (un-)employment factor

	Natives West	Migrants (<10years)			Migrants (>10 years)			Natives East		
	Predictive Margins	Predictive Margins	Difference Native West	DID	Predictive Margins	Difference Native West	DID	Predictive Margins	Difference Native West	DID
All Migrants										
1997	-0.0461	0.0034	0.0495 **		-0.0121	0.0340 **		0.0773	0.1235 ***	
2002	-0.0329	0.0197	0.0526 ***	0.0031	-0.0189	0.0141	-0.0200	0.0669	0.0998 ***	-0.0237 **
n	4065	382			820			2638		
Turks										
1997	-0.0488	0.0034	0.0522		0.0017	0.0505 *		0.0753	0.1242 ***	
2002	-0.0358	0.0000	0.0358	-0.0164	-0.0144	0.0214	-0.0291	0.0646	0.1004 ***	-0.0237 **
n	4065	67			307			2638		
Mediterranean										
1997	-0.0482	0.0055	0.0538		-0.0532	-0.0049		0.0764	0.1247 ***	
2002	-0.0347	0.0014	0.0361	-0.0177	-0.0339	0.0008	0.0058	0.0663	0.1010 ***	-0.0237 **
n	4065	20			242			2638		
Post-socialist										
1997	-0.0487	0.0031	0.0519 **		-0.0134	0.0353 *		0.0752	0.1239 ***	
2002	-0.0353	0.0258	0.0612 **	0.0093	-0.0312	0.0042	-0.0311	0.0644	0.0997 ***	-0.0242 **
n	4065	295			271			2638		

Notes: * p<.05, ** p<.01, *** p<.001 (one-sided tests). Margins predicted with all covariates at their mean.

Source: Estimates predicted from regression models in Table OA7.

Table OA11: Predicted margins and DID estimator from regression models of the old-age/care/sickness factor

	Natives West		Migrants (<10years)			Migrants (>10 years)			Natives East		
	Predictive Margins	Predictive Margins	Difference Native West	DID	Predictive Margins	Difference Native West	DID	Predictive Margins	Difference Native West	DID	
All Migrants											
1997	-0.0461	0.0034	0.0495 **		-0.0121	0.0340 **		0.0773	0.1235 ***		
2002	-0.0329	0.0197	0.0526 ***	0.0031	-0.0189	0.0141	-0.0200	0.0669	0.0998 ***	-0.0237 **	
n	4065	382			820			2638			
Turks											
1997	-0.0488	0.0034	0.0522		0.0017	0.0505 *		0.0753	0.1242 ***		
2002	-0.0358	0.0000	0.0358	-0.0164	-0.0144	0.0214	-0.0291	0.0646	0.1004 ***	-0.0237 **	
n	4065	67			307			2638			
Mediterranean											
1997	-0.0482	0.0055	0.0538		-0.0532	-0.0049		0.0764	0.1247 ***		
2002	-0.0347	0.0014	0.0361	-0.0177	-0.0339	0.0008	0.0058	0.0663	0.1010 ***	-0.0237 **	
n	4065	20			242			2638			
Post-socialist											
1997	-0.0487	0.0031	0.0519 **		-0.0134	0.0353 *		0.0752	0.1239 ***		
2002	-0.0353	0.0258	0.0612 **	0.0093	-0.0312	0.0042	-0.0311	0.0644	0.0997 ***	-0.0242 **	
n	4065	295			271			2638			

Notes: * p<.05, ** p<.01, *** p<.001 (one-sided tests). Margins predicted with all covariates at their mean.

Source: Estimates predicted from regression models in Table OA8.

Table OA12: Predicted margins and DID estimator from regression models of the family and children factor

	Natives West		Migrants (<10years)			Migrants (>10 years)			Natives East		
	Predictive Margins	Predictive Margins	Difference Native West	DID	Predictive Margins	Difference Native West	DID	Predictive Margins	Difference Native West	DID	
All Migrants											
1997	-0.0357	0.0123	0.0481 **		0.0078	0.0435 **		0.0682	0.1039 ***		
2002	-0.0410	-0.0002	0.0409 *	-0.0072	-0.0398	0.0013	-0.0422 **	0.0734	0.1144 ***	0.0105	
n	4065	382			820			2638			
Turks											
1997	-0.0374	-0.0036	0.0338		0.0159	0.0534 *		0.0675	0.1049 ***		
2002	-0.0428	-0.0040	0.0389	0.0050	-0.0375	0.0054	-0.0480 *	0.0721	0.1150 ***	0.0100	
n	4065	67			307			2638			
Mediterranean											
1997	-0.0380	0.1198	0.1579 *		-0.0102	0.0278		0.0672	0.1052 ***		
2002	-0.0432	-0.0806	-0.0374	-0.1953 *	-0.0639	-0.0207	-0.0486 *	0.0725	0.1157 ***	0.0105	
n	4065	20			242			2638			
Post-socialist											
1997	-0.0385	0.0115	0.0500 *		-0.0046	0.0339		0.0654	0.1039 ***		
2002	-0.0437	0.0093	0.0530 **	0.0030	-0.0370	0.0067	-0.0272	0.0703	0.1140 ***	0.0101	
n	4065	295			271			2638			

Notes: * p<.05, ** p<.01, *** p<.001 (one-sided tests). Margins predicted with all covariates at their mean.

Source: Estimates predicted from regression models in Table OA9.

Table OA13: Regression on general welfare factor with complete sample and controlling for contact with Germans

	M1	M2
Year=2002 (Ref.=1997)	0.0152 ***	0.0153 ***
<i>Group (Ref.=Natives West)</i>		
Recent Migrants (≤10 years)	0.0461 **	0.0462 **
Non-recent Migrants (>10 years)	0.0365 ***	0.0363 ***
Natives East	0.0865 ***	0.0864 ***
<i>Year X Group</i>		
2002 X Recent Migrants	-0.0092	-0.0117
2002 X Non-recent Migrants	-0.0266 **	-0.0265 **
2002 X Natives East	-0.0247 ***	-0.0247 ***
Female (Ref.=Male)	-0.0035	-0.0035
<i>Age (Ref.≤25)</i>		
26-35	0.0106	0.0104
36-45	0.0167 *	0.0164 *
46-55	0.0130	0.0127
56-65	0.0237 **	0.0234 **
66-75	-0.0041	-0.0049
76-max	-0.0111	-0.0118
<i>Empl. Status (Ref.=Non-working)</i>		
Unemployed	0.0055	0.0056
Working	-0.0072	-0.0074
Retired	0.0226	0.0229
<i>Education (Ref.=Still in School)</i>		
Inadequately	0.0230	0.0241
General Elementary	0.0191	0.0194
Middle Vocational	0.0018	0.0022
Vocational plus Abitur	-0.0387 *	-0.0384 *
Higher Vocational	-0.0229	-0.0225
Higher Education	-0.0370 *	-0.0365 *
Equiv. HH-income (in 1,000€)	-0.0186 ***	-0.0187 ***
<i>HH-type (Ref.=1-Person HH)</i>		
Couple without Children	-0.0030	-0.0030
Single Parent	0.0012	0.0012
Couple with Children ≤ 16	0.0095	0.0096
Couple with Children > 16	-0.0035	-0.0036
Couple with Children ≤ 16 and > 16	0.0005	0.0006
Multiple Generation HH	-0.0069	-0.0060
Other Combination	-0.0029	-0.0029
Satisfaction with Health	-0.0052 ***	-0.0052 ***
Cumulated Unempl. Experience	0.0037 **	0.0037 **
Language Proficiency	0.0022	0.0045
Contact with Germans		0.0271
Constant	0.0144	-0.0152
<i>Statistics</i>		
N	15742	15742
R2	0.047	0.047

Notes: * p<.05, ** p<.01, *** p<.001 (one-sided tests).

Source: GSOEP.