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The impact of welfare systems on immigration: An analysis of welfare magnets as a pull-factor for asylum seekers and labour migrants

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Abstract

In this dissertation, the impact of welfare on humanitarian and voluntary migration is examined. The primary research question addressed is whether generous welfare states are magnets for labour migrants and asylum seekers. More precisely, it will be answered whether welfare provisions and the specific types of welfare regimes – the social-democratic, the corporatist and the liberal model – help to explain immigration patterns to 16 OECD countries between 1985 and 2002. A cross-sectional, time-series analysis using a fixed-effects-vector-decomposition model confirms that high levels of welfare provisions pull asylum seekers, whereas labour migrants are deterred by a high de-commodification factor. Social-democratic welfare states pull refugees and deter economic migrants. Corporatist regimes pull both categories of immigrants. Liberal welfare states deter refugees, but, surprisingly, do not pull labour migrants. These results challenge the widely held assumption that labour migrants are strongly attracted to liberal welfare states and their business-friendly economies. Furthermore, the results suggest adding an additional pull-factor *welfare* to the classical push-and pull-model by Lee (1966). Hence, heterogeneous preferences of humanitarian and labour migrants regarding welfare provisions in different regimes should be taken into consideration from policy-makers while establishing efficient immigration control policies.

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1. Introduction

Emigration and immigration challenge the financing of the welfare state. The contemporary ruin of the welfare state raised by demographic challenges and mistakenly financed welfare systems is symbolised by migration. The reason is that migrants need social protection as marginalised groups, while simultaneously undermining welfare standards as market competitors (see Bommes/Geddes 2000: 7 – 9; Castles 2006: 743). Since the end of the 1990s, the impact of welfare on immigration has attracted attention by academia and politicians. The harmonisation of European immigration policy is an illustrative example of how welfare as a pull-factor for immigration has become a prominent topic in recent years (see Bank 2000: 149). A dispute within this year's interior ministries' meeting in Brussels exemplifies divergent positions on the issue. The European Commission's (Justice and Home Affairs) suggestion to provide asylum seekers with welfare benefits during application process has raised objections from member states, especially Germany (see DW-World 2010). In 1999, Jacques Chirac already noted that 'the situation regarding welfare benefits is apt to break all the barriers that we could elevate against increases in immigration. It is a vacuum pump phenomenon … we are not going to give a certain number of welfare benefits to people who risk being too attracted by our country' (Guiraudon 2000: 76).

This discussion about welfare as a signal to migration is infused by moral obligations. Ethical questions clash with strategic operations of including or excluding certain types of migrants from the welfare system in order to sustain it (see Faist 1996: 228 – 229; Menz 2009: 394 – 395). The concept of 'social citizenship', that welfare benefits are provided to third-country nationals in order to reconcile social cohesion and economic efficiency, fuels the debate about how immigrants contribute to the welfare system (see Schierup et al. 2006: 55; Düvell/Jordan 2002: 503). Policy-makers are challenged by populism as well, which stigmatises migrants as 'welfare state chauvinist' or 'welfare scroungers' (see Menz 2008: 393).

Current developments in the EU illustrate that numerous constraints challenge efficient immigration policies, which means that the immigration policy goals would equate the final policy outcome. Some argue that the completion of the Single Market has come at the expense of welfare integration (see Schierup 2006: 60). The Single Market's 'four freedoms', notably the

free movement of labour, has been accompanied by the liberalisation of immigration policies within the EU and rigorous external control policies. At the same time, Western economies demand high- and low-skilled migrants for almost all occupations because populations are ageing, good expertise is needed and natives are reluctant of doing low-skilled work (see Castles 2006: 749 – 753). Consequently, politicians face a trade-off between providing welfare benefits to immigrants on humanitarian grounds and standard-of-living purposes to low-skilled migrants, on the one hand, and restricting migration to appease their citizens, on the other. This area of tension, some argue, explains why immigration control policies are often inefficient and inflows of voluntary (labour migrants) and forced migrants (asylum seekers) into OECD countries vary so extensively (see Guiraudon 2000: 76).

In order to establish efficient immigration policies, it is important to understand, where and why migrants settle. Evidence provided in this dissertation will address this point. It will be asked whether welfare is a pull-factor for immigration, as asserted by political elites and the public. Firstly, the question of whether welfare determines variations of immigration inflows to Western democracies will be evaluated. Secondly, the question of whether distinct welfare typologies – the liberal, the corporatist and the social-democratic regime – affect variation in migration will be discussed. Specifically, these two questions are addressed separately for forced and voluntary form of migration because it is assumed that these two groups have different motives to move. Thus, the primary research question of interest is: how does welfare influence inflows of labour migrants and asylum seekers? And particularly, how do the social-democratic, corporatist and liberal welfare states attract forced and voluntary migrants?

This paper proceeds as follows: the review of the existing literature will demonstrate the research gap. In the third section, the theoretical framework is presented, and expected relationships between welfare as well as its specific effects for the different regime types and forced and economic migration are outlined. In the fourth section, the methodology used to test the research questions is discussed. In the fifth section, empirical results of the cross-sectional time-series analysis are offered, which suggest that welfare has a positive magnet effect on asylum seekers and a negative effect on economic migrants. Furthermore, the most attractive welfare state for

asylum seekers is the social-democratic one, which, in contrast, has a negative effect on economic migrants. The most appealing welfare state for economic migrants is the corporatist welfare state and, surprisingly, not the liberal welfare state.[1]

[1] The empirical analysis was conducted using Stata 10. Replication data and do-files are available on request.

2. Literature Review

The question weather welfare pulls immigrant to certain states is particularly relevant because the numbers of asylum applications and inflows of economic migrants vary considerably between Western countries. Table 1 shows the unequal distribution of economic and asylum flows to OECD countries.

Table 1: Variation in inflows of asylum seekers and economic migrants

	1990		1995	
	Asylum seeker	**Economic migrants**	**Asylum seeker**	**Economic migrants**
Australia	12.130	54.993	7.630	112.535
Austria	22.790	103.400	5.920	15.400
Belgium	12.960	.	11.420	2.800
Canada	36.740	85.381	26.070	69.617
Denmark	18.990	2.800	10.050	2.200
Finland	54.810	2.005	20.170	716
France	193.060	22.393	127.940	13.106
Germany	6.170	138.600	1.310	270.800
Ireland	4.830	1.400	1.730	4.300
Italy	30	.	50	111.300
Japan	21.210	94.868	29.260	81.508
New Zealand	.	20.011	840	38.710
Norway	3.960	1.272	1.460	2.094
Switzerland	35.840	122.779	17.020	90.957
UK	26.210	34.600	43.970	35.500
US	73.640	203.100	149.070	306.000
Total	34.891.333	63.400.143	28.369.375	72.346.438

Source: ILO (2010) and Thielemann (2010)

Switzerland and Belgium for example, two countries with rather small populations, have significantly different levels of asylum applications and economic migrants. A comparison between France and the UK provides a similar picture: France takes much more asylum seekers and less economic migrants than the UK even if the structural demands and historical path-dependencies of both countries are very similar. Consequently, these imbalanced flows of forced and labour migration call into question the effectiveness of Western governments' immigration

policies. Some argue that there are pull-factors for migration, which are out of policy makers' control. Traditionally, societal, geographical, political and economic pull-factors are held responsible for this variation (see Thielemann 2008: 449 – 452). In this paper, it is argued that one forgotten pull-factor is welfare provision, and this factor should be added to existing ones.

The following sub-section provides a summary of the existing literature on migration. Research addressing asylum and labour migration on its own is discussed first, followed by a broader literature research, which assesses welfare benefits as a pull-factor for immigration in general. Based on inconsistent findings of previous research, it will be argued that the effects of welfare provision on different immigration typologies – forced and voluntary forms – needs to be analysed individually, rather than in aggregate. Moreover, the literature review will indicate that separate estimations for welfare effects on economic migrants and asylum seekers by welfare regime types are novel.

2.1 Welfare & humanitarian and voluntary migration

Borjas (1999), who established the *welfare-magnets thesis*, significantly influenced the literature about the impact of welfare on immigration. He concluded that welfare programs attract immigrants. The choice of migrant's destination correlates positively with the different levels of welfare provisions in different states in the US (ibid: 608, 615 – 616).

Research about welfare magnetism within the decision-making process to migrate for *forced* migrants offers contradicting results. A qualitative study by Robinson and Segrott (2002) explains that forced migrants do not make choice of destination at all because the majority of asylum seekers use travel agents, who make the decision for them. In addition, the authors conclude that chance, coincidence, financial constraints, security, networks of family and friends, language similarities or a shared colonial past explain the destination countries of migrants rather than welfare provisions (ibid: 1 - 2). In contrast, Böcker/Havinga's (1998), Zavodny's (1999) and Thielemann's (2008) research confirms welfare magnet effects for asylum seekers. The qualitative study by Böcker/Havinga (1998) shows that the right to work is one of the most important considerations for asylum seekers because they do not want to depend on public

support (ibid: 64 – 68). The quantitative study conducted by Zavodny (1999) shows that refugees are lured by higher welfare benefits (ibid: 1022). Thielemann (2008) verifies that the prohibition to work until the asylum claim has been processed has a significant negative effect on relative numbers of forced migrants to OECD countries (ibid: 465).

Studies about welfare magnetism undertaken for *labour* migrants also provide contradictory conclusions. Andall (2008) shows in his qualitative study that even if Ghanaian labour migrants in Italy might not consciously decide to which country they go to, they are aware of different acceptance rates and entry requirements, as for instance stricter visa restrictions in Germany since 1993 or often occurring amnesties and easier living conditions for illegal migrants in Italy in 2002 (ibid: 287 – 290). In contrast, in a quantitative study by Zavodny (1999) it is demonstrated that legal permanent residents are not attracted by higher welfare standards (ibid: 1028).

Thus, studies following Borjas' welfare-magnet thesis, show conflicting results. Consequently, it can be summarized that 'research on this topic is not conclusive' (Morissons 2008: 76).

2.2 Welfare & immigration

In addition to the above literature, there is also a research stream about the impact of welfare magnets on *immigration* in general, using a rather broad definition of migrants. Here, studies also contradict each other about whether there is a significant impact between welfare provision and immigration inflows.

Brücker et al. (2002) reveals that 'welfare shopping' does not drive migration of non-EU citizens (ibid: 89), Menz (2008) argues that the amount of inward migration does not depend on the welfare regime (ibid: 401) and Pedersen et al. (2008) indicate that the level of tax revenues is not important for welfare migration (ibid: 61 – 65). In contrast, other studies highlight that immigrants do care about welfare benefits. Meyer (2000) demonstrates that welfare induces migration, especially for less educated migrants, though the magnitude of the effect is rather small (ibid: 30 - 31), DeGiorgi and Pellizzari (2008) show that migrants older than 25 are more likely to move to older EU member states if the welfare benefits are high (ibid: 355 – 358), Peridy (2006) identifies that migration rates increase if the destination countries' average income

and social benefits are higher than in the source country (ibid: 3, 5), Morrissens (2008) illuminates that social-democratic welfare states have the lowest poverty rates and the most efficient unemployment benefits for immigrants (ibid: 191) and Warin and Svaton (2008) show that immigrant inflows are attracted by social protection expenditures in interaction with unemployment rates in the EU-15 (ibid: 2).

Unfortunately, these studies about the importance of welfare for decisions to migrate conducted for immigrants have a lack in precision because they define immigrants as a collective group, irrespective of whether they migrated voluntarily or for asylum reasons. For instance, Borjas (1999) and Morissons (2008) classify immigrants by a measure of households, where at least one person has to be born outside the US (see Borjas 1999: 615 – 616; Morrissons 2008: 174). Meyer (2000) vaguely defines immigrants as individuals who reside in a location different to where they lived five years before (ibid: 13) or Warin and Svaton (2008) analyse the annual immigration stock as a percentage of the total population (ibid: 8 – 9). These broad definitions miss individual-specific welfare effects for forced versus voluntary immigrants, whose motives to migrate are not the same. This might also explain the contradicting results within the literature assessing the impact of welfare on immigration. Their results are driven by definitions and units of their dependent variables (see Fix et al. 2009: 20).

The difference between the two types of legal immigration is important for evaluating the impact of welfare on immigration. Pull-factors of migration depend on the causes for immigration (see Böcker/Havinga 1998: 11 – 12). Hence, the assessment of the importance of welfare for their decision to migrate can be different. The general research divide about forced and labour migration is problematic due to a lack of comparability. Only in two studies, both categories have been defined and constructed simultaneously (see Hansen/Lofstrom 1999; Zavodny 1999). Peterson (1970) made the original differentiation of legal immigration on a voluntary (economic or labour migration) and non-voluntary (asylum seekers or humanitarian migration) basis. Yet since then, ‘ … there are little cross-references between scholars concerned with labour-migration flows, on the one hand, and those interested in refugee flows, on the other hand’ (Böcker/Havinga 1998: 14). This isolation of migration phenomena into separated areas has been criticised for preventing knowledge about more individual-specific migration motivations (see

King 2002: 92 – 94). Some claim that it is often the case that labour migrants abuse the asylum process by claiming false asylum in order to enter a country (see Castles/Loughna 2005: 39). Moreover, forced migrants '… respond to migration rules and policies of receiving states in deciding on their mode of migration' (Castles/Loughna 2005: 41). This so-called 'asylum-migration nexus' makes it difficult to distinguish humanitarian migrants from immigrants with pure economic motives (see Czaika 2009: 14).

Therefore, this dissertation conflates different research areas by investigating the effects of welfare on forced as well as economic migration. In examining the impact of welfare typologies on forced versus economic migration, it also makes new inroads, which have been ignored by the previous literature.

3. Migration and Welfare Theory

3.1 Push- and pull model

One of the most widely known migration theories is Lee's push- and pull model (1966). In this model, different push- and pull-factors dictate the act of migration. Factors associated with the area of origin push the migrant, whereas factors related to the destination country pull the migrant and intervening events and personal characteristics interfere these gravities (Lee 1966: 49 – 50). This dissertation focuses on pull-factors associated with the destination country. Traditionally, the composition of society in destination countries and economic factors are considered as pull-factors (Lee 1966: 52 – 53). The hypothesis presented here, however, offers an additional pull-factor – welfare provisions. Its effect will be distinguished with respect to humanitarian and voluntary categories of migration.[2]

The push-and pull model is based on widely known assumptions about the behaviour of migrants. Similar to Thielemann (2008), this paper argues that asylum seekers as well as economic migrants are well informed about their destination country and that they render a rational cost-benefit analysis about 'access, determination and integration/welfare measures' (Thielemann 2008: 447). This exemplifies the standard neoclassical model assuming that migrants are utility maximizers, who choose the destination country that provides the best opportunities (see Massey et al. 1993: 434 - 436). Many actors can convey knowledge about destination countries: radio, television, Internet, development workers, priests, tourists, soldiers, business actors, family ties or remittances (see Böcker/Havinga 1998: 51). Given this multitude of sources, forced and economic migrants will have some degree of information about possible destination countries.

The impact of welfare on labour and forced migration is not identical. While labour migrants have greater probability of securing employment after their arrival in host countries via being selected by companies, guest-worker schemes or by point-based enrolment systems, asylum seekers depend more on the welfare state because they may be prohibited from working or less informed about employment possibilities. Unlike economic migrants, asylum seekers flee their

[2] Although it can be argued that the application of the push- and pull model for forced migration is rather difficult since the 'well-founded fear of being persecuted for reasons of race, religion, nationality, membership to a particular social group or political opinion' prevents elements of choice for asylum seekers and refugees, in reality, the categories of forced and voluntary migration are less distinct and often political and economical factors generate a movement for both types of migrants (see Thielemann 2008: 445, 449; King 2002: 92 – 94).

host country and have greater necessity for a welfare system because welfare provisions are often linked to labour market participation (see Menz 2008: 395 – 401). Consequently, this paper argues that *welfare pull-factors are more important for asylum seekers than for labour migrants*.

Thus, this dissertation contradicts the common assumption that economic migrants are more attracted by the welfare state than forced migrants because they have more time in assessing costs and benefits of their migration, compared to the persecuted (see Böcker/Havinga 1998: 23). Rather, this paper argues that there is a negative effect of welfare expenditure on labour migrants because high levels of welfare spending are normally involved with less market responsiveness and high levels of labour regulations, which keep economic migrants away. Hence, this paper hypothesises that *high levels of welfare provisions are negatively affecting inflows of labour migration.*

3.2 Three worlds of welfare capitalism

These general effects can be evaluated more precisely by estimating individually the effects of the three welfare state types on humanitarian and voluntary migration. Esping-Andersen (1990) defines welfare state '… in terms of rights it grants. … [welfare] state activities are interlocked with the market's and the family's role in social provisions' (ibid: 21). He classifies three welfare state types: the liberal, the corporatist and the social-democratic welfare state (ibid: 26 – 28). This paper assumes that these three types differently attract forced and voluntary migrants (see Bommes 2000: 95). It will be shown that the three welfare regimes impinge on immigration policies using the United Kingdom as a liberal, Germany as a corporatist and Sweden as a social-democratic example of welfare states roughly between 1980 and 2000.[3]

Liberal regime

[3] Certainly, the application of the welfare typology to labour migration and asylum policy has to be taken with caution. Esping-Andersen (1990) did not include either of these areas in his original welfare typology (ibid: 144ff). In addition, national immigration policies still massively vary within each cluster of welfare regimes like Denmark as rather ruthless social-democratic regime. Nevertheless, this dissertation argues that general trends within each cluster of welfare state types can be observed and are conclusive enough to be applied in a Large-N study.

The United Kingdom, the United States or Australia epitomise liberal welfare states. One the one hand, liberal welfare states are characterised as having minimalist welfare provisions. Flat-based insurances are means-tested and only constituted for basic needs. Universal transfers are modest. Consequently, people often rely upon private-sector social insurance, which stratifies societies a lot. On the other hand, market-efficient policies identify liberal welfare states. Guaranteeing only a minimum or subsidizing private provisions encourages the market. Hence, this archetype contains only a few social rights and class-political dualism between the poor and the rich (see Esping-Andersen 1990: 26 – 27).

The UK illustrates how liberal welfare characteristics influence migration policies, as they share similar features. The recruitment system is prompt and efficient for all skill-levels. Because economic demands change quickly, part-time or casual work is favoured, which reduces the costs of labour for companies. Even if economic migrants are theoretically fully integrated into the British welfare system, the social system in the UK is rather a surveillance organ for economic migrants (see Castles 2006: 753 – 754; Schierup et al. 2006: 127 – 129; Menz 2008: 402). British refugee politics has changed during the sample period. In the aftermath of colonial independence, asylum seekers moved en masse to the UK. Therefore, immigration control was rather strict. But initially in the 1990s, a safety net for asylum seekers covering basic costs was introduced, in parallel to the normal welfare system of citizens symbolised by the so-called voucher-system instead of cash benefits. Simultaneously, tougher visa control, carrier sanctions and detention camps were introduced. In addition, asylum seekers were barred from the right to work, child benefits, family credits and disability allowances (see Geddes 2000: 135 – 145; Gibney 2004: 121 – 125; Schierup et al. 2006: 121).

Corporatist welfare state

The corporatist welfare states exemplified by Austria, France, Germany, or Italy are characterised by a historical corporatist-statist legacy. The state completely detached the market from welfare. Social rights were never seriously contested. Nevertheless, the corporatist welfare system is based on status differentials among classes, occupations and gender by focusing on the male-breadwinner model. In the generous insurance system of the corporatist welfare state level and length of the contributions are decisive for benefits. The system is quite comprehensive; hence, private insurances only play a marginal role (see Esping-Andersen 1990: 27).

Germany exemplifies how corporative welfare characteristics influence migration policies. Its labour migration policies are very much responsive to short- as well as long-term demands of the economy. Germanys' guest-worker schemes were large to address shortfalls in manpower in the years of economic growth after the Second World War. However, in the 1990s, labour standards, employment relationships and pay levels were introduced to prevent permanent settlement. Social assistance covering health care, disability benefits, sickness compensation, unemployment benefits and child allowances is allotted by level and length of contributions to the system and is bound to permanent residence status in Germany. Thus, the financing of the welfare system does not differentiate between native workers and labour migrants. Nevertheless, unprotected jobs such as 'contract working' undermine the social security system by short hours as well as low pay and relief the employers (see Faist 1996: 229; Hjarno 2003: 109 – 110; Menz 2008: 405; Sainsbury 2006: 234 - 235). Asylum welfare is immense in Germany. Although visa requirements and welfare policies are restricted until the final adjudication in order to deter migration flows since 1980s, afterwards, once the asylum request has been approved, refugees receive high expenditures. Compulsory language courses as well as educational training schemes are provided in order to secure the corporatist welfare state system by supporting humanitarian immigrants to find jobs aimed at quickly refinancing the system (see Bank 2000: 154 – 156, 164 – 165; Gibney 2004: 96 - 100).

Social-democratic regime

The social-democratic welfare regime, congregating mostly in Scandinavian countries, is based on expansive transfer payments. Principles of social rights and universalism design this kind of welfare state. It is best known for its significant social benefits for all social classes. It illustrates equality of highest standards. A high level of unionisation as well as minimum wages, egalitarian wage distribution, huge public sector employment and high female labour market participation characterise these states (see Esping-Andersen 1990: 27 – 28).

Given its values of equality and universalism, welfare benefits are universal for labour migrants in the Swedish welfare state. For example, Sweden was the first state that granted political rights to foreigners. Trade unions constantly insist upgrading wages and skills of immigrants as well as providing foreign workers with social benefits, sick pay and pensions. Nevertheless, the Swedish state is imposing labour-law compliances, which prevent migrants from undermining labour

market regulations as well as collective bargaining structures aimed at the protection of domestic workers. In addition, a comprehensive social citizenship for economic migrants in Sweden makes it difficult for the market and politicians to react promptly to economic needs (see Ruhs/Martin 2008: 257; Sainsburgy 2006: 238; Schierup 2006: 196, 218 – 221, 227 - 228). Asylum policy in Sweden is one of most comprehensive immigration policies in the world. It is strongly influenced by humanitarian motivations and provides enormous benefits on all levels such as housing, health, education or civil rights. In addition, Sweden encourages asylum seekers to find work by providing educational training schemes (see Menz 2008: 408, 399 - 401; Schierup 2006: 218).

Because of these case descriptions, this paper expects that *asylum seekers* should be strongly attracted by social-democratic welfare states because of their high level of welfare provisions with minimal conditions. Attraction towards the corporatist welfare regime should be lower since welfare provisions until the final adjudication are restricted in contrast to the social-democratic regime. Furthermore, it is assumed that the liberal state has a negative effect on the destination choice of asylum seekers because social benefits are generally lower.
These expectations contradict the widely held assumption that asylum seekers mostly prefer unregulated markets because they can work more easily in the underground economy (see Düvell/Jordan 2002: 512). It is assumed here that working on the black market is not the aim of forced migrants but rather an unintended consequence of not finding any work on a legal basis. In addition, forced migrants are expected to avoid liberal welfare states because means-tested benefits hinder migrants from investing into professional and educational skill-trainings, which could advance their financial situation (see Menz 2008: 394 – 396, 399 – 401; Morissens 2008: 183).

The impact of the welfare states on *labour migrants* is expected to be the reverse. Liberal welfare states are most attractive for economic immigrants because they constantly accommodate labour immigration schemes to increase market efficiency. Domestic workers are not protected to prevent wage pressure and decreasing labour standards, wherefore economic migrants have more space for finding their niche on the labour market, even if the safety net is rather small (see Faist 1996: 228, 232). It is assumed that this effect declines for corporatist welfare states because this regime admittedly favours market-based economies, but strong labour regulations and low-paid

‘contract work’ are less attractive for labour migrants. The welfare effect is very likely to turn negative for the social-democratic regime because domestic labour markets are highly protected by strong unionisation and public sector employment, wherefore even a high level of sick pay, unemployment benefits and pensions loose their appeal. Table 2 summarises the expected effects for both, asylum seekers and economic migrants.

Table 2: Expected coefficients

Independent variables	Dependent variables	
	Asylum seeker	Economic migrant
Welfare	+	-
Liberal	-	++
Corporatist	+	+
Social-democratic	++	-

4. Methodology

From the literature review we can see that there are studies conducted either qualitatively or quantitatively about welfare magnet effects. There is a strong attractiveness for qualitative studies in this research field because who else than migrants know which factors pulled them to migrate (see Thielemann 2008: 448). Nevertheless, the systematic analysis of qualitative studies based on interviews is very costly and time-consuming. Furthermore, interviews might suffer from social desirability because asylum seekers and guest-workers might answer in certain ways to prevent deportation. Thus, this paper will use a quantitative analysis since its generalisability is much higher than for qualitative studies, although a sampling bias towards OECD countries has to be admitted for the data at hand (see Geddes 1990:133).[4] A pooled time-series, cross-section design is used in order to account for variation in relative numbers of asylum seekers and labour migrants in Western democracies over both time and space with the unit country-year. More precisely, 16 OECD countries for the period of 1985 to 2002 are assessed.[5]

4.1 Data and operationalisation

Dependent variables

Two dependent variables *Economic migrants* and *Asylum seekers* shall measure the divergent effects of welfare as a pull-factor for immigration depending on the type of migration. Both variables represent relative numbers in order to standardise the variable across variable population size. Consequently, an endogeneity-bias towards large countries attracting more migrants than smaller ones is barred (see Gelbach 2004: 1122 – 1124; Thielemann 2008: 453 - 454).

The first dependent variable, *Economic migrants,* is defined as: *the total number of employed inflows into each country, j, in year t, relative to the total population divided by the total inflow*

[4] Nevertheless, limitations for quantitative research about this research topic are given by incongruent definitions of economic migrant and asylum seeker in countries (see SOPEMI 2002: 269 – 273).

[5] The data includes USA, Australia, Japan, New Zealand, United Kingdom, Italy, Ireland, Canada, Switzerland, Austria, France, Germany, Belgium, Finland, Denmark and Norway.

of economic migrants and the total population size across all countries per year. Data was collected from the ILO and population statistics from the OCED.[6]

The second dependent variable *Asylum seekers* is also a relative number; embodying the total *'number of asylum applications in each country and for each year of the data set, relative to the population of each of these countries while controlling for variations in the number of total application and overall population growth across all the OECD countries included in the dataset'* (Thielemann 2008: 454). This variable was provided by Thielemann (2010) and was derived from UNHCR and OECD statistics.[7] Both dependent variables are logarithmised to avoid problems of skewness (see Kohler/Kreuter 2006: 229).[8]

Explanatory variables

The welfare magnet effect is measured by the de-commodification factor; a scale expounded by Esping-Andersen to assess his theory of 'three worlds of welfare capitalism'. This factor 'refers to the degree to which individuals, or families, can uphold a socially acceptable standard of living independently of market participation' (Esping-Andersen 1990: 37). The higher this factor, the higher the state scores on providing welfare provisions. Pensions, unemployment and sick pay compose this complex factor (ibid: 49 - 52).

Scruggs and Allan conducted the de-commodification factor for OECD countries; whereby it ranges from 17 indicating a small and 38 an extensive welfare system.[9] Table 3 shows the scoring and the welfare state category of the independent variable *Welfare* for the 16 countries used in the data set.

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[6] http://laborsta.ilo.org/ (Table M7); http://stats.oecd.org/Index.aspx (country statistical profiles).
In order to account for sample selection of this dependent variable the linear interpolated and extrapolated version is used (see Wooldridge 2003: 310 – 311).
A lack of data is responsible for the fact that it cannot be covered, if the employed migrants belong to outsiders of the EU or if they follow the free movement agreements within the EU. Nevertheless, this bias is not distorting the data because welfare systems are designed to prevent 'welfare shopping' also of nationals from other EU countries (see Brücker et al. 2002: 43).

[7] Thielemann (2010), London School of Economics, http://personal.lse.ac.uk/thielema/.

[8] A formal expression of the coding of both variables is:

$$x = ([a/p] / [A/P])$$

whereby a stands for the absolute number of economic migrants / asylum seekers, b for the population of country y in year t, A for the total number of economic migrants / asylum seekers across all countries in year t and P for the total population across all countries in year t.

[9] Scruggs / Allan (2010), http://www.sp.uconn.edu/~scruggs/wp.htm.

Table 3: De-commodification score and welfare regime typology

Country	De-commodification (mean)	S.D.
Liberal welfare regime:		
United States	18.326	0.385
Australia	18.460	0.297
Japan	21.051	0.584
New Zealand	23.130	1.631
United Kingdom	23.607	0.743
Corporatist welfare regime:		
Italy	24.664	0.937
Ireland	24.825	2.387
Canada	24.581	0.324
Switzerland	27.302	3.959
Austria	28.252	0.673
France	28.956	1.519
Germany	30.130	0.341
Social-democratic welfare regime:		
Belgium	30.184	0.419
Finland	30.461	0.519
Denmark	34.508	0.538
Norway	35.868	1.031

Source: Scruggs / Allan (2010)

Generally, it is assumed in this study that the higher a country scores on the de-commodification factor for the whole population, the higher will be the provisions for forced and economic migrants. The assumption is based on the argument that egalitarian and liberal values in Western democracies prevent modern welfare states from completely excluding certain marginalised groups such as asylum seekers and labour migrants.[10]

In order to assess the different effects of the liberal, corporatist and social-democratic welfare state on forced and voluntary immigration more precisely, three dummy-variables are coded. The three binary variables - *Liberal*, *Corporatist* and *Social-democratic* take the value of '1' if an observation belongs to the respective category, and a '0' if not (for coding see Table 3).

[10] Regrettably, data is not available for narrowly defined target groups. Nevertheless, it is assumed that de-commodificaton factor used in this model does cover more of the welfare state than other approximations, as for example the sole tax level (see Pedersen et al. 2008: 65), general child support and security income (see Borjas 1999: 615 – 616), replacements rates (see DeGiorgi/Pellizzari 2008: 355 – 358), unemployment benefits (see Morissons 2008: 174 – 186), income and social transfers (see Peridy 2006: 4), food support (see Meyer 2000: 14) or social assistance (see Hansen/Lofstrom 1999: 12; Warin/Svaton 2008: 2).

Control variables

The control variables are used to examine commonly known, traditional pull-factors (see Thielemann 2008: 449 - 452). All of those variables have been provided by Thielemann (2010).[11] First, economic pull-factors are represented by data on annual *GDP growth* (%) and annual *Unemployment* (%) figures. Especially, these two variables are incorporated into the model to prevent overestimation of the effect of the different welfare regimes on forced and voluntary migration because the different welfare state types by themselves have different structural demands due to the inherent logic of their systems, a so-called 'endogenous participation bias' (see Meyer 2000: 4 – 9, 30). Second, it is controlled for country's liberal reputation measured in an overseas development aid/GDP ratio; a variable called *Liberalness*. Thirdly, network tie theories are included into the model as well by quantifying the stock of foreign-born population from the top five asylum sending countries. *Network ties* measure a foreign-born/population ratio.[12] Lastly, geographic pull-factors are assessed as well. The average distance between the capital of a destination country and the top five countries of asylum origin are coded in the variable *Geography* (see Thielemann 2008: 454 - 456).

All control variables 'capture' biases within the data, which can be raised by historical path-dependencies such as colonialisation and thus same official languages (France and UK) or strong labour market demands (Germany). Thus, it will be prevented that the measurement of the welfare effect is determined by where humanitarian and labour migrants initially settle (see Zavodny 1999: 1023). In addition, *GDP growth (lag)*, *Unemployment (lag)*, *Liberalness (lag)* and *Network ties (lag)* are lagged by one year because it is realistic to expect that the political, economical and societal shape at t-1 pulled a migrant to move in period t (see Thielemann 2008: 459). Thus, a correlation of the independent and control variables with omitted values due to historical path-dependencies is prevented (Wooldridge 2003: 300). Lastly, *GDP growth (lag ln)*,

[11] Thielemann (2010), London School of Economics, http://personal.lse.ac.uk/thielema/.

[12] Unfortunately, due to a lack of data both variables *Network ties* and *Geography* cannot be coded for economic migrants because for time-series cross-sectional data no data is available about the destination countries of economic migrants. In order to make the models comparable, these two variables are still regressed in both models. It might be assumed that destination countries of asylum seekers and economic migrants could often be the same (see King 2002: 92 – 94). Nevertheless, the interpretation of both variables for economic migrants has to be done with necessary precaution.

Unemployment (lag ln), *Liberalness (lag ln)* and *Network ties (lag ln)* are logarithmised to avoid problems of skewness (see Kohler/Kreuter 2006: 229).

4.2 Statistical method

The two main, classical approaches, which deal with panel data, are fixed- and random-effect models, since their control for time- and unit-specific characteristics. Even if the random-effect model delivers very efficient estimates, the assumptions of random-effect models are very difficult to be fulfilled in political science analysis. For country-level data, it is very likely that variables are correlated with unit-specific effects – in which case the usage of random-effect models is not advisable because unit-specific effects are not randomly and independently distributed (see Dougherty 2007: 412, 418 - 419; Plümper/Troeger 2007: 129; Snijders/Bosker 1999: 43 – 44; Worrall 2007: 236). Fixed-effects models, which add separate intercepts for each country by estimating unit-specific dummy variables, are most likely to account for this unobserved time-invariant unit heterogeneity (see Worrall 2007: 237). This type of model takes into account the variation over time within the units, and not between them (see Dougherty 2007: 412 - 413). In addition to these substantive reasons of applying a fixed-effect model to the data at hand, the Durbin-Wu-Hausman test also supports the application of a fixed-effect model for the data set at hand (see Appendix, Table A.1; Table A.2).

Unfortunately, the main problem of fixed-effect models is that they cannot estimate coefficients for time-invariant or rarely changing variables because they would be perfectly collinear with the dummies for each unit. Thus, the newly proposed 'fixed-effects-vector-decomposition' model *(xtfevd)*, an augmented fixed-effect approach, is used. It can estimate time invariant or nearly time invariant variables. An overview over the within- and between-unit variation shows that dummy variables *Liberal*, *Corporatist* and *Social-democratic*, *Geography*, *Welfare* and *Liberalness (lag ln)* are time-invariant (see Appendix, Table A.3).[13]

[13] (Nearly) time-invariant is identified as those variables in which the between-unit variation is 2.5 times larger than the within-unit variation.

In addition, pooled time-series cross-sectional data suffers from some methodological problems: heteroskedasticity and serial autocorrelation. Firstly, since we look at the same countries at different time points, the observations are likely to be stationary and temporally dependent on each other, a problem called autocorrelation (see Woodridge 2003: 391 – 393). More precisely, this would mean for the data at hand for instance that the welfare spending in year t is very likely to depend on t-5 or even t-10. The usual test for autocorrelation (Durbin-Watson and Breusch-Godfrey Test) can only be applied to time-series and not cross-section data (see Kohler/Kreuter 2006: 233); therefore, an OLS regression for lagged residuals is applied and shows that the model suffers from autorcorrelation (see Appendix, Table A.4). Secondly, heteroskedasticity violates the underlying OLS assumption that the unexplained variance conditional on the explanatory variable is constant across all observations (see Woodridge 2003: 257). For the data used in this study this would mean that heteroskedastic residuals of relative numbers of asylum seekers and labour migrants vary considerably between countries. The Breusch-Pagan Test and the Szroeter-Test demonstrate that the model has heteroskedastic error terms (see Appendix, Table A.5; Table A.6).

Thus, it will be accounted for serial autocorrelation and heteroskedasticity in the applied *xtfevd*-model to the data at hand. Prais-Winsten's estimations for first-order autoregressive disturbance term (AR1) will be employed. Heteroskedasticity is modelled by using robust cluster variance estimators, which assume that the variance of the error term is heteroskedastic across countries and homoskedastic within countries (see Plümper/Troeger 2007: 129).

5. Discussion of the Empirical Results

Empirical results about the overall impact of welfare measured by the de-commodification factor on labour and forced migration are provided in the Table 4 below.[14] *Welfare* has the expected divergent impact on forced and economic migrants. The relative number of asylum seekers raises by 11,9% if the welfare provisions increase by one unit. In contrast, higher welfare provisions have a negative effect on labour migrants. If the social net increases, the relative number of employed migrants declines by 2,06%. In comparison, the effect of welfare is much smaller for economic migrants than for asylum seekers. Nevertheless, both effects are significant on a 99-% level.

Table 4: Welfare magnet effect on asylum seekers and labour migrants

	(1) Asylum seekers (ln)	(2) Economic migrants (ln)
Welfare	0.119***	-0.0206***
	(0.00274)	(0.00336)
GDP growth (lag ln)	0.0462***	0.0690***
	(0.0172)	(0.0194)
Unemployment (lag ln)	-0.0859**	-0.0993***
	(0.0369)	(0.0290)
Network ties (lag ln)	0.134*	-0.0170
	(0.0759)	(0.0674)
Liberalness (lag ln)	-0.528***	-0.241***
	(0.0378)	(0.0460)
Geography	-4.36e-06	2.77e-05***
	(5.07e-06)	(4.51e-06)
Eta	1.014***	1.049***
	(0.0210)	(0.0167)
Constant	-2.693***	0.731***
	(0.101)	(0.136)
R-squared	0.630	0.523
	Standard errors in parentheses	
	*** p<0.01, ** p<0.05, * p<0.1	

[14] All interpretations are given under the 'ceteris-paribus' assumption, which means that all other factors are held constant. Additionally, it is stressed that the correlations found in this dissertation do not say anything about causation between welfare and forced respectively voluntary migration.

The relationship between welfare and forced and voluntary migration is robust to the inclusion of controls. *GDP growth* has a small positive, but highly significant effect on both categories of immigrants. One percent increase on GDP growth (t–1) is associated with higher relative numbers of asylum seekers by 0.046% and of economic migrants by 0.069%. *Unemployment* has a negative effect on both categories of immigrants. The effect is less significant for asylum seekers than for economic migrants. If unemployment (t-1) in destination countries rises, than the relative number of asylum seekers decreases by 0.089% on a 95%-level and the relative number of economic migrants decreases by 0.099% on a 99%-level. *Network ties* only have a positive significant impact on asylum seekers on a 10%-level (0.13%) and no impact on economic migrants. Destination countries' liberalness has a highly significant impact on both dependent variables. The effect is twice as large for asylum seekers than for economic migrants; even if both effects are quite small. If a country's *ODA/GDP ratio* (t–1) increases, then the relative number of asylum seekers decreases by 0.53% and the relative number of economic migrants by 0.24%.[15] The *distance* between destination and the top five sending countries of asylum seekers is only significant for economic migrants on a 99%-level; nevertheless, the effect is very small. The relative number of economic migrants increases by 0.002% if the distance between host and sending countries of asylum seekers increases. It might be argued that this is the case because it is less likely that forced migrants reach the host country, wherefore it is more likely for an economic migrant to receive employment in Western welfare states.

The fraction of variance (R-squared) of the dependent variables explained by the models is relatively satisfying for political science data. 63% of the total variance is explained for the relative number of inflows of asylum seekers into Western welfare states and 52% of the total variability of relative numbers about inflows of employed migrants into Western democracies.

The effects of the different types of welfare states on relative number of asylum seekers and economic migrants are presented in the Table 5 and Table 6 below. The dummy variables *Liberal,*

[15] The negative effect of ODA spending on asylum seekers contradicts the results of Thielemann (2008). This might indicate that the ODA approximation to measure countries liberalness is not sufficient enough. Thielemann suggests that percentage of extreme right wing parties might be a better indicator, which cannot be applied due to a lack of data (ibid: 455). In addition, it might be possible that the effect of countries' liberalness is now captured in the welfare variable; wherefore the sign of the variable changed.

Corporatist and *Social-democratic* are included individually into two models for each dependent variable and without the explanatory variable *welfare* to avoid problems of multi-collinearity.

Table 5: Welfare regime types' effects on asylum seekers

	Asylum seekers (ln)		
VARIABLES	(1) Liberal regime	(2) Corporatist regime	(3) Social-democratic regime
Liberal	-1.601***		
	(0.0156)		
Corporatist		0.113***	
		(0.0277)	
Social-democratic			1.251***
			(0.0213)
GDP growth (lag ln)	0.0472**	0.0473**	0.0470**
	(0.0199)	(0.0193)	(0.0190)
Unemployment (lag ln)	-0.102***	-0.102***	-0.103***
	(0.0347)	(0.0350)	(0.0357)
Network ties (lag ln)	0.104	0.104	0.110
	(0.0749)	(0.0734)	(0.0741)
Liberalness (lag ln)	-0.193***	-0.306***	-0.724***
	(0.0349)	(0.0445)	(0.0400)
Geography	-3.38e-06	-0.000105***	-7.30e-05***
	(4.77e-06)	(4.52e-06)	(4.13e-06)
Eta	1.007***	1.036***	1.030***
	(0.0104)	(0.00810)	(0.0248)
Constant	1.483***	1.406***	0.470***
	(0.0336)	(0.0289)	(0.0483)
R-squared	0.633	0.633	0.633
	Standard errors in parentheses *** p<0.01, ** p<0.05, * p<0.1		

Table 6: Welfare regime types' effects on economic migrants

Economic migrants (ln)			
VARIABLES	(1) Liberal regime	(2) Corporatist regime	(3) Social-democratic regime
Liberal	0.0236		
	(0.0173)		
Corporatist		0.431***	
		(0.0244)	
Social-democratic			-0.467***
			(0.0141)
GDP growth (lag ln)	0.0668***	0.0669***	0.0668***
	(0.0205)	(0.0236)	(0.0213)
Unemployement (lag ln)	-0.129***	-0.130***	-0.130***
	(0.0310)	(0.0247)	(0.0244)
Network ties (lag ln)	-0.0361	-0.0380	-0.0383
	(0.0724)	(0.0615)	(0.0693)
Liberalness (lag ln)	(3.95e-06)	-0.159***	-0.191***
	-0.332***	(0.0482)	(0.0436)
Geography	4.33e-05***	6.15e-05***	3.07e-05***
	(0.0426)	(3.61e-06)	(2.35e-06)
eta	1.013***	1.016***	1.013***
	(0.0109)	(0.0114)	(0.00958)
Constant	0.294***	0.209***	0.656***
	(0.0377)	(0.0314)	(0.0430)
R-squared	0.500	0.500	0.500
Standard errors in parentheses *** p<0.01, ** p<0.05, * p<0.1			

Liberal welfare pulls

The expected relationships of the impact of different welfare regimes on relative numbers of *asylum seekers* in Western democracies are confirmed by the statistical analysis. Liberal welfare regimes have a strong negative impact on asylum applications. The likelihood that an asylum seeker is moving to a liberal welfare state is 1.6 times lower (-160%) than moving to a corporatist

and social-democratic welfare state. This confirms that the low provisions of liberal welfare states do not attract humanitarian migrants (see Table 5).

Table 6 offers the effect of the liberal welfare state on *labour inflows*. Surprisingly, in contrast to the expectations, liberal welfare states do not have an impact on economic migrants at all. This obviously contradicts the widely held assumption that labour migrants prefer market-based, low regulated economies (see Faist 1996: 228, 232). Hence, the empirical analysis does not fit the theoretical assumptions about a strong positive liberal welfare pull for labour migrants. This might indicate that welfare provisions such as unemployment benefits, pensions and sick pay are too marginal, wherefore labour migrants are not significantly attracted by liberal welfare states. In addition, it might be possible to explain this absence of effect by immigration policy factors, which impinge to such an extent on welfare policies that its pulls are suffocated. The UK and Germany might exemplify this by showing that their numbers of labour migrants are very much responsive to their intakes in humanitarian migrants (see Geddes 2000: 134; Martin 2004: 245).

Corporatist welfare pulls

The corporatist welfare state always operates as welfare magnet for asylum seekers and labour migrants. However, the effect is almost four times bigger for economic migrants than for asylum seekers (0.43 to 0.113). In comparison to liberal and social-democratic welfare states, the number of *asylum movements* to corporatist welfare regimes is 11.3% bigger (see Table 5). For *employed migrants* the influence amounts to 43.1% (see Table 6). This confirms that the welfare provisions for asylum seekers and labour migrants in corporatist welfare regimes pull both categories of migrants because they combine a mixture of relatively high provisions with market-based policies.

Why this pull-effect is different to such an extent between humanitarian and voluntary migrants might be explained by the financing the corporatist welfare system. Social assistance depends on length and height of spending, which inherently favours labour migrants much more than asylum seekers because they are working from the beginning and do not have to be encouraged by the state. Secondly, Germany might exemplify that huge intakes of guest-workers reduced highly humanitarian approaches towards asylum seekers, wherefore asylum policy becomes especially ‘liberal’ during the period of asylum adjudication (see Bank 2000: 159, 161; Faist 1996: 235; Menz 2008: 407).

Social-democratic welfare pulls

Lastly, the expected effects for the social-democratic welfare state on forced and voluntary migration are confirmed by the data. More precisely, the expected completely opposite effect that economic migrants are rather deterred while asylum seekers are highly attracted by social-democratic welfare states, can be affirmed by Table 5 and Table 6. Thus, the theoretical argument is approved by the statistical analysis. The likelihood that an *asylum seeker* is migrating to social-democratic welfare states is 1.25 times higher (125%) for social-democratic than for corporatist or liberal welfare states. In contrast, the likelihood that a *labour migrant* is moving to social-democratic regimes is 0.46 times smaller (-46%) for social-democratic than for liberal or corporatist welfare states.

It is often argued that social-democratic regimes intentionally prevent labour immigration from low-income countries in order to tie their high numbers of refugees and impede movements (see Blume et al. 2005: 321). In addition, pushes of labour migrants towards the least attractive labour segments, marginal influences in union politics, marginalized voices in parties and a de-politicization of ethnic organization does make social-democratic welfare state the least appealing for economic migrants (see Schierup 2006: 228). Especially, in comparison to the results for the corporatist welfare state, it seems as if labour migrants are only positively pulled to that threshold which does not privileged domestic workers over migrants even if welfare provisions such as unemployment benefits, sick pay and pensions are rather high in both welfare states.

In the dummy models (see Table 5 and Table 6) the control variables do only show slightly different effects than in the key model (see Table 4).[16] Most interestingly, *distance* now turns to be negatively significant for asylum seekers in the case for the corporatist and social-democratic welfare states. This means that the higher the geographic distance between the host and the destination country, the less likely an asylum application is. However, this effect has to be taken with caution because it might depend on the coding of the variables. By assuming that traditional sending countries are the Middle East and Africa, the distance between traditional sending

[16] The effect of *unemployment* rates (t–1) is more significant than the *GDP growth* (t–1) for the decision of asylum seekers to move to a Western welfare state. Before, it was the other way around. In contrast to the key model, the *network ties* (t–1) effect for humanitarian migrants has vanished in the dummy models. It might be that the effect is now captured by the dummy variables. The effect of countries' *liberal* reputation (t–1) is the same as before for asylum seekers. Contrarily, countries' *liberalness* (t–1) has only left a considerable negative influence on labour migrants, if a state belongs to either corporatist or social-democratic regimes.

countries and liberal welfare states is on average bigger than between sending countries and corporatist respectively social-democratic welfare states.

In summary, the empirical section supports the effect of welfare on forced and voluntary migration. Welfare can be evaluated as an important signal for migration, especially because its effect is robust to the included controls (economic, societal, political and geographical pull-factors). In addition, *robustness checks* do indicate that outliers in intakes such as Germany for guest-workers or the United Kingdom for asylum seekers do not distort the data (see Appendix, Table A.7; Table A.8). Sensitivity analysis for the model selection shows that the same results are also found with other models (see Appendix, Table A.9; Table A.10). Furthermore, the models do not suffer from multi-collinearity (see Appendix, Table A.11; Table A.12) or omitted variables bias (see Appendix, Table A.13).[17]

[17] Nevertheless, the relationships between welfare and forced and voluntary forms of immigration should not be overestimated. Both, labour and forced migrants, have already made an investment with migrating to the Western world, therefore the additional cost on choosing the destination country based on welfare considerations might be comparatively small (see Borjas 1999: 614).

6. Conclusion

This dissertation has explained magnet effects of welfare on humanitarian and labour migration. It has been questioned whether migrants are looking for a safety net as political elites and the public currently fear. Furthermore, it has been argued that asylum seekers are positively attracted by welfare because they depend on the welfare system by being usually unemployed after their arrival. Moreover, it has been contend that high levels of welfare provisions deter economic migrants because less market-efficiency, high levels of unionisation and labour regulations prevent labour migrants from moving.

The cross-sectional time-series analysis at hand has confirmed that welfare is an important magnet for potential immigrants. This factor has been ignored for too long and should be appended to the traditional push- and pull model of Lee (1966). In addition to already known pull-factors such as political, geographical, economic and societal ones, welfare provisions can help to explain variances in inflows of labour and asylum migrants to the Western world.

Furthermore, it has been investigated in this paper for the first time whether the three welfare regimes – the liberal, corporatist and social-democratic – pull forced and voluntary migration in different ways. Firstly, it has been argued that asylum seekers are mostly appealed by *social-democratic* welfare states because of its high level of welfare provisions. In contrast, labour migrants are rather deterred by this type of welfare regime because the protection of domestic workers and labour markets in social-democratic welfare regimes keep off labour migrants from finding a niche in this labour markets, even a if sick pay, unemployment benefits and pensions are outstandingly high. Both effects have been confirmed by the statistical analysis.

Secondly, the effect of the *corporatist* welfare state has been assessed. It has been claimed that both types of immigrants are positively attracted by this welfare regime because relative high welfare provision and at the same time market-based policies have a favourable mixture for humanitarian as well as labour migrants. This effect has also been proven in the data procedure. More precisely, the corporatist welfare state pulls more labour migrants than asylum seekers, because level and height of contributions are decisive for benefits, wherefore labour migrants can achieve more in this welfare state because they are assumingly employed immediately after their arrival.

Thirdly, the *liberal* welfare regime has shown the most surprising results. It has been suggested that this type of welfare regimes has a strong positive effect for economic migrants because their market affinity does endorse labour migration. Astonishingly, the liberal welfare state does not have an impact on economic migrants at all. This is evidence against the widely held assumption that market-based, low unionised and regulated economies are the most attractive for labour migrants. It might be that welfare provisions like unemployment benefits, pensions and sick pay are too marginal in liberal welfare states to significantly attract labour migrants. But, as expected, the effect of the liberal welfare state on asylum seekers is negative based on the argument that low welfare provisions deter humanitarian migrants.

There are two main policy implications for the present findings: firstly, the inefficiency of immigration control policies might be explained by a further pull-factor – welfare provisions. Policy-makers could use modifications in labour market regulations and welfare provisions to attract or deter immigrants, especially in times of strongly competing labour markets in the Western world, in which demands for low- and high-skilled migrants are constantly raising. Secondly, in doing so, politicians concerned with immigration policies should apply the inroads given in this paper regarding strongly heterogeneous preferences of labour and asylum migrants towards different welfare regime types. Social-democratic, corporatist and liberal welfare states would need different policies, which questions possible effectiveness of a harmonisation of immigration policies the European Union.

Nevertheless, further investigation is needed in this research area because skill-levels and time-effects could not be assessed in this dissertation. On the one hand, it is standing to reason that different welfare state types have incongruent pull-effects on unlike skill-levels of economic and forced migrants. For example, low-skilled migrants may be more attracted by welfare generosity because they contribute less to the system than what they gain. This factor by itself must deter highly skilled migrants vice versa (see Cohen/Razin 2008: 23 – 25). In addition, this effect becomes highly interesting with regards to tax burdens in the different welfare clusters (see Esping-Andersen 1990: 177). On the other hand, the three welfare types can have different effects in the short and in the long run. For instance, the earning-related benefits in the corporatist welfare states must theoretically have less attraction of forced and economic migrants than the

means-tested provision of the liberal welfare state in the short run, although this effects must reverse in the long run (see Morissens 2008: 173 – 174, 180 – 181). In addition, it would be very enriching to apply micro-level data to this research area, which would not only detect if immigrants are attracted by welfare, but also, if immigrants use these benefits in the end and if their expectations are met (see Warin/Svaton 2008: 14).

Bibliography

Andall, J. 2008: Migration mobility in European diasporic space, p. 274 – 297 in: C. A. Parsons / T. M. Smeeding (eds.), Immigration and Transformation of Europe. Cambridge: University Press.

Bank, R. 2000: Europeanising the reception of asylum seekers, The opposite of welfare state politics, p. 148 – 169 in: M. Bommes / A. Geddes (eds.), Immigration and Welfare. Challenging the borders of the welfare state. London: Routledge.

Blume, K. / Gustafsson, B. / Pedersen, P. J. / Verner, M. 2005: A Tale of Two Countries: Poverty and Income Distribution Among Immigrants in Denmark and Sweden Since 1984, p. 317 – 340 in: G. J. Borjas / J. Crisp (eds.), Poverty, International Migration and Asylum. Basingstoke: Palgrave Macmillan.

Bommes, M. 2000: National welfare state, biography and migration, Labour migrants, ethnic Germans and the re-ascription of welfare state membership, p. 90 – 198 in: M. Bommes / A. Geddes (eds.), Immigration and Welfare. Challenging the borders of the welfare state. London: Routledge.

Bommes, M. / Geddes, A. 2000: Introduction: immigration and the welfare state, p. 1 – 12 in: M. Bommes / A. Geddes (eds.), Immigration and Welfare. Challenging the borders of the welfare state. London: Routledge.

Böcker, A. / Havinga. T. 1998: Asylum Migration to the European Union: Patterns of origin and destination. Luxembourg: Office for Official Publications of the European Communities.

Borjas, G. J. 1999: Immigration and Welfare Magnets. Journal of Labor Economics, Vol. 17 (4): 607 – 637.

Brücker, H. / Epstein, G. S. / McCormick, B. / Saint-Paul, G. / Venturini, A. / Zimmermann, K. 2002: Managing Migration in the European Welfare State, p. 1 – 167 in: T. Boeri / G. Hanson / B. McCormick (eds.), Immigration Policy and the Welfare System, A Report for the Fondazione Rudolfo Debenedetti. Oxford: University Press.

Castles, S. 2006: Guestworkers in Europe: A Resurrection? International Migration Review, Vol. 40 (4): 741-766.

Castles, S. / Loughna, S. 2005: Trends in Asylum Migration to Industrialized Countries, 1990 – 2001, p. 39 – 69 in: G. J. Borjas / J. Crisp (eds.), Poverty, International Migration and Asylum. Basingstoke: Palgrave Macmillan.

Cohen, A. / Razin, A. 2008: The Skill Composition of Immigrants and the Generosity of the Welfare State: Free vs. Policy-Controlled Migration. NBER Working Paper No. 14459. Cambridge.

Czaika, M. 2009: The Political Economy of Refugee Migration and Foreign Aid. Basingstoke: Palgrave Macmillan.

Dougherty, C. 2007: Introduction into Econometrics. Oxford: University Press (3rd edition).

Düvell, F. / Jordan, B. 2002: Immigration, asylum and welfare: the European context. Critical Social Policy, Vol. 22 (3): 498 – 517.

DW-World, 2010: Germany set to block new European Union asylum policy, http://www.dw-world.de/dw/article/0,,5807423,00.html.

Esping-Andersen, G. 1990: The Three Worlds of Welfare Capitalism. Cambridge: Polity Press.

Faist, T. 1996: Immigration, Integration, and the Welfare State: Germany and the USA in a Comparative Perspective, p. 227 – 258 in: R. Bauboeck / A. Heller / A. R. Zolberg (eds.), The Challenge of Diversity, Integration and Pluralism in Societies of Immigration. Aldershot: Avebury.

Fix, M. E. / Capps, R. / Kaushal, N. 2009: Immigrants and Welfare: Overview, p. 1 – 36 in: M. E. Fix (ed.), Immigrants and Welfare, The Impact of Welfare Reform on America's Newcomers. New York: Russel Sage Foundation.

Geddes, A. 2000: Denying access, Asylum seekers and welfare benefits in the UK, p. 134 – 146 in: M. Bommes / A. Geddes (eds.), Immigration and Welfare, Challenging the borders of the welfare state. New York: Routledge.

Geddes, B. 1990: How the Cases You Choose Affect the Answers You Get: Selection Bias in Comparative Politics. Political Analysis, Vol. 2 (1): 131 - 150.

Gelbach, J. B. 2004: Migration, the Life Cycle, and State Benefits: How Low Is the Bottom? Journal of Political Economy, Vol. 112 (5): 1091 – 1130).

Gibney, M. J. 2004: The ethics and politics of asylum: liberal democracy and the response to refugees. Cambridge: University Press.

Giorgi De, G. / Pellizzari, M. 2008: Welfare migration in Europe. Labour Economics, Vol. 16: 353 – 363.

Guiraudon, V. 2000: The Marshallian triptych reordered, the role of courts and bureaucracies in furthering migrants' social rights, p. 72 – 89 in: M. Bommes / A. Geddes (eds.), Immigration and Welfare, Challenging the borders of the welfare state. New York: Routledge.

Hansen, J. / Lofstrom, M. 1999: Immigration Assimilation and Welfare Participation: Do Immigrants Assimilate Into our Out-of Welfare. IZA Discussion Paper, No. 100.

Hjarno, J. 2003: Illegal Immigrants and Developments in Employment in the Labour Markets of the EU. Aldershot: Ashgate.

King, R. 2002: Towards a New Map of European Migration. International Journal of Population Geography, Vol. 8: 89 – 106.

Kohler, U. / Kreuter, F. 2006: Datenanalyse mit Stata. München: Oldenbourg Verlag.

Lee, E. S. 1966: A Theory of Migration. Demography, Vol. 3 (1): 47 – 57.

Martin, P. L. 2004: Germany: Managing Migration in the Twenty-First Century, p. 220 – 253 in: W. A. Cornelius / T. Tsuda / P. L. Martin / J. F. Hollifield (eds.), Controlling Immigration, A Global Perspective. Stanford: University Press.

Massey, D. S. / Arango, J. / Hugo, G. / Kouaouci, A. / Pellegrino, A. / Taylor, J. E. 1993: Theories of International Migration. A Review and Appraisal, Population and Development Review, Vol. 19 (3): 431 – 466.

Menz, G. 2008: "Useful" Gastarbeiter, burdensome asylum seekers, and the second wave of welfare retrenchment: Exploring the nexus between migration and the welfare state, p. 393 – 418 in: C. A. Parsons / T. M. Smeeding (eds.), Immigration and Transformation of Europe. Cambridge: University Press.

Meyer, B. D. 2000: Do the Poor Move to receive Higher Welfare Benefits? NBER Working Paper. Chicago.

Morrissens, A. 2008: Immigrants, unemployment and Europe's varying welfare regimes, p. 172 – 199 in: C. A. Parsons / T. M. Smeeding (eds.), Immigration and Transformation of Europe. Cambridge: University Press.

Pedersen, P. J. / Pytlikova, M. / Smith, N. 2008: Migration into OECD countries 1990 – 2000, p. 43 – 84 in: C. A. Parsons / T. M. Smeeding (eds.), Immigration and Transformation of Europe. Cambridge: University Press.

Peridy, N. 2006: The European Union and its new neighbours: an estimation of migration potentials. Economics Bulletin, Vol. 6 (2): 1 – 11.

Plümper, T. / Troeger, V. E. 2007: Efficient Estimation of Time-Invariant and Rarely Changing Variables in Finite Sample Panel Analyses with Unit Fixed Effects. Political Analysis, Vol. 15 (2): 124 – 139.

Robinson, V. / Segrott, J. 2002: Understanding the decision-making of asylum seekers. UK Home Office, Findings 172. London: Home Office.

Ruhs, M. / Martin, P. 2008: Numbers vs. Rights: Trade-Offs and Guest Worker Programs. International Migration Review, Vol. 42 (1): 249 – 265.

Sainsbury, D. 2006: Immigrants' social rights in comparative perspective: welfare regimes, forms of immigration and immigration policy regimes. Journal of European Social Policy, Vol. 16 (3): 229 – 244.

Schierup, C.-U. / Hansen, P. / Castles, S. 2006: Migration, Citizenship, and the European Welfare State. Oxford: University Press.

SOPEMI, 2002: Trends in International Migration. OECD Emerging Economies. Paris: OECD.

Snijders, T. A. B / Bosker, R. J. 1999: Multilevel analysis: an introduction to basic and advanced multilevel modelling. London: SAGE publications.

Thielemann, E. 2008: The effectiveness of governments' attempts to control unwanted migration, p. 442 – 472 in: C. A. Parsons / T. M. Smeeding (eds.), Immigration and Transformation of Europe. Cambridge: University Press.

Warin, T. / Svaton, P. 2008: European Migration: Welfare Migration or Economic Migration? Global Economy Journal, Vol. 8 (3): 1 – 30.

Woodridge, J. M. 2003: Introductory Econometrics, A Modern Approach. Mason: Thompson South-Western.

Worrall, J. L. 2007: An introduction to pooling cross-sectional and time series data, p. 233 – 248 in: E. S. Menard (ed.), Handbook of Longitudinal Research: Design, Measurement and Analysis. Burlington: Elsevier Press.

Zavodny, M. 1999: Determinants of Recent Immigrants' Locational Choice. International Migration Review, Vol. 33 (4): 1014 – 1030.

Appendix

Table A.1: Durbin-Wu-Hausman test for Asylum seekers (ln)

	---- Coefficients ----			
	(b) fixed	(B) random	(b-B) Difference	sqrt(diag(V_b-V_B)) S.E.
Welfare	.0197422	.0903092	-.070567	.0406126
GDP growth (lag ln)	.036425	.0471786	-.0107536	.
Unemployment (lag ln)	-.1195892	-.0277413	-.0918479	.0302709
Liberalness (lag ln)	-.0146691	-.034206	.0195369	.0633559
Network Ties (lag ln)	.0221603	.3215911	-.2994308	.0865893
Geography	-.0000244	-.0000291	4.74e-06	.0000593

b = consistent under Ho and Ha; obtained from xtreg
B = inconsistent under Ha, efficient under Ho; obtained from xtreg

Test: Ho: difference in coefficients not systematic

chi2(6) = (b-B)'[(V_b-V_B)^(-1)](b-B)
= 16.52
Prob>chi2 = 0.0112
(V_b-V_B is not positive definite)

Table A.2: Durbin-Wu-Hausman test for Economic migrants (ln)

	---- Coefficients ---- (b) fixed	(B) random	(b-B) Difference	sqrt(diag(V_b-V_B)) S.E.
Welfare	.1204154	-.005017	.1254324	.0391096
GDP growth (lag ln)	.0709458	.0557193	.0152265	.
Unemployment (lag ln)	-.0669761	-.15196	.0849839	.0286228
Liberalness (lag ln)	.0019287	-.0753957	.0773244	.0553487
Network Ties (lag ln)	-.0301073	-.0116337	-.0184736	.082305
Geography	5.83e-06	.0000314	-.0000256	.0000568

b = consistent under Ho and Ha; obtained from xtreg
B = inconsistent under Ha, efficient under Ho; obtained from xtreg

Test: Ho: difference in coefficients not systematic

chi2(6) = (b-B)'[(V_b-V_B)^(-1)](b-B)
= 15.34
Prob>chi2 = 0.0178
(V_b-V_B is not positive definite)

Table A.3: Summary statistics of dependent and independent variables with between and within variation

Variable		Mean	Std. Dev.	Min	Max	N
Asylum seekers (ln)	overall	0.063	2.129353	-7.119457	3.999997	278
	between		2.010599	-5.816989	2.53005	
	within		0.7712662	-5.930666	2.532409	
Economic migrants (ln)	overall	0.067	1.038268	-2.35692	3.008204	250
	between		0.7530225	-0.8605557	1.754428	
	within		0.7574591	-1.47022	2.208561	
Welfare	overall	26.519	5.156211	17.7872	37.252	288
	between		5.130212	18.32675	35.86833	
	within		1.351444	21.00222	31.49779	
GDP growth (lag ln)	overall	2.662	1.66843	-2.3	7	247
	between		0.8777021	1.5875	5.414286	
	within		1.516381	-2.512652	6.456098	
Unemployment (lag ln)	overall	7.767	3.314488	0.5	16.4	250
	between		3.035545	2.49375	12.87273	
	within		1.633998	1.394473	11.6297	
Liberalness (lag ln)	overall	-1.082	0.7108804	-4.389589	0.6095932	243
	between		0.9281481	-4.170097	-0.002244	
	within		0.3704742	-2.311395	0.1501212	
Network ties (lag ln)	overall	2.191	1.692409	-3.451819	6.225483	195
	between		1.636649	-1.323111	4.067436	
	within		0.6077084	0.0594802	4.34914	
Geography	overall	5107.802	3035.235	1670.8	17605	256
	between		3007.374	2929.25	13511.01	
	within		836.8807	2041.389	9201.789	
Liberal	overall	0.312	0.4643192	0	1	288
	between		0.4787136	0	1	
	within		0	0.3125	0.3125	
Corporatist	overall	0.437	0.4969419	0	1	288
	between		0.5123475	0	1	
	within		0	0.4375	0.4375	
Social-democratic	overall	0.25	0.4337664	0	1	288
	between		0.4472136	0	1	
	within		0	0.25	0.25	

Table A.4: Lagged-residual test for autocorrelation

Economic Migrants (ln)			**Asylum seekers (ln)**	
	Coef.	**P>|t|**	**Coef.**	**P>|t|**
L.	0.344	0.000	0.186	0.020
Welfare	0.008	0.617	-0.011	0.513
GDP growth (lag ln)	0.001	0.975	0.007	0.865
Unemployment (lag ln)	0.007	0.730	-0.003	0.887
Liberalness (lag ln)	-0.208	0.730	-0.119	0.474
Network ties (lag ln)	-0.002	0.959	.0003	0.942
Geography	0.000	0.563	2.310	0.937

Table A.5: Breusch-Pagan test for heteroskedasticity

Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
Ho: Constant variance
Variables: fitted values of Asylum seekers (ln)

chi2(1) = 11.78
Prob > chi2 = 0.0006

Table A.6: Szroeter-test for heteroskedasticity

Szroeter's test for homoskedasticity

Ho: variance constant
Ha: variance monotonic in variable

Variable	chi2	df	p
Welfare	7.65	1	0.0057 #
GDP growth (lag ln)	3.20	1	0.0738 #
Unemployment (lag ln)	0.10	1	0.7473 #
Liberalness (lag ln)	5.30	1	0.0214 #
Network ties (lag ln)	6.91	1	0.0086 #
Geography	6.87	1	0.0088 #

unadjusted p-values

Table A.7: Leverage-versus-squared-residual plot for outliers (Asylum seekers (ln))

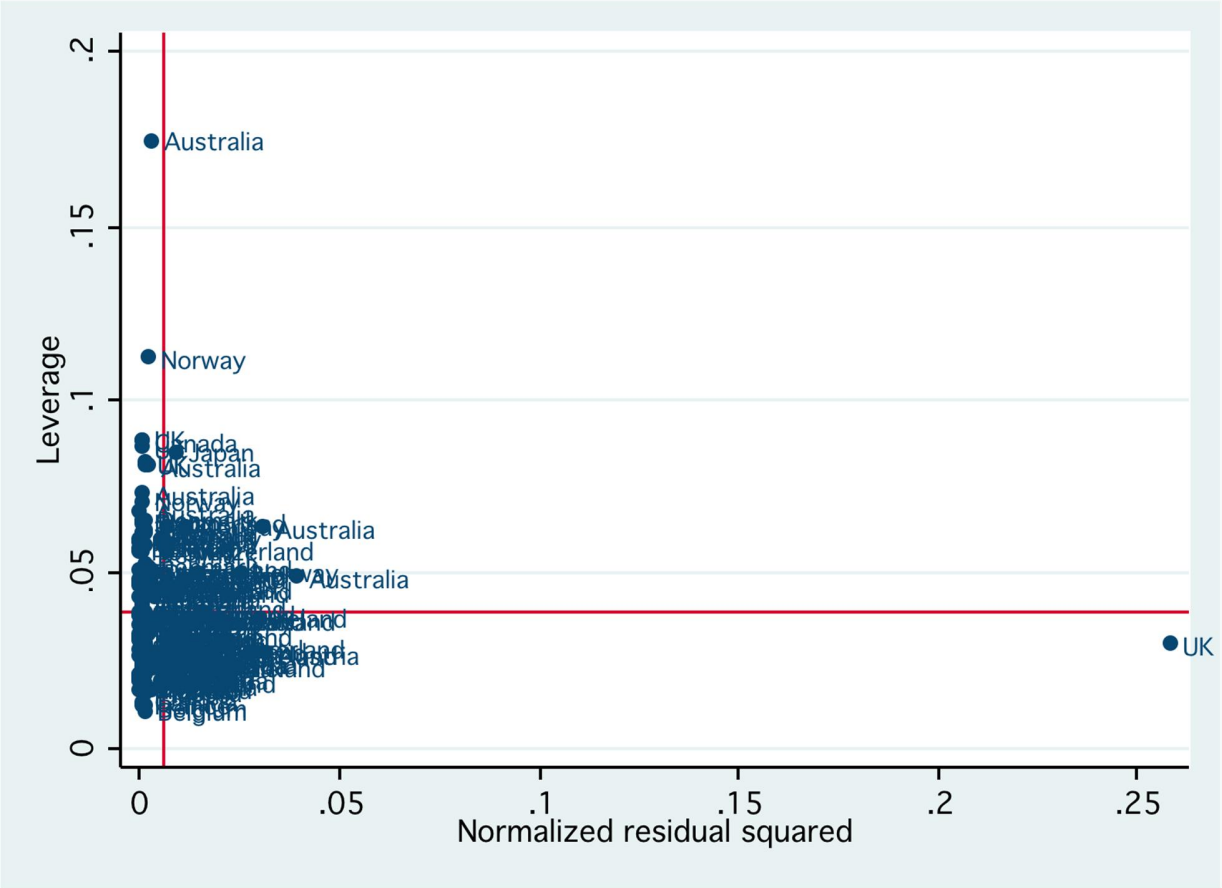

Table A.8: Residual-versus-fitted plot for outliers (Economic migrants (ln))

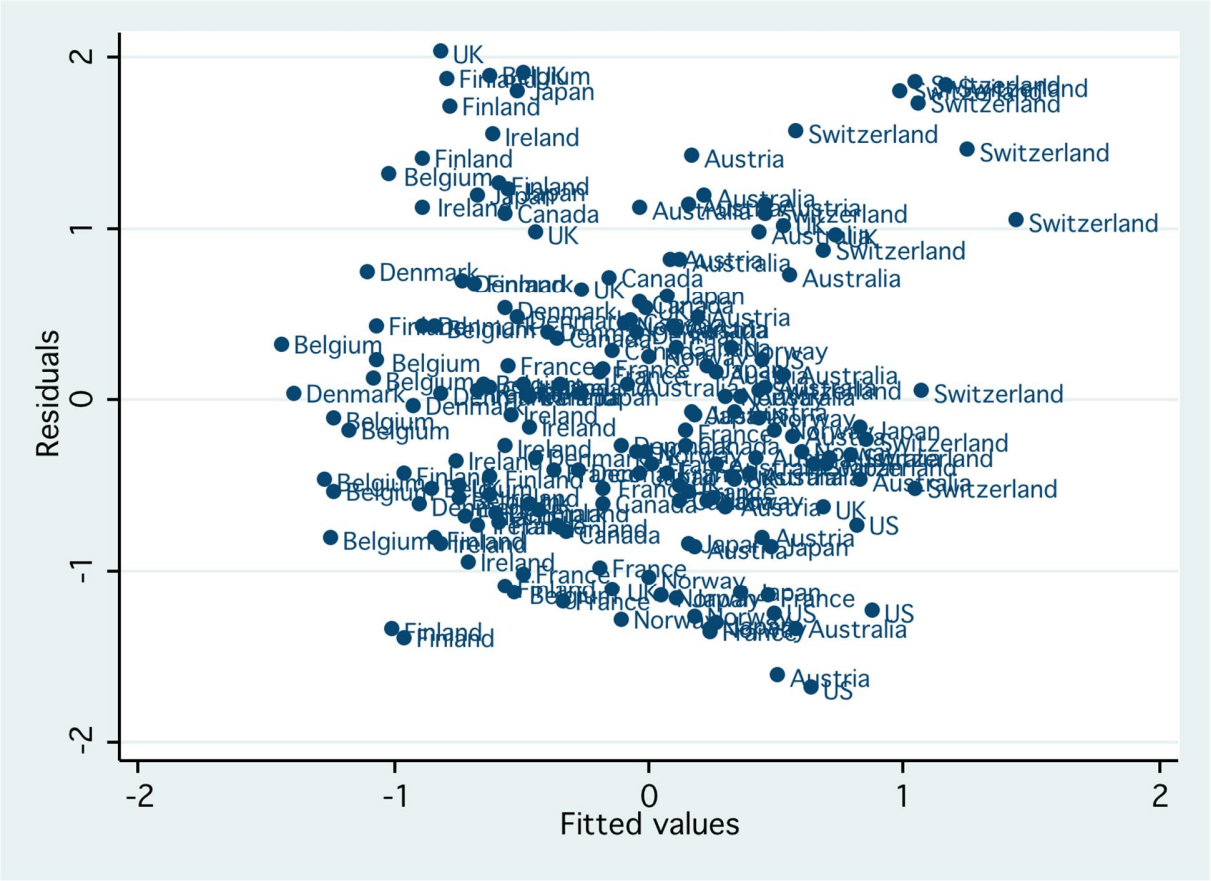

Table A.9: Panel-corrected standard-error model

VARIABLES	(1) Asylum seekers (ln)	(2) Economic Migrants (ln)
Welfare	0.0870***	-0.0308*
	(0.0226)	(0.0172)
GDP growth (lag ln)	0.0470	0.0376
	(0.0463)	(0.0432)
Unemployment (lag ln)	-0.00794	-0.186***
	(0.0356)	(0.0264)
Liberalness (lag ln)	0.0297	-0.146
	(0.140)	(0.134)
Network ties (lag ln)	0.354***	0.00483
	(0.116)	(0.0554)
Geography	-5.05e-05	1.53e-05
	(4.53e-05)	(2.59e-05)
Constant	-2.108**	1.921***
	(0.887)	(0.644)
R-squared	0.253	0.277
Standard errors in parentheses *** p<0.01, ** p<0.05, * p<0.1		

Table A.10: GLS-Random effect model

VARIABLES	(1) Asylum seekers (ln)	(2) Economic migrants (ln)
Welfare	0.0898***	-0.0139
	(0.0238)	(0.0227)
GDP growth (lag ln)	0.0471	0.0535
	(0.0446)	(0.0428)
Unemployment (lag ln)	-0.0189	-0.160***
	(0.0309)	(0.0290)
Liberalness (lag ln)	-0.00844	-0.0915
	(0.152)	(0.149)
Network ties (lag ln)	0.342***	-0.00690
	(0.0644)	(0.0616)
Geography	-3.49e-05	2.28e-05
	(3.80e-05)	(3.62e-05)
Constant	-2.219***	1.235
	(0.831)	(0.794)
Standard errors in parentheses *** p<0.01, ** p<0.05, * p<0.1		

Table A.11: Variance-Inflation tests for multi-collinearity in the key model

Asylum seekers (ln)

Variable	VIF	1/VIF
Welfare	1.70	0.589207
Geography	1.45	0.689832
Liberalness (lag ln)	1.41	0.710402
Network ties (lag ln)	1.38	0.727215
GDP growth (lag ln)	1.11	0.899665
Unemployment (lag ln)	1.03	0.969554
Mean VIF	1.35	

Economic migrants (ln)

Variable	VIF	1/VIF
Welfare	1.77	0.565800
Distance	1.53	0.655085
Liberalness (lag ln)	1.39	0.721695
Network ties (lag ln)	1.37	0.731429
GDP growth (lag ln)	1.13	0.887891
Unemployment (lag ln)	1.03	0.969684
Mean VIF	1.37	

Table A.12: Variance-Inflation Test for multi-collinearity for dummy models

Asylum seekers (ln)

Variable	VIF	1/VIF
Liberal	2.39	0.418462
Network ties (lag ln)	2.26	0.442844
Distance	1.40	0.712307
Liberalness (lag ln)	1.29	0.772408
GDP growth (lag ln)	1.11	0.899149
Unemployment (lag ln)	1.05	0.952806
Mean VIF	1.58	

Variable	VIF	1/VIF
Corporatist	1.65	0.606242
Network ties (lag ln)	1.46	0.684555
Liberalness (lag ln)	1.39	0.719097
Distance	1.18	0.844455
Unemployment (lag ln)	1.12	0.892725
GDP growth (lag ln)	1.11	0.899889
Mean VIF	1.32	

Variable	VIF	1/VIF
Liberal	2.39	0.418462
Network ties (lag ln)	2.26	0.442844
Distance	1.40	0.712307
Liberalness (lag ln)	1.29	0.772408
GDP growth (lag ln)	1.11	0.899149
Unemployment (lag ln)	1.05	0.952806
Mean VIF	1.58	

Economic migrants (ln)

Variable	VIF	1/VIF
Liberal	2.47	0.405538
Network ties (lag ln)	2.22	0.449892
Distance	1.50	0.667371
Liberalness (lag ln)	1.27	0.786384
GDP growth (lag ln)	1.13	0.887375
Unemployment (lag ln)	1.05	0.953189
Mean VIF	1.61	

Variable	VIF	1/VIF
Corporatist	1.66	0.601126
Network ties (lag ln)	1.45	0.688465
Liberalness (lag ln)	1.38	0.726458
Distance	1.20	0.834641
GDP growth (lag ln)	1.13	0.888051
Unemployment (lag ln)	1.12	0.893150
Mean VIF	1.32	

Variable	VIF	1/VIF
Liberalness (lag ln)	1.52	0.659975
Social-democratic	1.44	0.695251
Network ties (lag ln)	1.24	0.807689
Unemployment (lag ln)	1.18	0.844700
Distance	1.18	0.849078
GDP growth (lag ln)	1.13	0.887803
Mean VIF	1.28	

Table A.13: Ramsey RESET test for omitted variables bias

Ramsey RESET test using powers of the fitted values of Asylum seekers (ln)
Ho: model has no omitted variables
F(3, 169) = 2.26
Prob > F = 0.0835

Ramsey RESET test using powers of the fitted values of Economic Migrants (ln)
Ho: model has no omitted variables
F(3, 172) = 5.55
Prob > F = 0.0012