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DEMIFER
Demographic and migratory flows affecting European regions and cities

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Demifer Case Studies

Euro Standard in München and its region Oberbayern (DE21)

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Key findings

- *In the Munich area internal migration flows play today a minor role*
- *Economic effects of the ageing of the population are not felt in Oberbayern. Or they are positively felt through selective in-flows of elderly (retirement migration) in the attractive areas of the Pre-Alps.*
- *Labour force deficits and effects of the ageing of the working age population are not felt in Oberbayern. This well-off region has no difficulty to attract as many migrants as the local labour market needs.*
- *The city and county of München is linked to its region to considerable commuter flows. These flows are increasing because of the migration flows from the centre to the suburban area. München as an engine of positive population change in its region.*
- *The results of the policy scenarios indicate a continuous population growth in Oberbayern. This seems to make Oberbayern an area that does not have to reflect about its demographic future.*

1. Introduction

Oberbayern is the largest, most populous (4,335,000 inhabitants) and most densely populated (247 inhabitants per km^2) Regierungsbezirk of the Land Bayern. It comprises the urban centres of München (with 1,327,000 inhabitants end of 2008 the 3rd largest city of Germany), Ingolstadt (124,000 inh.), Rosenheim (61,000 inh.) and Freising (46,000 inh.). It is, after the city-state of Hamburg, the NUTS 2 region with the second highest regional GDP per inhabitant (purchasing power standard) in Germany: 41,000 €, 64.7 % above the EU27 average (2007).

The economic and industrial structure of Oberbayern is characterised today by the major industries in the areas of München (the automotive sector with BMW, Knorr-Bremse and MAN, technology with Siemens, Linde and Infineon, software with Microsoft, bank and insurance sector with Allianz, Münchner Rück-Munich Re, print media and television, armament, breweries and biotechnology), Ingolstadt (Audi and EADS, and the Petroplus and Bayernoil refineries in the vicinity) and around … (the Bavarian chemical triangle in the counties of Altötting, Mühldorf and Traunstein close to the Austrian border (Wacker Chemie in Burghausen). Small industries play a major role in the economic structure of the region. München is also an administrative centre and the state capital of Bavaria, as well as the location of national and international institutions (European Patent Office). The tourism industry is of major importance in München, the Bavarian Pre-alps with major lakes and the Bavarian Alps.

Several Universities and Universities of Applied Sciences and Arts and several research institutes of the Max-Planck Society for the Advancement of Science (Max-Planck-Gesellschaft) and the Fraunhofer Society (Fraunhofer Gesellschaft), including the headquarters of both institutions reside in München.

Over the last decades the city of München did not change only regarding its economic role, but through the organisation of and as a state capital with the opening of a new airport and the transformation of the old airport in fair grounds and a public park, where the Bundesgartenschau – the German horticultural exhibition – was staged in 2005. But the staging of the Olympic games in 1972 was the event that most changed the city: improvements in local public

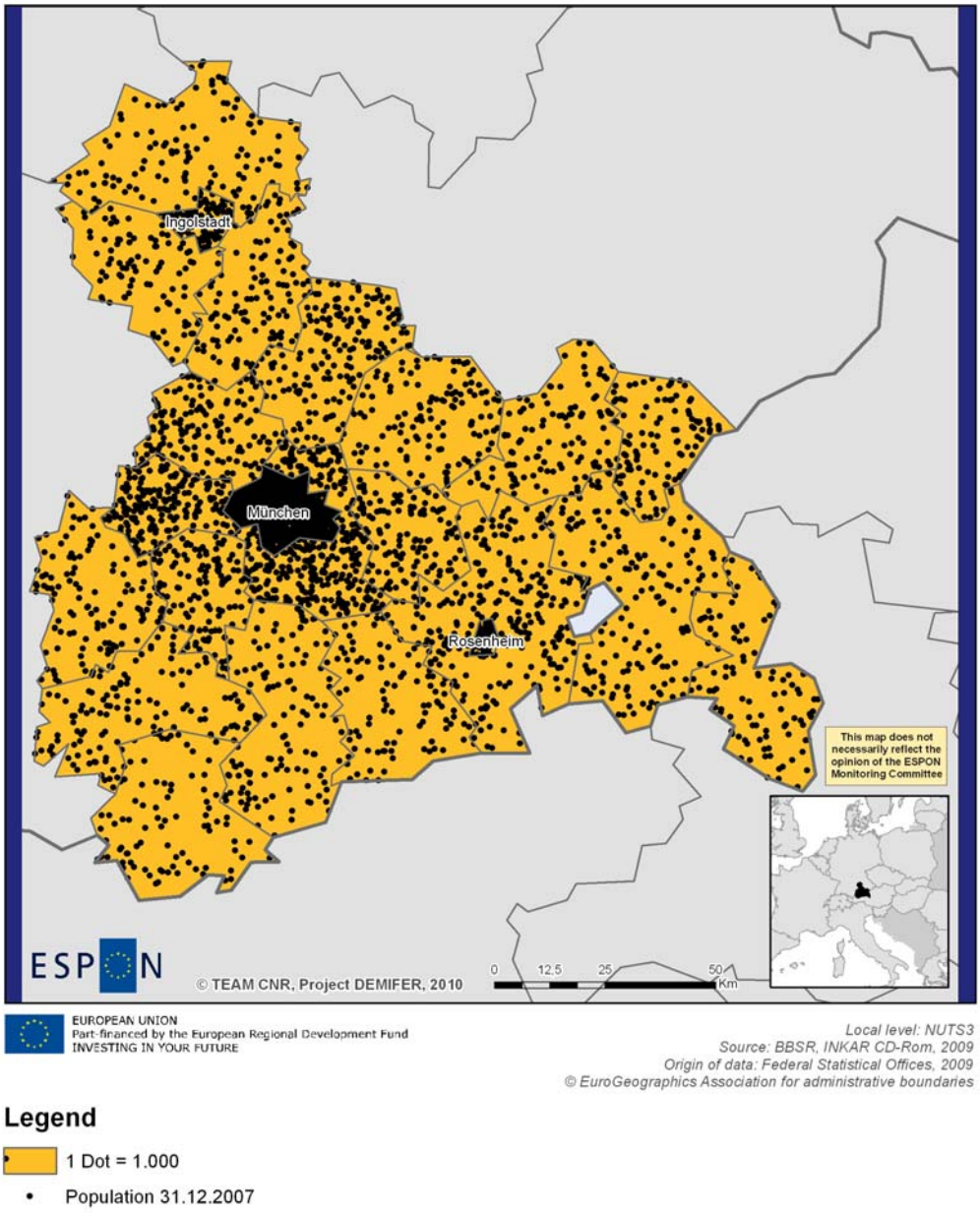
transportation and the creation of a pedestrian area in the city centre. Since the turn of the century several new high-rise office buildings were constructed.
The city of Müchen and its hinterland is well connected by air, rail and road.
The story to be told: a region of success. In the 19th century Bavaria and especially the study area Oberbayern developed from an agrarian state to a modern industrial state. During transition from agriculture to industry and manufacturing part-time farming had and still has today an important role in maintaining agricultural production and the landscape. In Bavaria most farms are run as part-time farms (55 % in 2003), however they are cultivating only 30 % of the agricultural surface (2003). The average farm size for full time farmers was 35.9 ha in 2003 and 12.0 ha for part-time farmers.

1.1. Specification of the research questions and the aims

The case studies contribute to improve the knowledge on and the understanding of demographic and migratory flows at the regional and local level. They focus on internal and international migration as the component with stronger links to the regional socio-economic situation and dynamics. In addition in the case studies the output of the policy oriented activities of the DEMIFER project are translated into specific regional settings.
The specific research questions and the specific aims of the case studies are:
- How are demographic and migratory flows affecting the entire case study area, its regional subdivisions and its cities?
- How do demographic change and migratory movements bring about population change – growth or decline -, population ageing and ageing of the working age population?
- What are the factors of attraction or the causes of interregional and international migration at the regional level?
- Is information regarding the skill level of interregional, intra EU and international migrants available?
- What are the economic and social consequences of migratory flows in the case study area, or, more in general, what are the links between ‘demography’ and ‘economy’ in the case study areas?
The interrelations between socio-economic and demographic trends are the focus of the case studies. The focus of the case studies is on the description of the socio-demographic structure, demographic and interregional and international migratory processes and their economic and social consequences. The sustainability of the demographic system and the migration process – migration gains and migration losses - at the sub-regional level will be considered in all case studies. The interdependence in the urban areas and between the urban areas and their hinterland is highlighted.

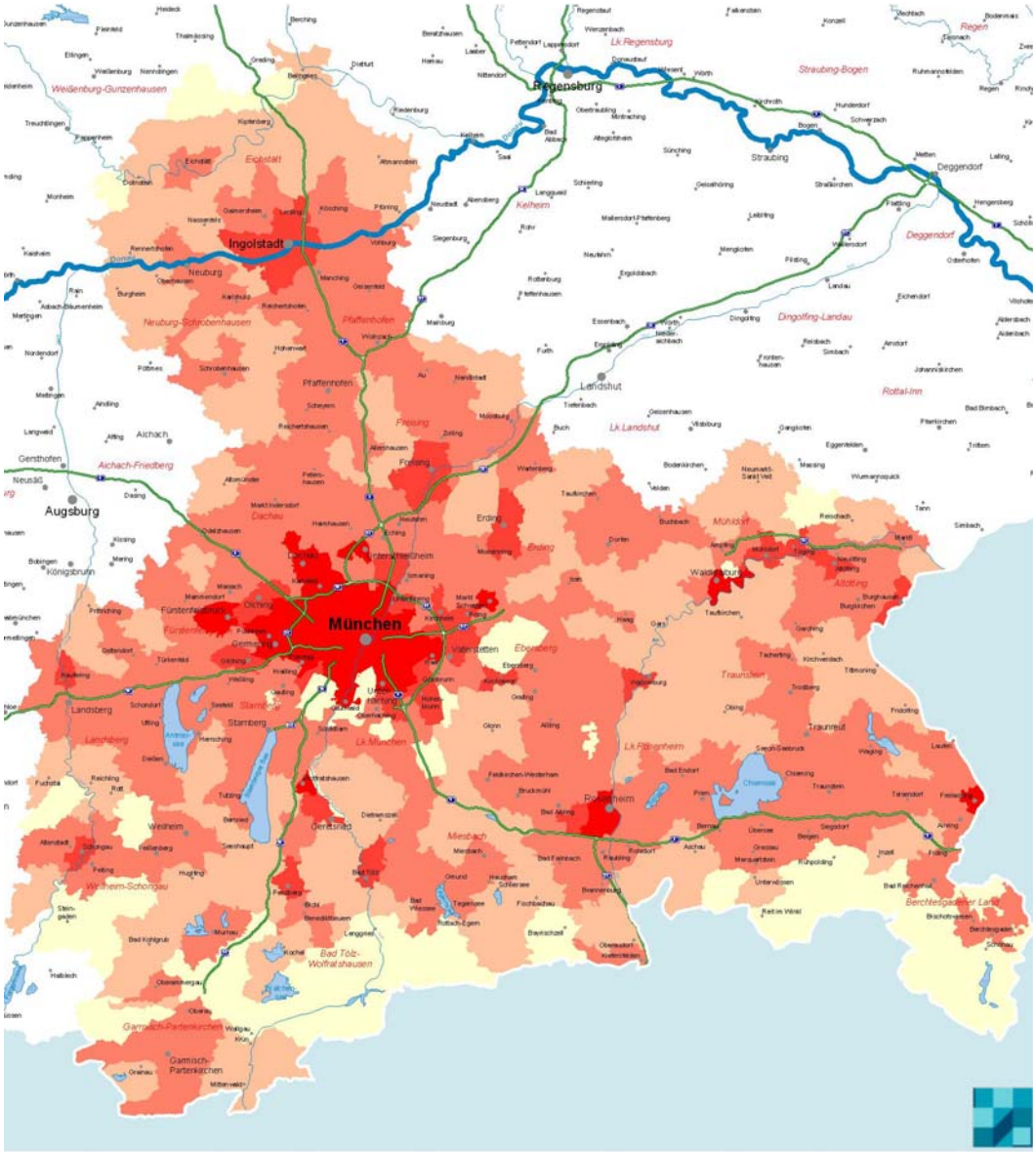
1.2. Settlement structure

Map 1 Population in München and its region (DE21 Oberbayern), 31.12.2007



The city and county of Munich is dominating the settlement pattern of the NUTS2 region of Oberbayern (map 1). Oberbayern is one of the clearly mono-centrically structured areas of Germany. Munich with more than 1.5 million inhabitants and the surrounding county with about 315,000 inhabitants represent 37.7 % of the regional population. The Munich agglomeration is densely settled whereas the more peripheral areas, especially the mountainous areas, of Upper Bavaria have a relative low population density. Ingolstadt (123,000 inhabitants) and also Rosenheim (61,000 inhabitants) form secondary centres. Map 2 highlights these local differences in the settlement structure with low values of population density in the Southern mountainous municipalities of the study area. As the state capital Munich offers services not only for its own hinterland Upper Bavaria, but also for the state of Bavaria and Germany as a whole. Munich forms an important node in the German highway and railway system.

Map 2 Population density in München and its region (DE21 Oberbayern), 1.1.2008



Source: BBSR, INKAR CD-Rom, 2009.

München has with 4,313 inhabitants per km^2 the highest population density of all German cities

2. Review of existing analysis of demographic and migratory flows in the case study

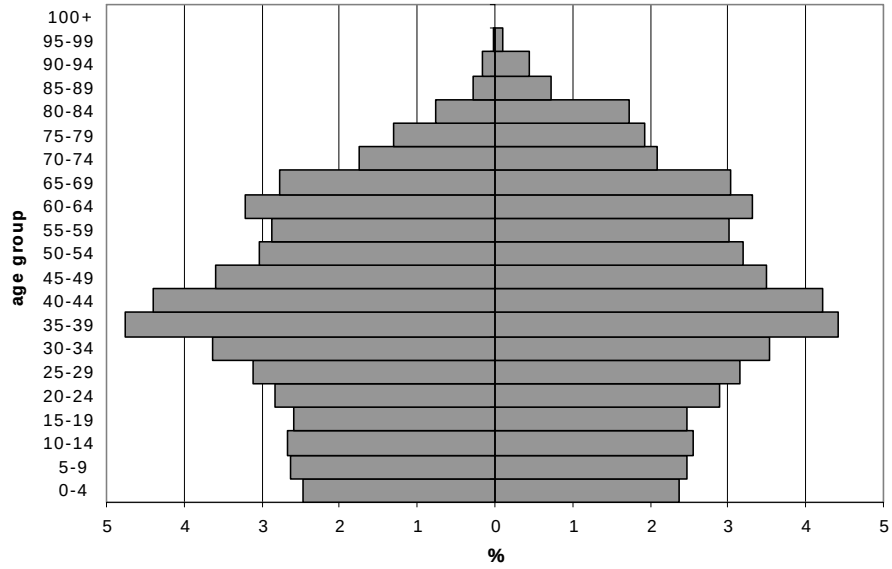
Very little studies do exist regarding the demographic and migratory change in Oberbayern. More general studies of the German migration patterns and trends refer to München and Oberbayern as the most attractive areas of Germany. It is not surprising that this situation does not lead to specific attempts to study demographic and migratory change in Oberbayern. Official documents of the Statistical Office and the regional planning agency give information and provide comments regarding the demographic situation in the case study area.

3. Demographic stocks and flows of the case study region and its sub-divisions

3.1. Age structure of the population

Oberbayern has an age structure that is dominated by the 35 to 44 years old and it is relative young for German standards. These age groups are the generations of the baby boom and the following narrowing of the base of the age pyramid is due to the fertility decline of the 1970s and 1980s. The young age structure of Oberbayern is also due to the interregional and international migration gains that characterise the case study area in the last decades.

Figure 1 Population pyramid of München and its region (DE21 Oberbayern), 1.1.2005



Source: elaborations on ESPON Data Base, 2010.

Munich has the lowest share of under 18 years old, due to a very low level of fertility in the city. The working age population, with a very high share of the 25 to 64 years old, dominates its age structure. The regional variability is highest for the 25 to under 40 years old, whose regional distribution depend in part on the migration processes. Also the relative variability of the elderly is high, with a maximum in the alpine tourist areas in the counties of Garmisch-Partenkirchen (23.2 %) and Berchtesgardener Land (22.6 %). Retirement migration plays a role in these relative values.

Table 1 Age structure of the population in München and its region (DE21 Oberbayern), 31.12.2007

Counties/ Regional planning regions/ Case study area	Population by age groups 31.12.2007					
	Total	Under 18	18 to 24	20 to 39	25 to 64	65 and older
Ingolstadt (city)	123,055	17.7	8.6	28.3	55.0	18.7
München (city)	1,311,573	14.7	8.5	33.0	59.2	17.6
Rosenheim (city)	60,674	16.4	8.5	27.1	55.8	19.4
Altötting	108,773	18.5	7.8	23.5	53.5	20.2
Berchtesgadener Land	102,383	16.8	8.2	24.1	52.4	22.6
Bad Tölz-Wolfratshausen	120,834	18.7	7.7	23.7	53.9	19.8
Dachau	136,272	19.4	7.5	25.1	56.2	16.8
Ebersberg	126,400	19.9	7.2	24.3	55.2	17.7
Eichstätt	124,419	20.7	9.3	25.9	53.3	16.7
Erding	124,876	20.9	7.8	26.1	56.0	15.2
Freising	164,692	19.6	8.9	28.9	57.1	14.5
Fürstenfeldbruck	201,148	18.1	7.1	23.8	55.3	19.4
Garmisch-Partenkirchen	86,872	17.0	7.2	22.9	52.7	23.2
Landsberg a.Lech	113,311	20.5	7.4	23.3	54.9	17.2
Miesbach	95,267	17.9	7.3	23.3	54.0	20.8
Mühldorf a.Inn	110,536	19.2	7.8	23.8	53.7	19.3
München	315,462	17.9	7.1	25.1	55.9	19.1
Neuburg-Schrobenhausen	91,067	19.9	8.1	24.9	54.1	17.9
Pfaffenhofen a.d.Ilm	116,407	19.8	8.1	25.0	55.5	16.6
Rosenheim	248,047	19.5	7.6	23.5	54.2	18.7
Starnberg	129,515	18.3	6.5	21.9	54.2	21.0
Traunstein	170,546	18.5	7.6	22.9	52.8	21.1
Weilheim-Schongau	131,317	19.8	7.7	23.0	53.3	19.3
Ingolstadt	454,948	19.5	8.5	26.2	54.5	17.5
München	2,623,249	16.9	7.9	28.9	57.5	17.7
Oberland	434,290	18.5	7.5	23.3	53.5	20.5
Südostoberbayern	800,959	18.5	7.8	23.8	53.6	20.0
Total	4,313,446	17.6	7.9	27.1	56.0	18.4

Source: BBSR, INKAR CD-Rom, 2009.

The DEMIFER project puts special emphasis on trends in the labour force and the working age population. Oberbayern did experience over the last two decades a slight decrease in the share of the working age population in the total population from 65.6 to 61.8 %.

Table 2 Changes in the age structure of the working-age population in München and its region (DE21 Oberbayern), 1990, 2000 and 2007

Counties/ Regional planning regions/ Case study area	Working-age population by age-group								
	31.12.1990			31.12.2000			31.12.2007		
	20 – 64	20 – 39	40 – 64	20 – 64	20 – 39	40 – 64	20 – 64	20 – 39	40 – 64
Ingolstadt (city)	64.6	31.7	32.9	62.6	29.5	33.0	61.3	28.3	33.0
München (city)	69.1	34.5	34.6	67.4	32.9	34.5	65.9	33.0	33.0
Rosenheim (city)	65.1	33.8	31.3	64.6	31.3	33.3	62.1	27.1	34.9
Altötting	61.9	31.0	30.9	60.5	27.5	33.0	58.9	23.5	35.3
Berchtesgadener Land	60.2	29.6	30.6	59.9	27.5	32.5	58.3	24.1	34.1
Bad Tölz-Wolfratshausen	63.1	30.7	32.4	61.8	28.3	33.5	59.2	23.7	35.5
Dachau	65.6	32.6	33.0	63.9	29.7	34.2	61.5	25.1	36.4
Ebersberg	66.3	31.6	34.7	64.0	29.6	34.4	60.2	24.3	35.8
Eichstätt	61.9	33.0	28.9	60.4	29.4	31.0	59.8	25.9	33.9
Erding	63.6	33.4	30.2	62.7	31.4	31.3	61.5	26.1	35.3
Freising	66.5	36.5	30.0	65.0	33.5	31.5	63.7	28.9	34.7
Fürstenfeldbruck	67.5	31.7	35.8	65.1	28.6	36.5	60.3	23.8	36.5
Garmisch-Partenkirchen	62.3	31.1	31.1	60.8	28.5	32.3	57.8	22.9	34.8
Landsberg a.Lech	62.9	32.6	30.3	61.8	28.9	32.9	59.9	23.3	36.6
Miesbach	63.2	30.7	32.6	61.9	28.0	33.9	59.1	23.3	35.7
Mühldorf a.Inn	61.3	30.9	30.4	60.3	27.8	32.6	59.0	23.8	35.2
München	68.3	31.5	36.8	66.1	29.6	36.5	61.1	25.1	36.0
Neuburg-Schrobenhausen	62.0	32.3	29.6	60.9	28.9	31.9	59.8	24.9	34.9
Pfaffenhofen a.d.Ilm	63.2	33.2	30.1	61.9	29.3	32.6	61.1	25.0	36.1
Rosenheim	61.7	30.9	30.8	60.9	28.0	33.0	59.4	23.5	35.9
Starnberg	64.3	29.1	35.3	63.1	27.3	35.8	58.7	21.9	36.8
Traunstein	61.1	30.1	31.0	60.0	27.1	32.9	58.0	22.9	35.1
Weilheim-Schongau	62.3	30.5	31.7	60.7	27.5	33.2	58.5	23.0	35.5
Ingolstadt	63.0	32.6	30.4	61.5	29.3	32.1	60.6	26.2	34.4
München	67.7	33.4	34.3	65.9	31.4	34.5	63.4	28.9	34.5
Oberland	62.7	30.7	32.0	61.3	28.0	33.2	58.7	23.3	35.4
Südostoberbayern	61.6	30.8	30.8	60.7	27.9	32.9	59.0	23.8	35.3
Total	65.6	32.6	33.0	64.0	30.1	33.8	61.8	27.1	34.7

Source: BBSR, INKAR CD-Rom, 2009, and BBSR- Bevölkerungsprognose 2005-2025 data base, 2010.

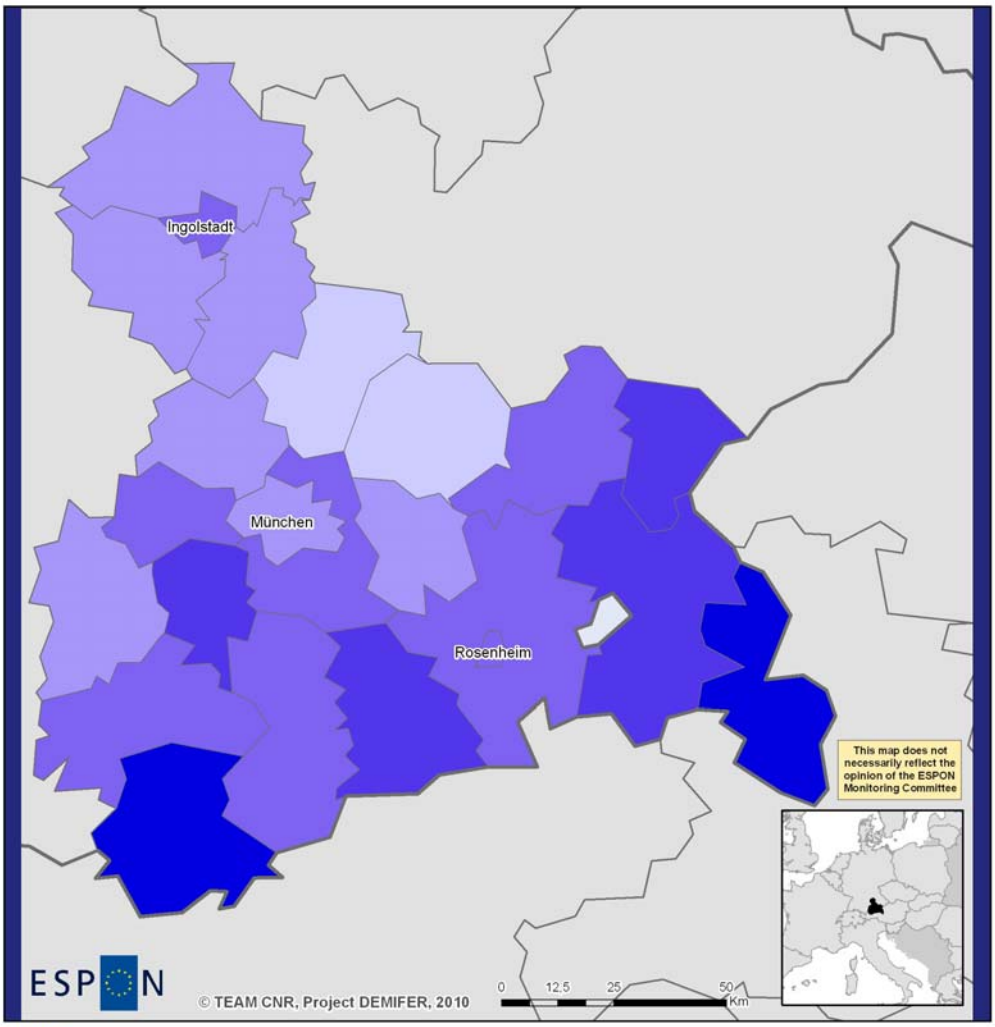
Table 3 Changes in the age structure of the elderly population in München and its region (DE21 Oberbayern), 1990, 2000 and 2007

Counties/ Regional planning regions/ Case study area	Elderly population by age-group								
	31.12.1990			31.12.2000			31.12.2007		
	65+	75+	Women 65+ in %	65+	75+	Women 65+ in %	65+	75+	Women 65+ in %
Ingolstadt (city)	14.6	6.3	64.9	16.3	7.1	60.9	18.7	8.0	57.5
München (city)	15.5	7.6	66.8	16.0	7.5	63.2	17.6	7.3	59.5
Rosenheim (city)	16.9	8.0	66.1	16.6	8.2	62.6	19.4	8.5	58.7
Altötting	15.9	7.6	65.7	16.9	7.6	61.7	20.2	8.9	58.3
Berchtesgadener Land	19.3	9.5	66.1	19.5	10.0	62.7	22.6	10.5	58.8
Bad Tölz-Wolfratshausen	15.5	7.5	65.3	16.1	7.4	60.4	19.8	8.3	56.9
Dachau	12.9	5.8	63.8	13.8	6.0	59.5	16.8	6.8	55.8
Ebersberg	12.2	5.7	63.7	13.7	5.6	57.8	17.7	6.9	55.1
Eichstätt	12.1	5.2	63.8	13.9	5.8	58.7	16.7	7.0	55.7
Erding	12.7	5.6	62.7	13.0	5.5	58.4	15.2	6.3	55.6
Freising	11.0	5.0	64.2	11.8	4.9	58.9	14.5	5.8	55.1
Fürstenfeldbruck	12.0	5.5	64.4	14.3	6.0	58.5	19.4	7.3	55.8
Garmisch-Partenkirchen	18.9	9.3	65.7	19.2	9.7	62.4	23.2	10.1	58.2
Landsberg a.Lech	13.9	6.6	64.2	14.0	6.6	60.3	17.2	7.2	56.1
Miesbach	16.6	8.1	65.7	17.1	8.2	61.1	20.8	8.7	57.5
Mühldorf a.Inn	16.0	7.8	65.9	16.6	7.5	61.2	19.3	8.4	57.3
München	12.4	5.9	63.1	14.5	6.4	58.1	19.1	7.4	55.5
Neuburg-Schrobenhausen	13.8	6.4	64.9	15.0	6.5	61.4	17.9	7.6	57.8
Pfaffenhofen a.d.Ilm	12.8	5.7	63.6	13.7	6.0	59.2	16.6	6.8	55.7
Rosenheim	15.3	7.0	64.2	15.5	7.4	60.3	18.7	8.0	56.5
Starnberg	16.1	7.7	64.3	16.7	8.3	60.1	21.0	8.8	56.3
Traunstein	16.6	7.6	64.9	17.7	8.3	61.0	21.1	9.2	57.4
Weilheim-Schongau	15.5	7.3	63.3	15.9	7.2	59.3	19.3	8.1	55.9
Ingolstadt	13.3	5.9	64.3	14.7	6.3	60.0	17.5	7.3	56.7
München	14.2	6.8	65.5	15.0	6.8	61.1	17.7	7.2	57.5
Oberland	16.5	8.0	64.9	16.9	8.0	60.7	20.5	8.7	57.0
Südostoberbayern	16.4	7.8	65.2	16.9	8.0	61.3	20.0	8.8	57.6
Total	14.8	7.0	65.3	15.5	7.1	61.0	18.4	7.6	57.4

Source: BBSR, INKAR CD-Rom, 2009, and BBSR- Bevölkerungsprognose 2005-2025 data base, 2010.

The share of the elderly increased between 1990 and 2007 by less than 4 percentage points. Of the German case studies Oberbayern has the lowest share of elderly.

Map 3 Population 65 and older in München and its region (DE21 Oberbayern), 1.1.2008



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Local level: NUTS3
Source: BBSR, INKAR CD-Rom, 2009
Origin of data: Federal Statistical Offices, 2009
© EuroGeographics Association for administrative boundaries

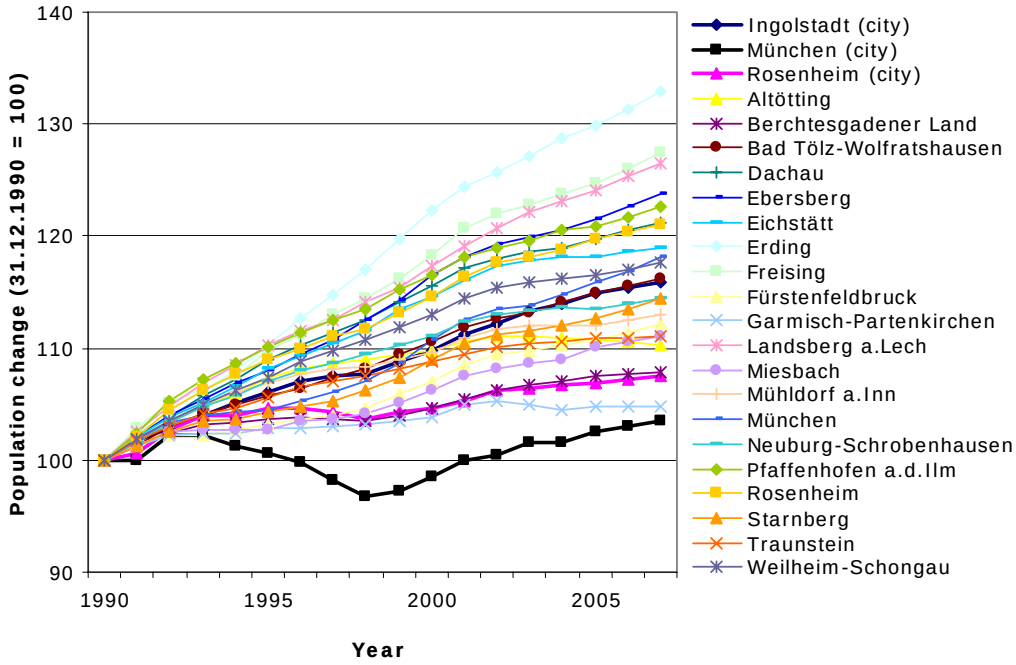
Legend

Population 65 years and older 31.12.2007 (in %)

- 16.0 and less
- 16.0 to 18.0
- 18.0 to 20.0
- 20.0 to 22.0
- more than 22.0

3.2. Population change and its components

Figure 2 Population change in München and its region (DE21 Oberbayern), 1990-2005



Source: BBSR, INKAR CD-Rom, 2009, and BBSR- Bevölkerungsprognose 2005-2025 data base, 2010.

Since 1990 the numbers of inhabitants in all counties of Oberbayern increased. Only the city of München showed a slight decline after 1993, whereas the suburban areas or counties surrounding the city showed the highest increase. Table 4 confirms these consistent migration gains in all counties of the study area with the exception of the city of München in the period 1995 to 1999. Natural change played a minor role during the study period, but is still positive in many counties, not least due to the relative young population structure.

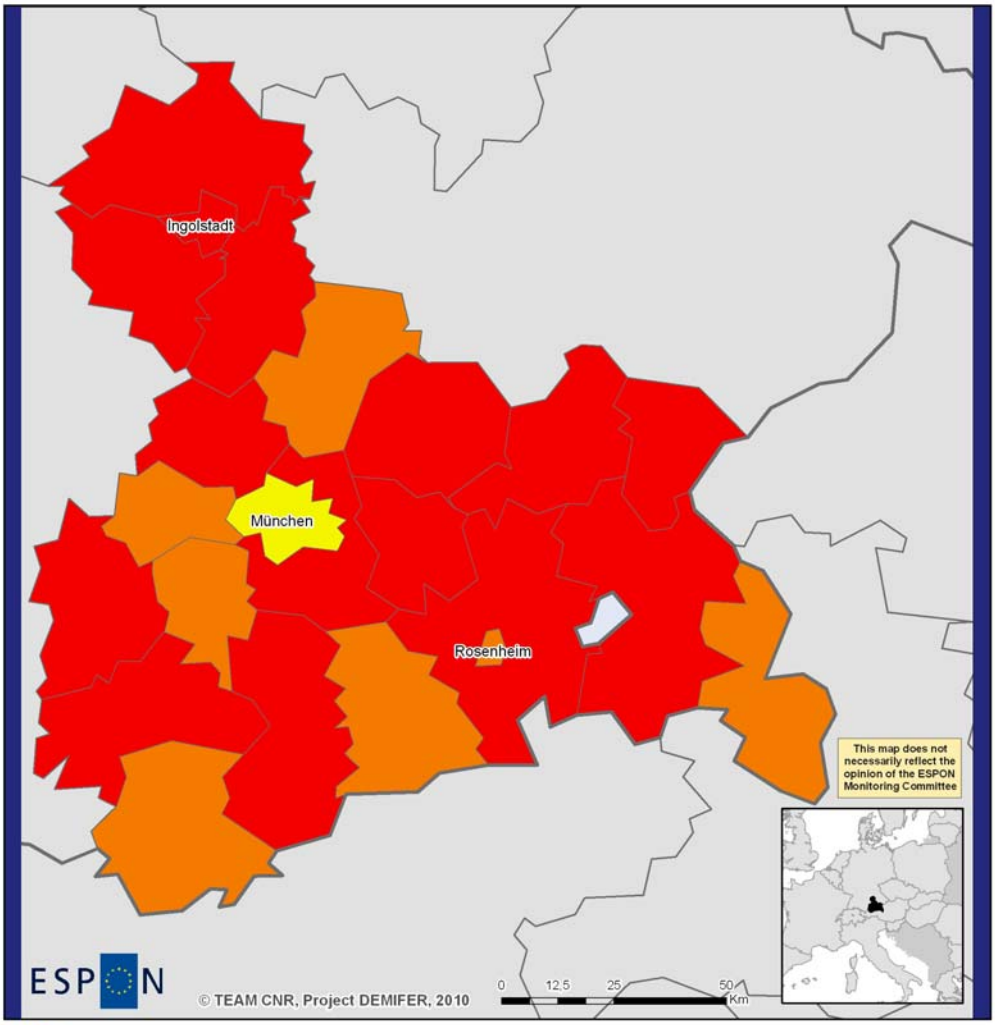
Table 4 Population change and its components in München and its region (DE21 Oberbayern), 2000-2008

Counties/ Regional planning regions/ Case study area	Population, natural change and net migration									
	1.1. 1995	1995 – 1999		1.1. 2000	2000 – 2004		1.1. 2005	2005 – 2007		31.12. 2007
	Pop	Nat	Mig	Pop	Nat	Mig	Pop	Nat	Mig	Pop
Ingolstadt (city)	110,903	1.6	5.3	114,826	0.9	8.1	120,157	0.4	7.5	122,282
München (city)	1,244,673	0.2	-8.4	1,194,562	1.0	7.8	1,249,175	2.2	13.9	1,271,167
Rosenheim (city)	58,599	0.1	0.3	58,721	0.2	4.5	60,110	0.3	2.7	60,617
Altötting	104,405	-0.3	7.0	107,942	-1.4	4.0	109,371	-2.2	0.4	108,816
Berchtesgadener Land	98,561	-2.4	3.9	99,278	-3.4	9.1	102,176	-3.5	4.2	102,834
Bad Tölz-Wolfratshausen	110,038	0.9	7.5	114,770	0.9	7.5	119,677	-0.1	3.3	121,863
Dachau	120,174	2.5	9.9	127,971	1.2	7.2	133,479	0.5	6.4	135,967
Ebersberg	108,893	3.5	9.8	116,403	2.4	8.4	122,915	1.8	7.5	126,077
Eichstätt	111,238	3.7	8.8	118,429	2.5	5.4	123,181	0.9	2.5	124,132
Erding	102,369	4.3	16.0	113,459	3.5	11.1	122,125	2.3	5.2	125,956
Freising	138,514	6.2	9.2	149,708	4.6	7.8	159,368	3.2	7.6	164,127
Fürstenfeldbruck	185,338	2.0	4.0	190,994	1.6	6.5	198,902	0.5	3.2	202,399
Garmisch-Partenkirchen	85,387	-1.6	3.6	86,212	-2.9	4.7	87,009	-3.4	2.8	87,317
Landsberg am Lech	97,956	3.2	9.2	104,232	1.8	11.2	111,278	0.8	5.2	114,304
Miesbach	88,606	0.0	4.6	90,670	-0.4	7.5	93,936	-1.1	5.7	95,844
Mühldorf a. Inn	105,049	-0.1	5.4	107,907	-1.7	7.2	110,945	-2.2	0.9	111,803
München	278,226	1.5	6.6	289,702	1.0	10.0	306,187	1.0	8.9	315,016
Neuburg-Schrobenhausen	84,919	2.5	5.9	88,577	0.8	5.1	91,254	-0.4	-0.3	91,902
Pfaffenhofen a.d. Ilm	104,013	2.8	9.1	110,418	1.3	7.5	115,379	0.8	2.2	117,415
Rosenheim	222,070	1.2	8.8	233,473	0.1	9.6	245,134	-1.2	5.1	249,784
Starnberg	118,759	0.1	6.9	123,046	0.4	7.9	128,285	-0.4	3.6	131,086
Traunstein	161,310	0.3	6.2	166,677	-1.0	5.5	170,451	-1.9	2.1	171,206
Weilheim-Schongau	119,380	1.2	8.9	125,647	0.2	7.6	130,636	-0.7	2.4	132,168
Ingolstadt	411,073	2.6	7.3	432,250	1.4	6.6	449,971	0.5	3.2	455,731
München	2,394,902	1.4	-0.2	2,410,077	1.5	8.3	2,531,714	1.7	10.1	2,586,099
Oberland	403,411	0.3	6.5	417,299	-0.4	6.9	431,258	-1.2	3.5	437,192
Südostoberbayern	749,994	0.1	6.2	773,998	-1.0	7.2	798,187	-1.8	2.9	805,060
Total	3,959,380	1.2	2.5	4,033,624	0.8	7.8	4,211,130	0.6	7.3	4,284,082

Source: BBSR, INKAR CD-Rom, 2009

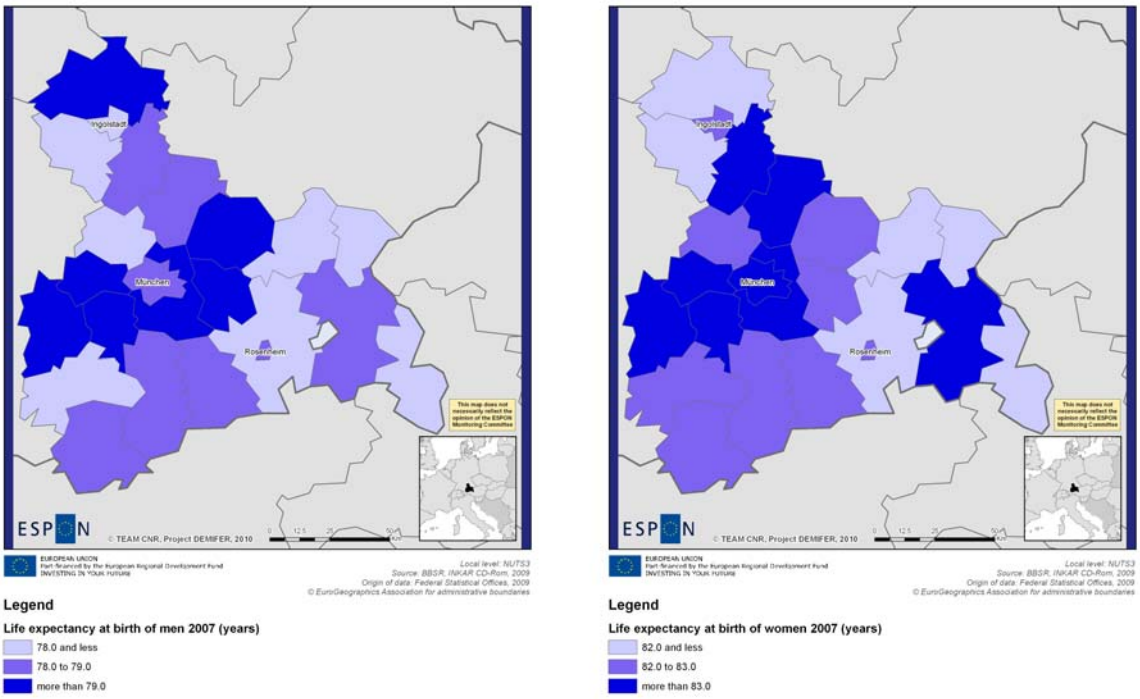
3.3. Natural change - fertility and mortality

Map 4 TFR in München and its region (DE21 Oberbayern), 2007



Fertility in the counties of Oberbayern is low at 1.4 children per women. The changes since 1995 are minor and lead to a convergence in the area. Smaller regional differences continue to exist, especially the low level of 1.28 in the city of München.

Map 5 Life expectancy for men and women in München and its region (DE21 Oberbayern), 2007



The study area is characterized by high levels of live expectancy for men and women and gender differences are fairly small. The increase over the last years is in line with the average improvement of mortality in Germany. Mortality seems to be higher in the South-eastern part of Oberbayern, whereas the Munich agglomeration seems to have the lowest mortality.

3.4. Net migration

Table 5 Interregional- and international migration in München and its region (DE21 Oberbayern), 2000-2008

Counties/ Regional planning regions/ Case study area	Out- and in-migration, net internal- and international migration rates (per 1,000)									
	2000 – 2004					2005 – 2007				
	Out-	In-	Net inter-nal	Net inter-natio-nal	Net total	Out-	In-	Net inter-nal	Net inter-natio-nal	Net total
Ingolstadt (city)	53.3	61.4	6.4	1.7	8.1	52.8	60.2	5.4	2.0	7.5
München (city)	64.8	72.7	1.5	6.4	7.8	62.4	76.3	10.9	2.9	13.9
Rosenheim (city)	66.9	71.4	4.8	-0.4	4.5	64.5	67.2	1.5	1.2	2.7
Altötting	33.3	37.3	3.7	0.3	4.0	35.4	35.8	-0.5	1.0	0.4
Berchtesgadener Land	33.9	43.0	6.8	2.3	9.1	36.5	40.7	3.3	0.8	4.2
Bad Tölz-Wolfratshausen	38.4	45.9	6.3	1.2	7.5	38.5	41.9	3.0	0.4	3.3
Dachau	44.1	51.2	6.5	0.7	7.2	43.2	49.7	5.9	0.5	6.4
Ebersberg	53.5	61.9	8.3	0.1	8.4	50.9	58.4	7.7	-0.2	7.5
Eichstätt	40.1	45.5	5.6	-0.3	5.4	40.0	42.4	2.1	0.4	2.5
Erding	41.9	53.0	10.5	0.6	11.1	40.4	45.6	5.5	-0.3	5.2
Freising	59.3	67.1	6.9	1.0	7.8	52.9	60.5	7.7	0.0	7.6
Fürstenfeldbruck	44.1	50.6	5.9	0.6	6.5	43.7	47.0	3.3	-0.1	3.2
Garmisch-Partenkirchen	46.9	51.6	5.1	-0.4	4.7	44.3	47.0	3.6	-0.8	2.8
Landsberg am Lech	45.5	56.7	5.7	5.5	11.2	42.5	47.7	5.1	0.1	5.2
Miesbach	43.0	50.6	7.4	0.2	7.5	42.4	48.1	5.1	0.6	5.7
Mühldorf a. Inn	30.6	37.8	6.5	0.7	7.2	34.1	35.1	0.0	0.9	0.9
München	71.0	81.0	8.6	1.4	10.0	69.0	78.0	10.0	-1.0	8.9
Neuburg-Schrobenhausen	30.5	35.7	5.1	0.0	5.1	31.9	31.7	-0.1	-0.2	-0.3
Pfaffenhofen a.d. Ilm	38.4	45.9	7.0	0.5	7.5	38.2	40.4	1.5	0.7	2.2
Rosenheim	38.0	47.5	9.5	0.1	9.6	38.9	44.0	4.4	0.7	5.1
Starnberg	58.6	66.5	6.7	1.3	7.9	58.0	61.7	4.0	-0.4	3.6
Traunstein	30.4	35.8	5.0	0.4	5.5	31.3	33.4	1.7	0.4	2.1
Weilheim-Schongau	34.1	41.7	7.3	0.3	7.6	35.8	38.2	2.6	-0.2	2.4
Ingolstadt	41.2	47.8	6.1	0.5	6.6	41.3	44.5	2.4	0.8	3.2
München	59.7	68.0	4.5	3.8	8.3	57.4	67.5	8.8	1.3	10.1
Oberland	39.8	46.8	6.6	0.4	6.9	39.7	43.2	3.4	0.0	3.5
Südostoberbayern	36.3	43.5	6.6	0.5	7.2	37.8	40.7	2.2	0.7	2.9
Total	51.2	59.0	5.3	2.5	7.8	50.2	57.5	6.3	1.0	7.3

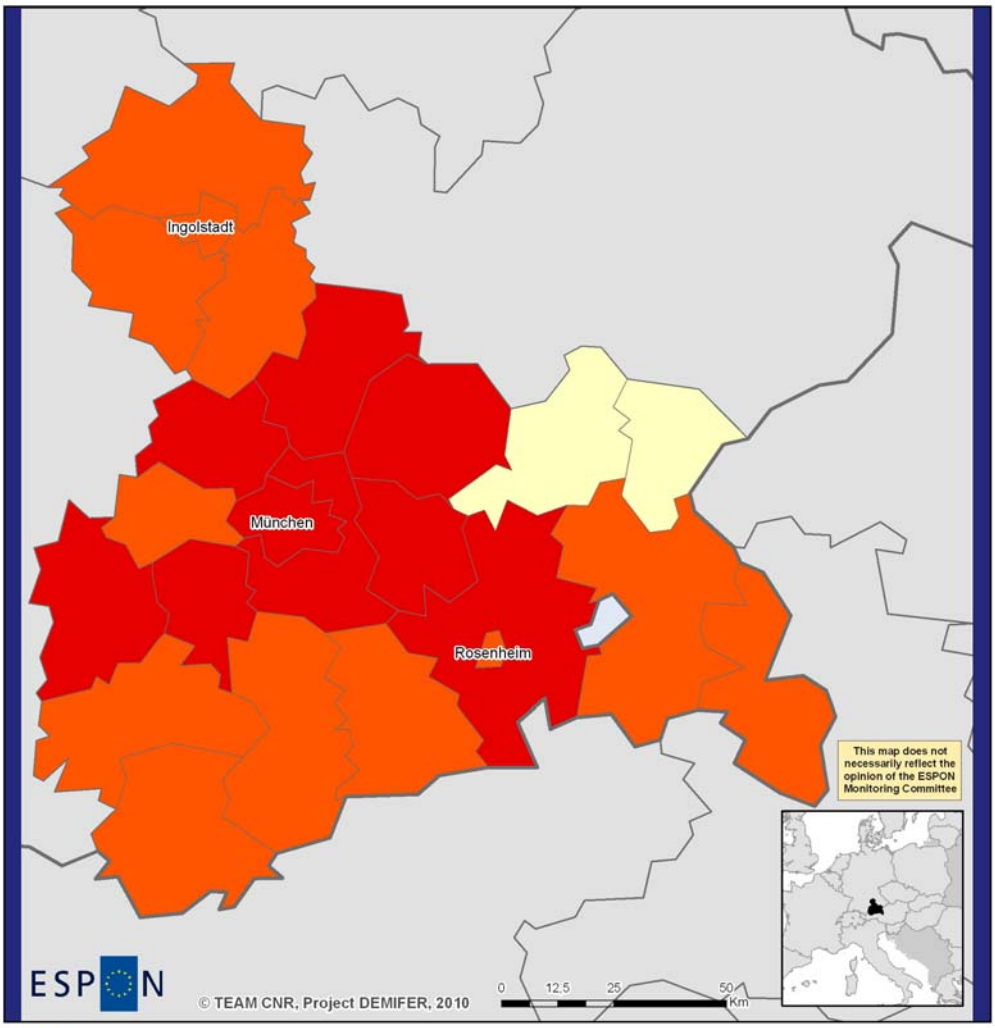
Source: BBSR, INKAR CD-Rom, 2009

Net migration is the driver of population change in the study area. Overall mobility levels – in- and out-migration rates – are relatively high and they are leading to internal and international migration gains. Even the suburban migration flows in the agglomeration of München do not lead to a negative migration balance for the city of München. International migration gains are more important in 2000 to 2004 than since 2005 and they are concentrated in the important cities, especially Munich.

No county in Oberbayern has a negative interregional migration balance in 2007. Especially the Munich agglomeration has consistent gains above +4.5 ‰.

Instead international migration gains are concentrated in the city of Munich. In recent years international migration was not any more the driver of population change in the region of Oberbayern.

Map 6 Net interregional migration in München and its region (DE21 Oberbayern), 2007



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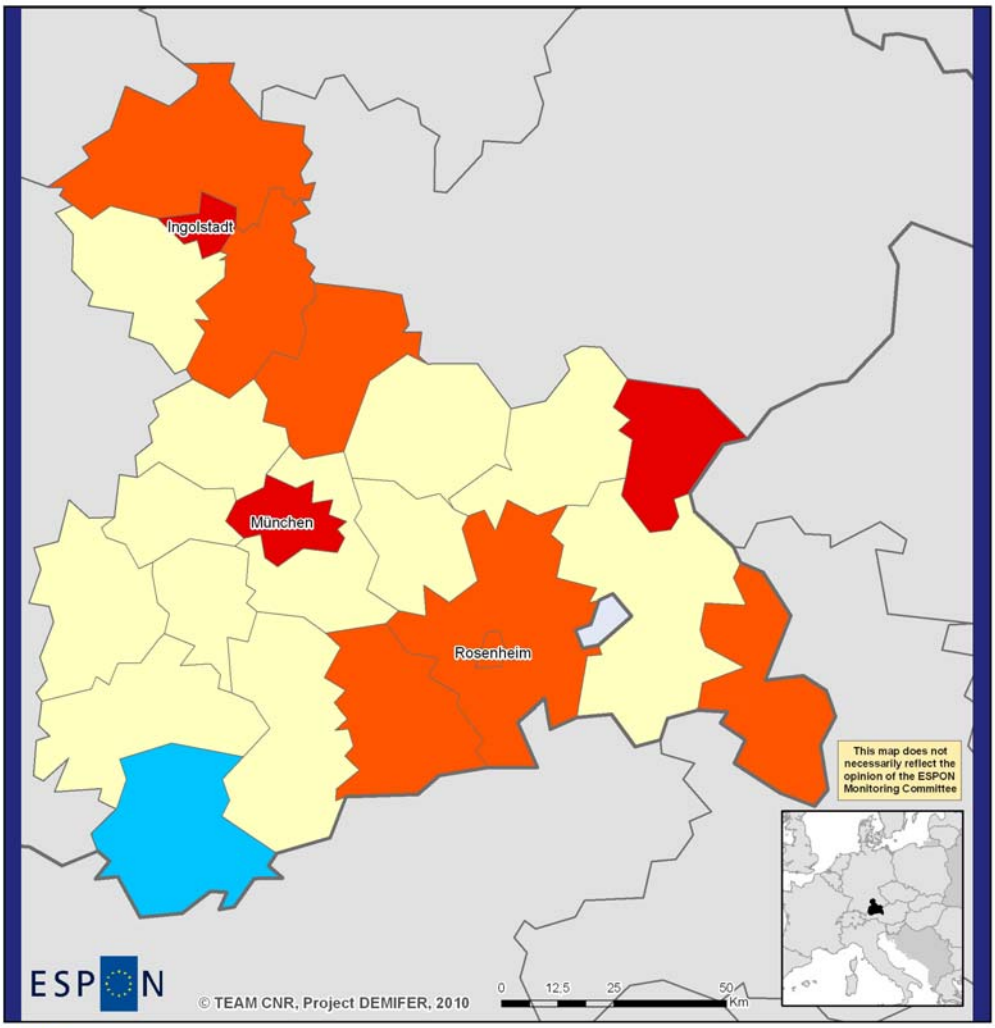
Legend

Net interregional migration 2007 (in ‰)

- -4.5 and less
- -4.5 to -1.5
- -1.5 to +1.5
- +1.5 to +4.5
- more than +4.5

Map 7 Net international migration in München and its region (DE21 Oberbayern), 2007



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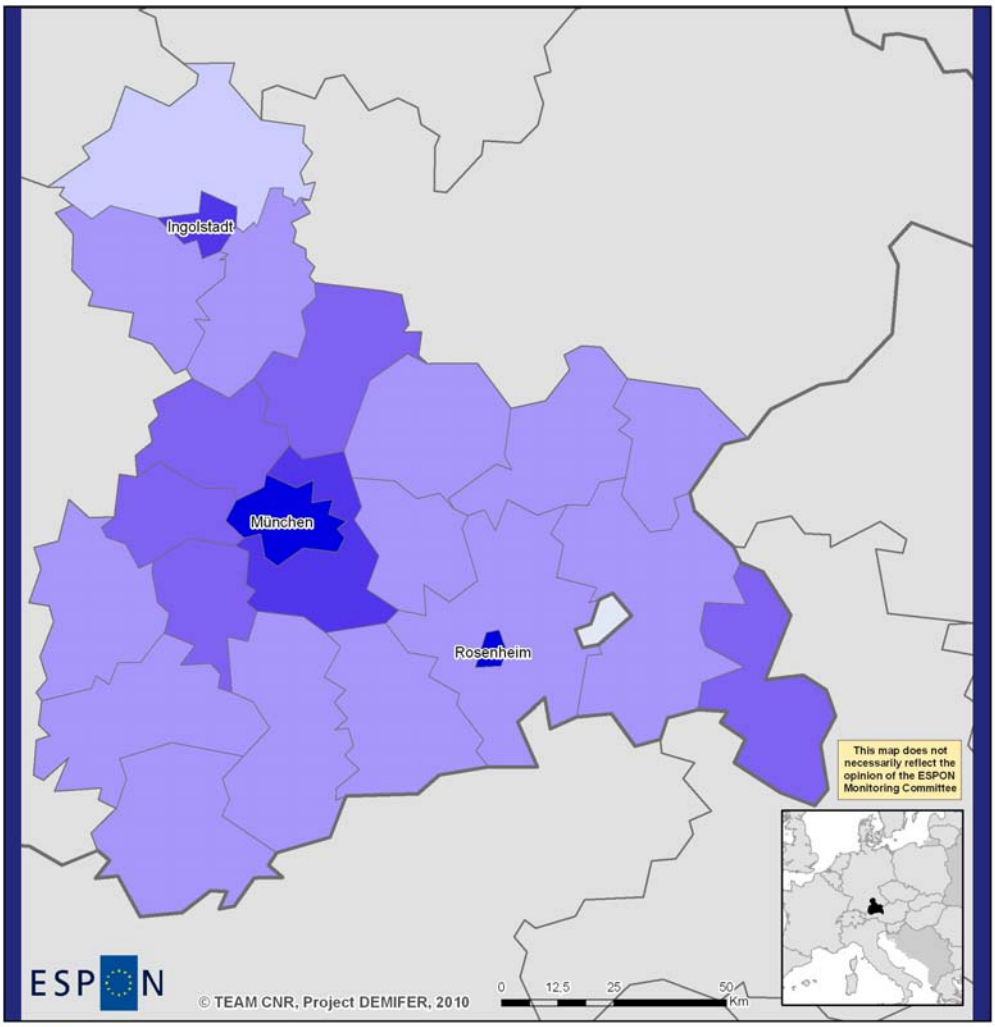
Legend

Net international migration 2007 (in ‰)

- -1,5 and less
- -1.5 to -0.5
- -0.5 to +0.5
- +0.5 to +1.5
- more than +1.5

Map 8 Foreign population in München and its region (DE21 Oberbayern), 1.1.2007



The foreign population represent close to 13 % of the total population of Oberbayern. The foreign population is concentrated in Munich and its agglomeration. 289,000 foreigners (31.12.2005) are living in the city of Munich representing 22.9 % of the total population and in the planning region of Munich 411,000 foreigners are counted, representing 16.1 % of the total population. Furteher concentrations of foreigners are in Ingoldtadt and Rosenheim.

3.5. Age composition of migrants

Table 6 Interregional- and international age-specific migration rates in München and its region (DE21 Oberbayern), 2007

Counties/ Regional planning regions/ Case study area	Internal net migration rates for age-groups (per 1,000)									
	2000 - 2004					2005 - 2007				
	18 - 24	25 - 29	–18, 30 - 49	50 - 64	65+	18 - 24	25 - 29	– 18, 30 - 49	50 - 64	65+
Ingolstadt (city)	28.6	20.8	4.1	2.1	0.7	32.7	23.2	1.1	0.5	1.6
München (city)	46.1	39.1	-6.1	-5.1	-8.3	93.3	68.8	-2.0	-3.0	-7.2
Rosenheim (city)	40.2	4.9	2.2	2.7	-2.7	45.7	-3.7	-2.4	0.0	-4.7
Altötting	-3.8	-1.2	5.1	3.6	4.9	-26.7	-10.2	2.5	2.7	1.9
Berchtesgadener Land	11.7	5.2	5.5	8.9	6.5	4.0	-3.3	2.8	5.9	3.8
Bad Tölz-Wolfratshausen	2.4	11.3	9.2	2.8	1.7	-4.7	-8.8	5.7	3.1	1.9
Dachau	11.9	17.8	8.0	-2.3	5.1	7.7	25.2	6.3	-0.7	4.0
Ebersberg	8.0	19.9	11.9	-1.6	3.9	0.6	14.3	11.4	0.3	5.4
Eichstätt	-0.4	11.6	7.7	2.1	3.0	8.5	1.0	2.2	-0.2	0.9
Erding	21.1	21.3	11.6	3.0	4.1	3.7	13.7	6.7	1.8	2.7
Freising	32.5	26.1	4.5	-0.4	0.0	47.6	27.4	2.6	-2.1	4.6
Fürstenfeldbruck	13.4	13.3	9.4	-2.3	-0.4	4.0	4.7	5.9	-2.7	2.3
Garmisch-Partenkirchen	19.7	-6.1	2.5	8.4	5.8	-3.3	-4.2	2.4	8.6	6.0
Landsberg am Lech	-19.3	-1.9	10.5	4.5	4.8	-24.3	0.9	10.1	3.2	5.6
Miesbach	8.5	12.3	9.8	4.2	1.9	-8.6	-3.6	7.1	7.3	5.6
Mühldorf a. Inn	1.1	6.0	8.2	5.7	4.6	-24.4	-6.6	2.5	2.0	3.4
München	30.8	-1.2	12.1	-3.2	6.4	32.5	1.3	13.8	-3.1	6.3
Neuburg-Schrobenhausen	5.1	12.9	6.1	1.5	2.6	-22.5	-4.3	2.6	1.2	2.8
Pfaffenhofen a.d. Ilm	3.8	15.7	8.9	1.6	4.5	-16.3	8.4	3.7	1.0	1.5
Rosenheim	1.7	14.9	10.7	7.9	9.1	-19.7	-1.2	6.6	6.2	8.4
Starnberg	-5.7	4.9	13.3	0.7	0.4	-19.7	-15.0	11.2	1.1	2.1
Traunstein	-4.9	3.5	7.4	6.6	1.6	-19.2	-10.7	4.4	6.3	2.2
Weilheim-Schongau	-1.8	10.1	10.5	4.2	4.2	-22.0	4.1	5.9	2.9	2.7
Ingolstadt	9.6	15.6	6.8	1.9	2.6	3.1	8.7	2.3	0.6	1.7
München	31.1	27.3	3.4	-3.1	-2.7	55.1	45.2	3.6	-1.9	-1.4
Oberland	6.0	7.5	8.4	4.7	3.4	-10.6	-2.8	5.5	5.1	3.8
Südostoberbayern	3.9	6.9	7.6	6.5	5.0	-12.8	-5.6	3.9	4.7	3.8
Total										

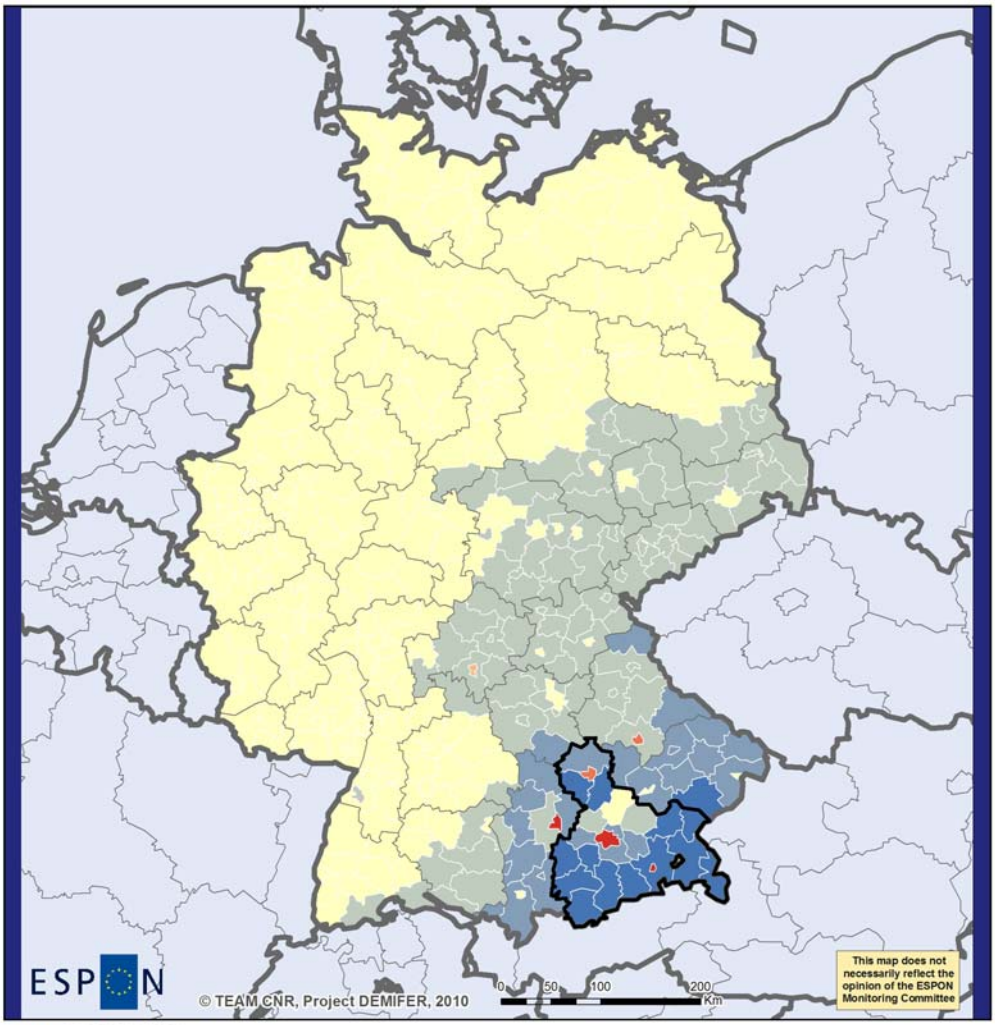
Source: BBSR, INKAR CD-Rom, 2009

The age specific net migration rates reveal the selection process of internal migration. Areas with institutions of higher education and good labour market conditions attract young adults. This is especially the case of the Munich agglomeration. Families (under 18 and 30 to 49 years old) move away from the city of München to the suburban areas of the agglomeration. The net gains in this age group are also due to migration flows from other parts of Germany. Also pensioners leave city centres to settle in areas with more attractive landscapes. Whereas in the first half of the 2000s the alpine areas of Berchtesgardener Land and Garmisch-Partenkirchen had the highest net migration rates in this age group, in the last years areas closer to München had higher gains.

3.6. The regional pattern of internal migration

The maps 9 to 11 show the interregional migration fields of the single case study areas. They show how each German county is related in the case of different age groups to the case study area. Inside the case study area it is shown, which county gains or looses population inside the study area.
The counties of South-eastern Germany are sending young adults to the case study area of Oberbayern. This relative wide and clear migration field shrinks for the older age groups and disappears for the age group 65 years and older. This last map shows the internal redistribution of the elderly from München to the entire area of Oberbayern and bordering counties.

Map 9 Net internal migration of the 18 to 24 years old population with München and its region (DE21 Oberbayern), 2005-2007



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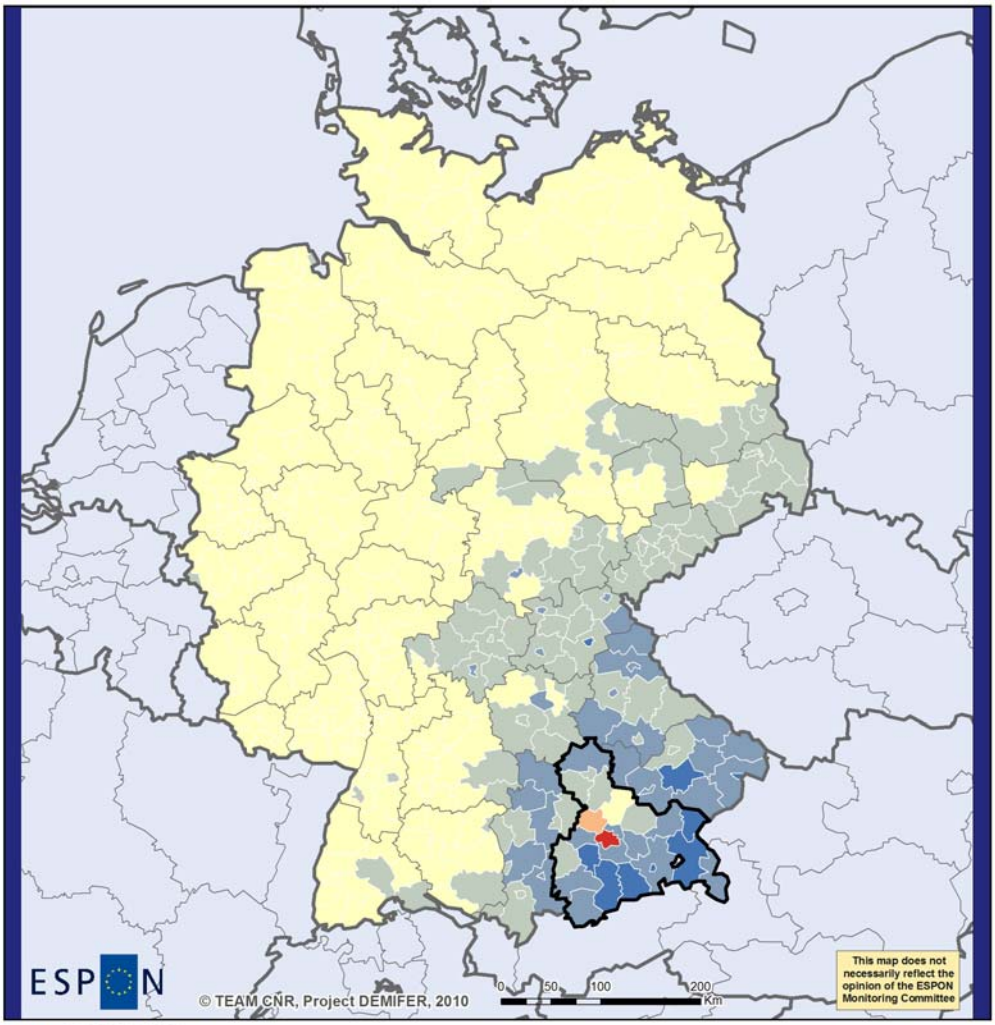
Legend

Net migration of 18 to 24 years old with CS 2, 2005-2007 (per 1,000)

- -12.5 and less
- -12.5 to -7.5
- -7.5 to -2.5
- -2.5 to +2.5
- +2.5 to +7.5
- +7.5 to +12.5
- more than +12.5

Map 10 Net internal migration of the 25 to 29 years old population with München and its region (DE21 Oberbayern), 2005-2007



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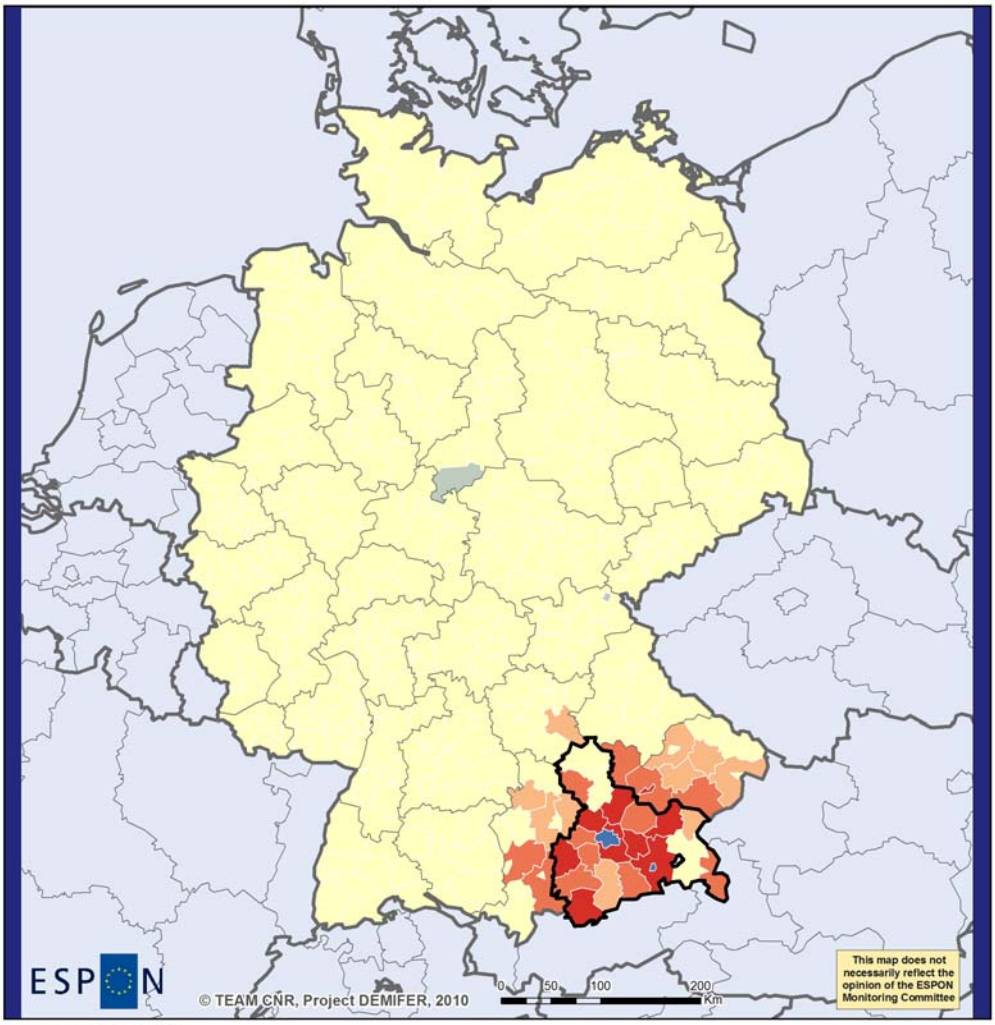
Legend

Net migration of 25 to 29 years old with CS 2, 2005-2007 (per 1,000)

- -12.5 and less
- -12.5 to -7.5
- -7.5 to -2.5
- -2.5 to +2.5
- +2.5 to +7.5
- +7.5 to +12.5
- more than +12.5

Map 11 Net internal migration of the population 65 years and older with München and its region (DE21 Oberbayern), 2005-2007



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Local level: NUTS3
Source: BBSR, INKAR CD-Rom, 2009
Origin of data: German Federal Statistical Offices, 2009
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Legend

Net migration of 65 years and older with CS 2, 2005-2007 (per 1,000)

- -2.5 and less
- -2.5 to -1.5
- -1.5 to -0.5
- -0.5 to +0.5
- +0.5 to +1.5
- +1.5 to +2.5
- more than +2.5

3.7. The foreign population by nationality

One of the most significant information available regarding the foreign population is their nationality. Due to the process of chain migration specific diasporas formed at the regional level in Germany. The phase of Gastarbeiter migration The formation of specific Diasporas is good. The major foreign communities in Munich are Turks (43,000), Croatians (25,000), Greeks (22,000), Italians (22,000) and Austrians (21,000).

Table 7 Foreign population by nationality in München and its region (DE21 Oberbayern), 1.1.2006

Counties/ Regional planning regions/ Case study area	Foreign population 31.12.2005							
	Total		By country of citizenship (in % of the total number of foreign citizens)					
	Abs	in %	Europe	Turkey	Italy	Serbia and Monte-negro	Croatia	Austria
Ingolstadt (city)	16,128	13.3	88.3	32.9	4.2	0.7	5.0	3.7
München (city)	288,996	22.9	80.5	14.7	6.8	2.9	7.5	7.1
Rosenheim (city)	9,090	15.1	90.2	22.0	7.0	18.5	7.9	9.4
Altötting	5,984	5.5	88.1	14.1	5.0	8.0	6.6	25.8
Berchtesgadener Land	11,193	10.9	93.6	5.1	2.8	2.6	4.8	59.2
Bad Tölz-Wolfratshausen	9,525	7.9	88.3	12.4	9.6	9.8	6.2	11.8
Dachau	14,278	10.6	87.9	16.2	9.8	9.4	4.5	8.8
Ebersberg	9,089	7.3	86.2	10.7	8.6	11.1	5.5	15.6
Eichstätt	5,224	4.2	86.3	29.9	7.8	3.5	2.4	6.9
Erding	8,051	6.5	87.0	20.2	8.5	7.6	4.1	11.0
Freising	17,155	10.7	84.3	29.8	6.0	2.1	5.1	8.3
Fürstenfeldbruck	18,120	9.1	83.9	17.5	8.9	13.1	3.9	12.5
Garmisch-Partenkirchen	6,367	7.3	87.8	21.0	7.9	6.7	3.5	14.4
Landsberg am Lech	5,170	4.6	81.1	14.2	8.8	7.4	4.0	12.3
Miesbach	6,797	7.2	90.5	21.1	8.9	7.4	5.7	17.4
Mühldorf a. Inn	6,643	6.0	89.2	28.1	4.6	1.5	2.9	9.8
München	37,264	12.1	85.9	12.5	9.6	4.8	6.7	14.0
Neuburg-Schrobenhausen	4,826	5.3	78.3	22.8	6.3	9.6	2.1	5.0
Pfaffenhofen a.d. Ilm	6,409	5.5	88.3	29.3	7.7	8.8	2.3	8.1
Rosenheim	15,366	6.2	87.4	15.9	8.6	8.0	6.3	19.4
Starnberg	12,585	9.7	83.0	12.3	6.9	8.5	7.7	13.6
Traunstein	9,511	5.6	88.0	7.9	5.6	6.7	14.3	23.7
Weilheim-Schongau	8,864	6.8	88.2	24.3	8.6	8.1	3.9	8.4
Ingolstadt	32,587	7.2	86.5	30.3	5.8	4.1	3.6	5.3
München	410,708	16.1	81.9	15.2	7.3	4.2	6.9	8.6
Oberland	31,553	7.3	88.6	19.3	8.8	8.2	4.9	12.6
Südostoberbayern	57,787	7.2	89.4	14.7	5.9	7.7	7.2	25.8
Total	532,635	12.6	83.4	16.3	7.2	4.8	6.6	10.5

Source: BBSR, Regional data base, 2009.

Table 8 Population by migratory status in München and its region (DE21 Oberbayern), 2005-2008

	Population							
				with migratory 'background' (narrow definition)				
	Total	without migratory 'back-ground'	with migratory 'back-ground'	Total	German citizens		Foreign citizens	
					with	without	with	without
					own migratory experience			
Case study area Oberbayern			absolute values					
2005	4,224	3,243	981	966	226	172	459	109
2006	4,250	3,260	990	990	231	186	465	107
2007	4,288	3,281	1,007	1,007	237	194	464	112
2008	4,319	3,308	1,011	1,011	235	196	471	109
München								
2005	1,254	823	431	426	66	57	248	54
Case study area Oberbayern			relative values (in %)					
2005	100.0	76.8	23.2	22.9	5.4	4.1	10.9	2.6
2006	100.0	76.7	23.3	23.3	5.4	4.4	10.9	2.5
2007	100.0	76.5	23.5	23.5	5.5	4.5	10.8	2.6
2008	100.0	76.6	23.4	23.4	5.4	4.5	10.9	2.5
München								
2005	100.0	65.6	34.4	34.0	5.3	4.5	19.8	4.3
Germany			relative values (in %)					
2005	100.0	81.4	18.6	18.3	5.9	3.5	6.8	2.1
2006	100.0	81.6	18.4	18.4	5.9	3.6	6.8	2.1
2007	100.0	81.3	18.7	18.7	6.0	3.9	6.8	2.1
2008	100.0	81.0	19.0	19.0	6.1	4.0	6.8	2.0

Source: elaborations on StaBu, Micro census, various years.

4. Economic change and population: the labour market of the case study region and its sub-divisions

4.1. Economic characteristics

Table 9 The economic situation in München and its region (DE21 Oberbayern)

Counties/ Regional planning regions/ Case study area	GDP 2008		Change in GDP			Unemployment 2007	
	€ per capita	Case study = 100	1995 to 2000	2000 to 2005	2005 to 2008	in %	Case study = 100
Ingolstadt (city)	60,031	141.3	38.9	22.5	4.6	5.9	109.3
München (city)	55,996	131.8	18.3	3.7	4.5	7.1	131.5
Rosenheim (city)	40,655	95.7	2.4	-1.2	5.5	8.3	153.7
Altötting	44,196	104.1	37.1	6.8	22.6	6.1	113.0
Berchtesgadener Land	27,234	64.1	9.9	5.2	14.0	5.4	100.0
Bad Tölz-Wolfratshausen	27,573	64.9	15.7	13.0	7.6	4.7	87.0
Dachau	22,104	52.0	22.1	18.5	3.1	4.2	77.8
Ebersberg	25,017	58.9	14.4	10.7	11.8	4.0	74.1
Eichstätt	22,068	52.0	19.4	9.8	16.9	2.4	44.4
Erding	23,560	55.5	8.8	6.6	7.3	3.6	66.7
Freising	46,989	110.6	15.8	13.0	11.9	3.7	68.5
Fürstenfeldbruck	20,461	48.2	1.9	8.4	9.3	4.8	88.9
Garmisch-Partenkirchen	24,397	57.4	15.2	-4.0	9.2	5.4	100.0
Landsberg am Lech	25,894	61.0	14.4	5.6	11.2	4.8	88.9
Miesbach	29,704	69.9	13.4	5.6	21.8	5.1	94.4
Mühldorf a. Inn	30,612	72.1	15.0	10.7	14.7	6.6	122.2
München	85,654	201.7	60.7	9.1	0.7	4.2	77.8
Neuburg-Schrobenhausen	29,392	69.2	1.9	12.3	15.9	3.8	70.4
Pfaffenhofen a.d. Ilm	27,916	65.7	21.6	12.7	13.2	3.3	61.1
Rosenheim	27,653	65.1	18.0	15.1	15.2	4.7	87.0
Starnberg	38,436	90.5	5.8	13.0	14.9	4.1	75.9
Traunstein	30,484	71.8	26.2	-6.9	16.8	4.5	83.3
Weilheim-Schongau	29,766	70.1	7.2	17.7	8.9	4.9	90.7
Oberbayern	42,471	100.0	21.0	7.4	7.9	5.4	100.0

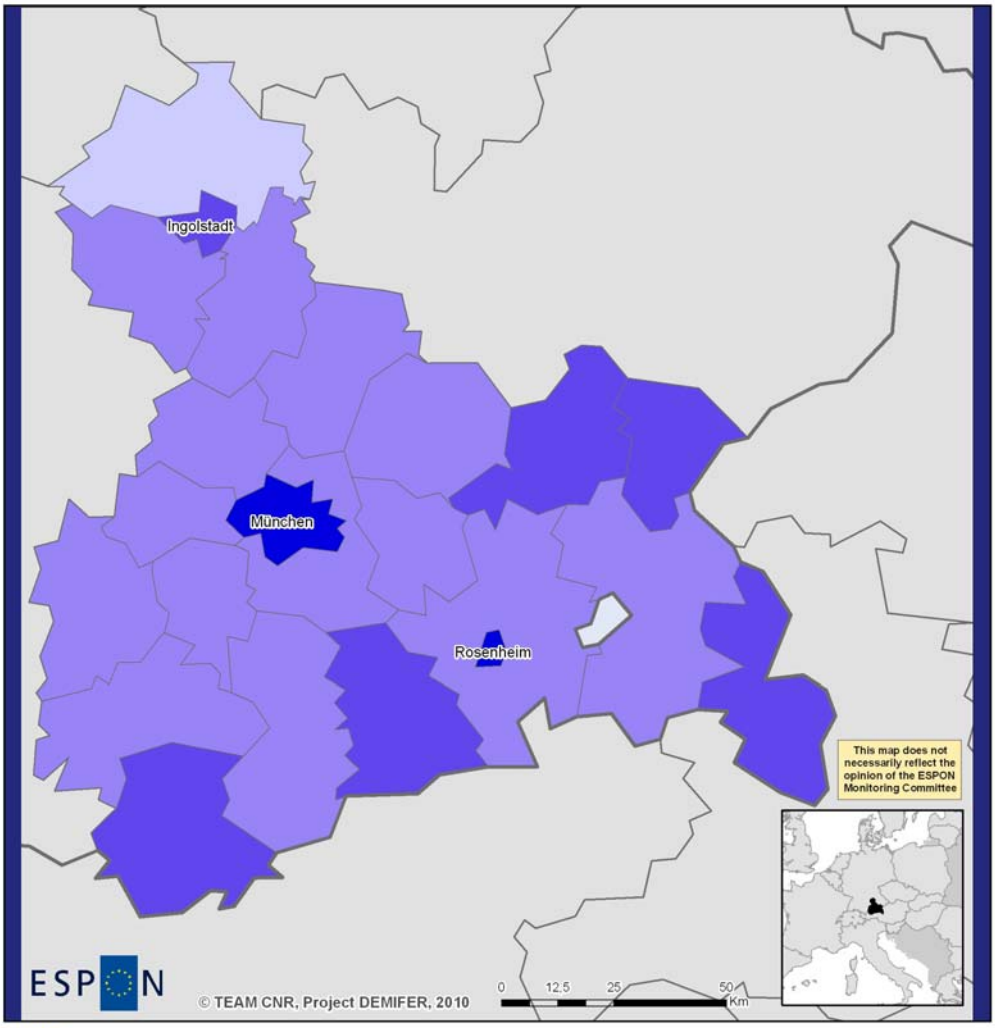
Source: elaborations on AGL, 2010, and BBSR, INKAR CD-Rom, 2009.

Gross domestic product (GDP) and its change over time are used as an indicators for economic output and for economic growth. Germany's GDP was – in the average of the last decade – about a quarter higher than that of the EU-27. But since the year 2000 the growth of German GDP was weaker than in Europe. In 2007 – representing the most recently available regional data – the GDP per capita in Purchasing Power Parities of Oberbayern amounted to 41000 €. It was more than 65 percent above the EU-27 average, about 49 percentage points above the German national level and is still a quarter higher than the NUTS1 region Bayern. This is almost the highest value in Germany, only second to Hamburg. Oberbayern is one of the economically most dynamic regions in Germany.

Within Oberbayern the regional disparities in GDP per capita are the most pronounced of the three case study regions. The maximum of 86,000 € in the county of München, which is surrounding the municipality or city of München, is almost five times higher than the minimum of the county of Fürstenfeldbruck.

The gradient between the counties shows no relationship to the settlement structure. The ‘poorer’ counties are located in the vicinity of the capital and in the periphery. Only three counties have a very high income level, but 16 of the 23 counties reach have an economic output significantly under the regional average. Nevertheless the study area is one of the richest areas of Germany.
Unemployment is low in Oberbayern and its NUTS3 regions compared to the situation in Bavaria and Germany. The Labour Force Survey indicates a level of 4.5 % in 2002 and 3.4 in 2008. Unemployment is somewhat higher in the city of Munich and in the other urban counties. Small regional differences in the unemployment rate exist.

Map 12 Unemployment in München and its region (DE21 Oberbayern), 2007



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Local level: NUTS3
Source: BBSR, INKAR CD-Rom, 2009
Origin of data: Federal Statistical Offices, 2009
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Legend

Unemployment rate 2007 (in %)

- 2,400000 - 3,000000
- 3,000001 - 5,000000
- 5,000001 - 7,000000
- 7,000001 - 8,300000

4.2. Changes in the working age population

Table 10 Working age population and its dynamic in München and its region (DE21 Oberbayern), 2000-2007

Counties/ Regional planning regions/ Case study area	Working age population											
	31.12.2007				31.12.1990 (31.12.2007=100)				31.12.2023 (31.12.2007=100)			
	Total	15-29	30-44	45-64	15-29	30-44	45-64	15-64	15-29	30-44	45-64	15-64
Ingolstadt (city)	81,712	28.6	33.9	37.5	101	82	90	90	98	105	115	107
München (city)	881,830	26.9	37.3	35.9	118	88	105	102	98	84	115	99
Rosenheim (city)	40,642	27.2	33.9	38.9	125	86	87	97	103	100	110	105
Altötting	70,828	26.6	32.4	41.0	117	90	83	94	88	89	108	97
Berchtesgadener Land	65,898	26.8	33.0	40.2	119	85	87	95	93	95	116	103
Bad Tölz-Wolfratshausen	79,658	25.8	34.4	39.8	111	80	85	90	99	97	123	108
Dachau	91,849	25.0	35.5	39.5	107	81	79	87	105	101	123	111
Ebersberg	83,360	24.5	35.9	39.5	112	76	84	88	110	103	128	115
Eichstätt	82,368	28.7	33.6	37.7	104	82	76	86	94	98	122	106
Erding	85,483	26.3	36.6	37.2	100	69	70	77	108	101	137	116
Freising	114,044	27.2	36.9	35.9	106	72	72	81	106	107	136	117
Fürstenfeldbruck	133,817	24.4	34.6	41.0	124	88	91	98	108	102	118	110
Garmisch-Partenkirchen	55,494	25.6	34.3	40.1	137	83	94	101	93	89	119	102
Landsberg am Lech	75,999	25.2	35.2	39.6	108	75	70	81	107	98	132	114
Miesbach	62,361	25.1	34.4	40.5	121	82	88	94	100	96	122	108
Mühldorf a. Inn	73,333	26.7	33.3	40.0	113	84	81	91	96	96	120	106
München	209,516	24.3	35.5	40.2	115	81	91	94	112	108	124	115
Neuburg-Schrobenhausen	60,916	27.6	33.2	39.2	110	86	78	90	96	99	119	106
Pfaffenhofen a.d. Ilm	79,394	26.7	34.3	38.9	102	80	73	83	97	101	124	109
Rosenheim	164,578	25.8	33.8	40.4	107	80	74	84	98	96	122	107
Starnberg	84,832	23.7	34.7	41.7	118	82	90	94	111	104	124	114
Traunstein	110,329	26.1	32.7	41.1	119	87	83	94	91	91	115	101
Weilheim-Schongau	86,208	26.3	33.3	40.4	107	82	81	88	97	96	119	106
Ingolstadt	304,390	27.9	33.8	38.3	104	82	79	87	96	101	120	107
München	1,760,730	25.9	36.4	37.6	115	83	93	95	103	93	121	106
Oberland	283,721	25.8	34.0	40.2	117	82	86	93	97	95	121	106
Südostoberbayern	525,608	26.3	33.2	40.5	115	84	81	91	95	94	117	103
Total	2,874,449	26.2	35.3	38.5	114	83	89	93	100	94	120	106

Source: elaborations on BBSR- Bevölkerungsprognose 2005-2025 data base, 2010.

4.3. The role of migration

Table 11 Foreigners employed and unemployed in München and its region (DE21 Oberbayern), 2007

Counties/ Regional planning regions/ Case study area	Foreigners - employed (social inscurance)	Foreigners - employed as share of total employed	Foreigners - unemployed
Ingolstadt (city)	364.9	7.1	56.8
München (city)	388.5	15.0	66.4
Rosenheim (city)	348.0	9.2	86.2
Altötting	610.0	9.9	54.1
Berchtesgadener Land	313.1	10.3	35.4
Bad Tölz-Wolfratshausen	320.2	8.4	46.6
Dachau	288.1	12.3	49.9
Ebersberg	346.9	10.1	39.7
Eichstätt	276.1	5.4	32.2
Erding	294.7	7.9	47.5
Freising	582.2	13.0	37.3
Fürstenfeldbruck	257.5	10.6	53.7
Garmisch-Partenkirchen	351.0	9.0	41.8
Landsberg am Lech	300.7	6.1	43.1
Miesbach	419.1	9.4	52.8
Mühldorf a. Inn	227.7	4.4	72.8
München	647.1	12.2	41.9
Neuburg-Schrobenhausen	270.3	5.5	41.8
Pfaffenhofen a.d. Ilm	238.0	5.3	37.4
Rosenheim	380.0	8.7	43.2
Starnberg	379.4	11.0	35.2
Traunstein	381.2	6.3	40.4
Weilheim-Schongau	349.6	6.6	59.0
Ingolstadt	309.3	6.2	46.3
München	406.2	13.6	59.7
Oberland	356.7	8.2	50.2
Südostoberbayern	374.0	8.1	52.2
Total			

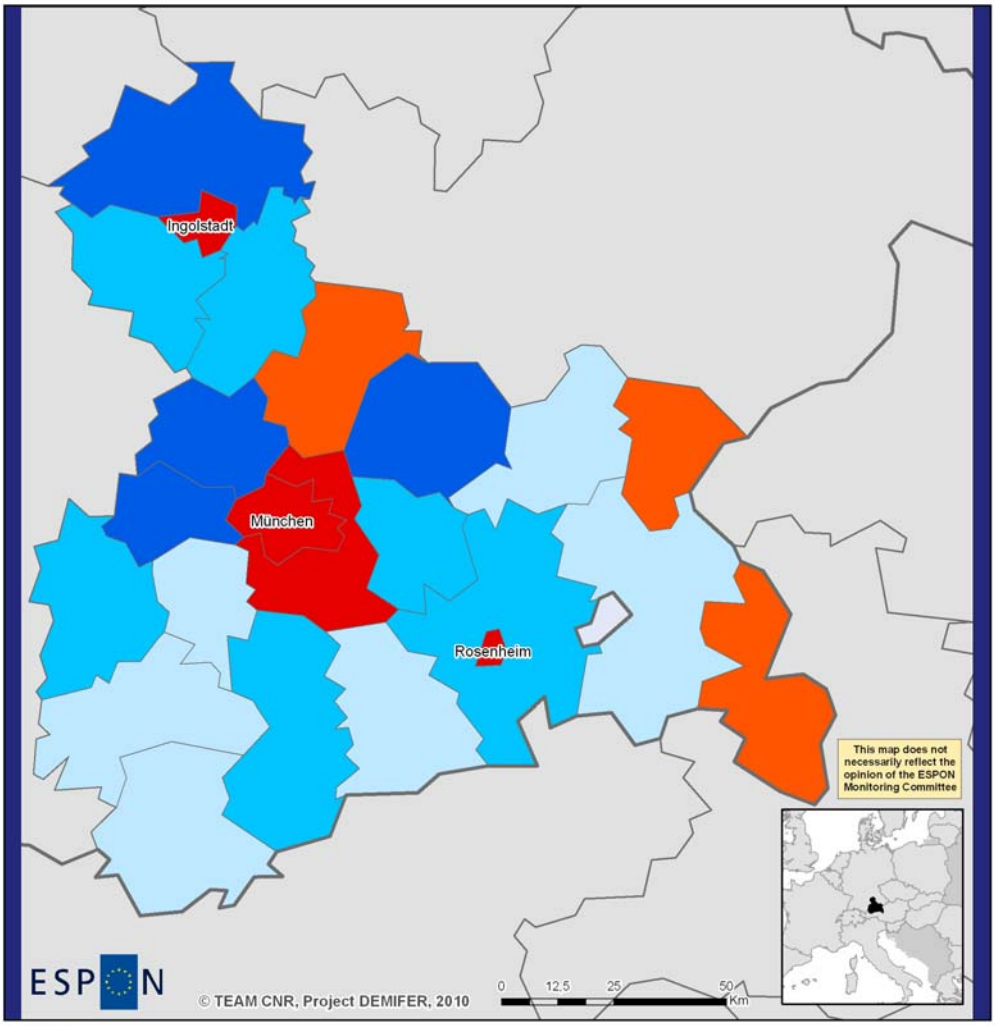
Source: BBSR, INKAR CD-Rom, 2009.

5. Economic change and population: other aspects of the case study region and its sub-divisions

Oberbayern is a region characterised by the state capital of München and its economic and political importance. This important centre plays a special role in the case study area as an engine of economic growth for the surrounding counties and as the of an important local labour market area. The suburban area of München expanded continuously over the last decades, creating ever new housing developments, which are continuing today (see Map 14 with high building activities in a belt around München), and causing ever more commuter flows in the agglomeration. Map 13 gives an idea of the importance of München for the daily commuter flows. The city of München, together with its surrounding county are at a centre of counties feeding every day commuter flows. The other,

but less important, poles of attraction of flows are Ingolstadt and Rosenheim. München has the characteristic to expand its commuter area, as show map 15 with commuter flows longer than 50 km. The economic role of Munich allows the surrounding counties to increase their population. Munich, as shown, attracts interregional and international migrants, and looses population to its surrounding areas, where housing is more affordable and/or corresponds to the preferences of young families.

Map 13 Net commuting in München and its region (DE21 Oberbayern), 2007



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Local level: NUTS3
Source: BBSR, INKAR CD-Rom, 2009
Origin of data: Federal Statistical Offices, 2009
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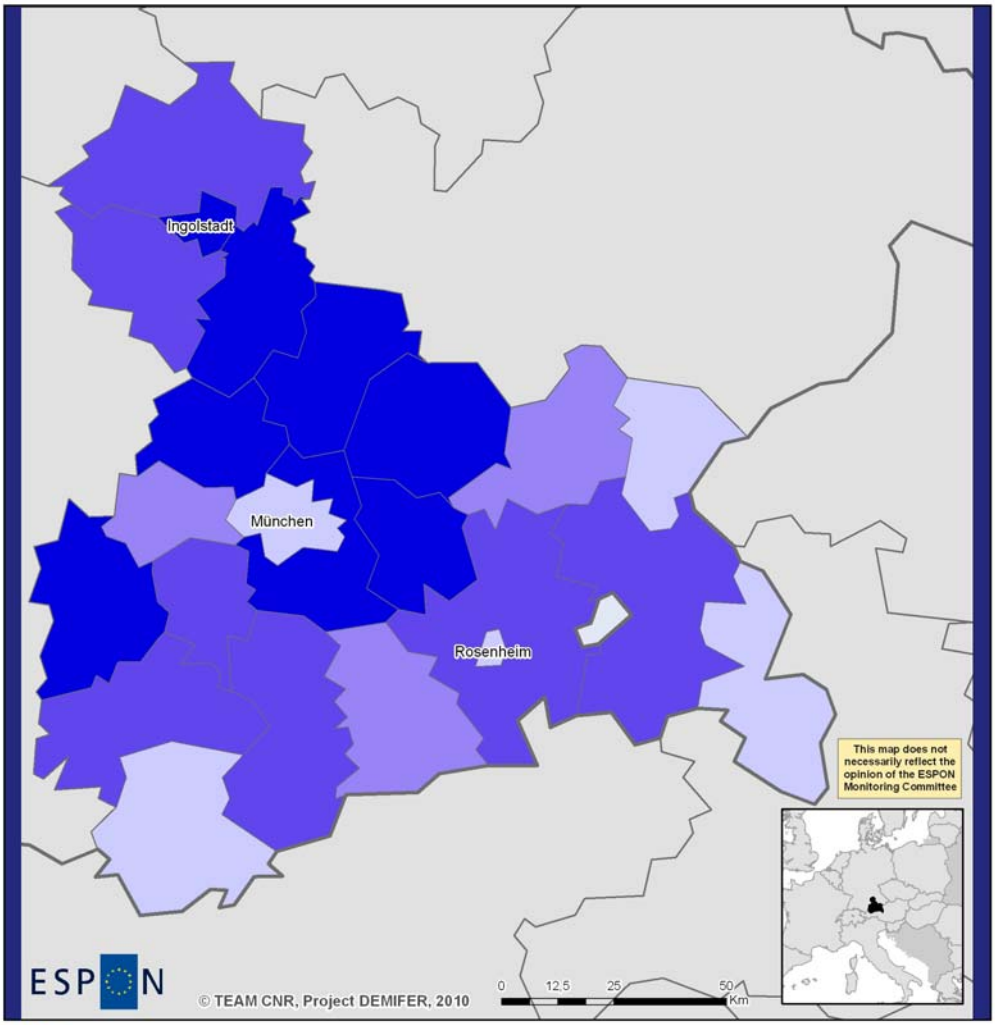
Legend

Net comuting 2007 (in ‰)

- less than -500
- -500 to -250
- -250 to 0
- 0 to +250
- more than +250

Map 14 New housing in München and its region (DE21 Oberbayern), 2007



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Local level: NUTS3
Source: BBSR, INKAR CD-Rom, 2009
Origin of data: Federal Statistical Offices, 2009
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Legend

New dwellings 2007 (in ‰)

- 7.0 and less
- 7.0 to 9.0
- 9.0 to 11.0
- more than 11.0

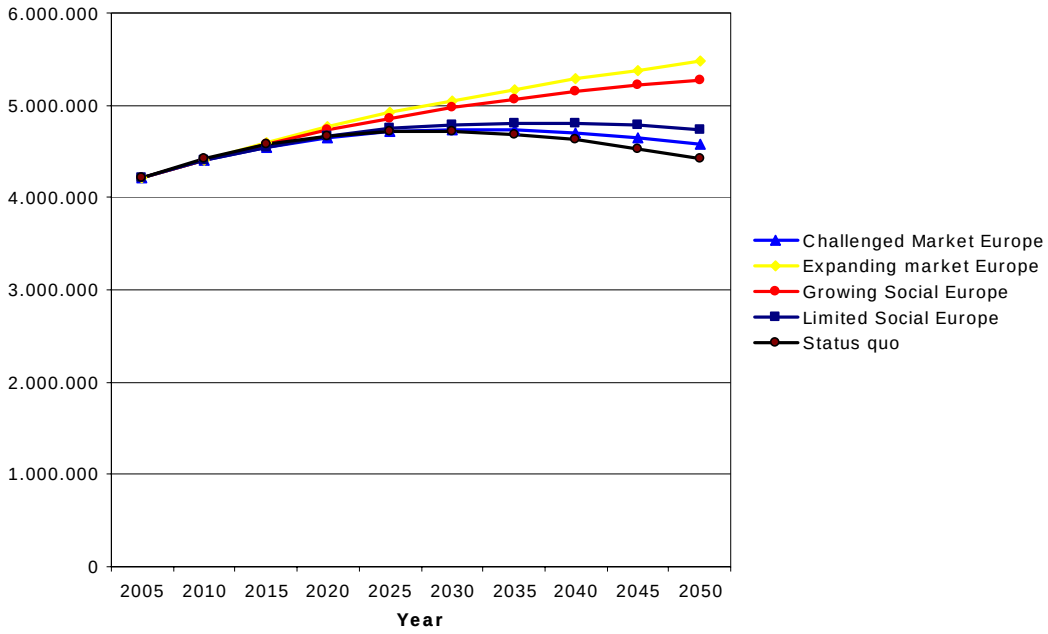
Map 15 Commuting flows in München and its region (DE21 Oberbayern), 2007

Source: personal communication by Thomas Pütz, BBSR, 2010.

6. Economic and social consequences of demographic change in the case study region and its sub-divisions

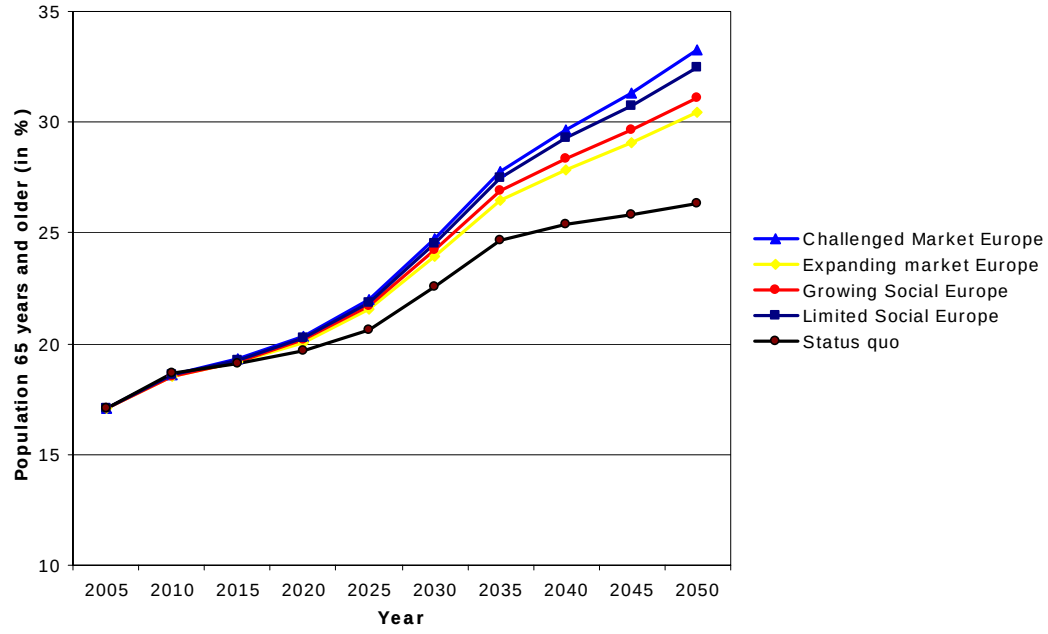
7. Population ageing at the regional level and the DEMIFER scenarios

Figure 3 Population change according to the DEMIFER scenarios in München and its region (DE21 Oberbayern), 2005-2050



Source: DEMIFER Scenarios, 2010.

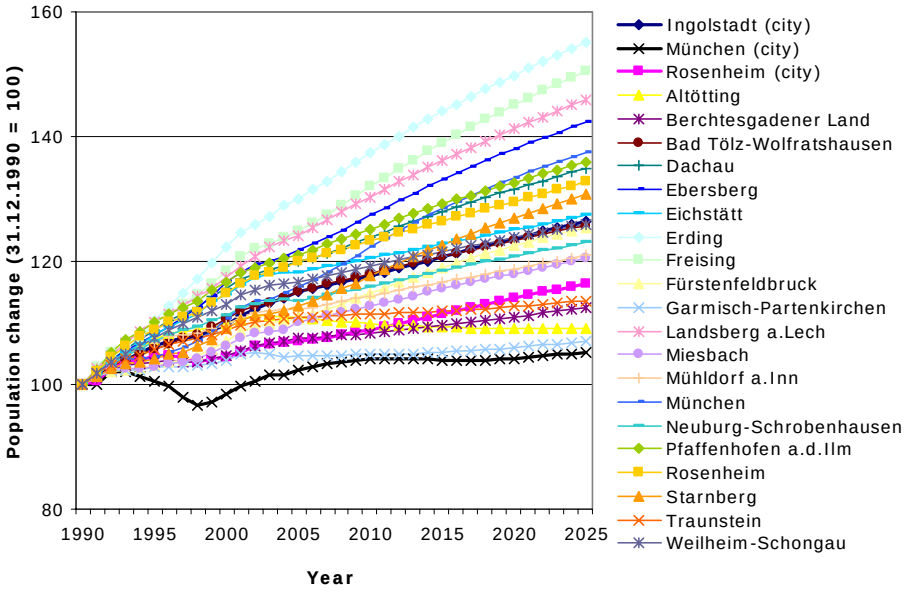
Figure 4 Population ageing according to the DEMIFER scenarios in München



and its region (DE21 Oberbayern), 2005-2050

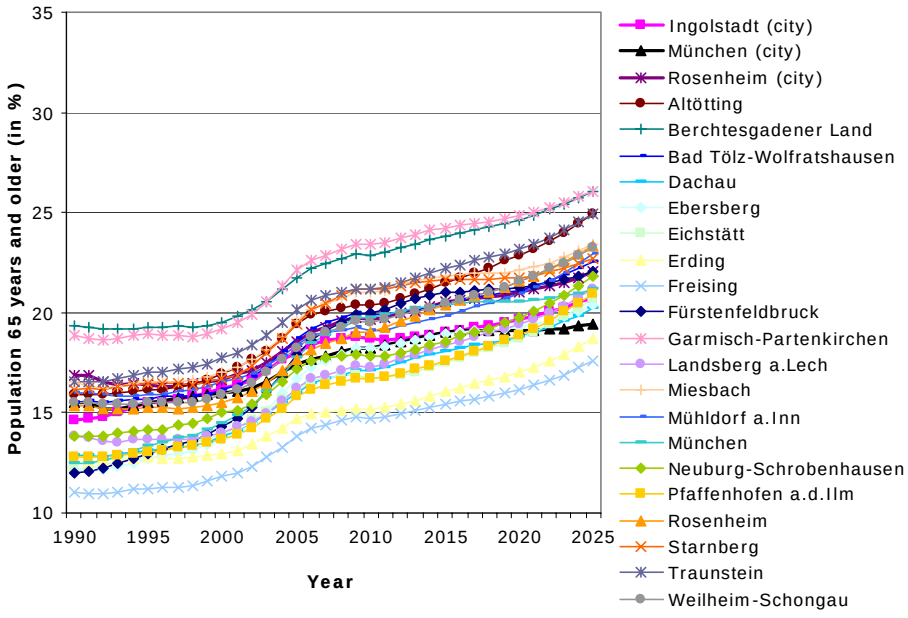
Source: DEMIFER Scenarios, 2010.

Figure 5 Population change according to the BBSR status-quo projection in München and its region (DE21 Oberbayern), 2005-2025



Source: BBSR- Bevölkerungsprognose 2005-2025 data base, 2010.

Figure 6 Population ageing according to the BBSR status-quo projection in München and its region (DE21 Oberbayern), 2005-2025



Source: BBSR- Bevölkerungsprognose 2005-2025 data base, 2010.

According to all DEMIFER policy scenarios the population of Oberbayern will be higher in 2050 than today. Whereas this increase is continuous in the case of the Expanding Market Europe (+30.0 %) and the Growing Social Europe (+25.3%), in the case of Challenged Market Europe the population of Oberbayern will grow

to 4.8 million in 2035 to decline thereafter following the path indicated by the Status Quo scenario. As expected, population ageing is relative limited with estimates of the share of the population 65 years and older above 30 %.
The BBSR population projections confirm for the period until 2025 a trend of population growth in Oberbayern. The growth path is a little bit lower than the DEMIFER Status Quo scenario. This demographic growth is expected to take place in the suburban areas of the two major urban centres. For the city of Munich only a slight increase is expected. The regional differences in the study area will widen. The population of Oberbayern will continue to age, but at a slow path for the next decades. The regional disparities in the ageing process will continue to be observed.
Also the official Bavarian population projections expects a population increase in Oberbayern of 7.6 % between end 2008 and end 2028 under the condition that observed demographic trends will continue for the next years. Oberbayern is the only Bavarian area that will increase demographically in the near future with a concentration of the increase in Munich and its surrounding area and in Ingolstadt. Even with an increasing population the ageing process will continue, but Oberbayern will stay the youngest of the NUTS2 regions of Bavaria.

8. Conclusions and the policy implications of demographic challenges in the case study region

9. References

BBSR, 2010, Raumbeobachtung des Raumbeobachtungssystem des Bundesinstitut für Bau-, Stadt- und Raumforschung (BBSR) im Bundesamt für Bauwesen und Raumordnung (BBR) - http://www.bbsr.bund.de/BBSR/DE/Raumbeobachtung/raumbeobachtungde__node.html

Bayerische Staatsregierung. Bayerisches Staatsministerium für Wirtschaft, Infrastruktur, Verkehr und Tecnologie, 2009, 16. Raumordnungsbericht. Bericht über die Verwirklichung des Landesentwicklungsprogramms und über räumliche Entwicklungstendenzen in Bayern 2003–2007 http://www.landesentwicklung.bayern.de/fileadmin/Dokumente/PDF/Raumbeobachtung/Raumordnungsbericht_16/ROB_2009_ebook_100dpi.pdf

Dheus, 1988, München – Ruhrgebiet. Strukturwandel und Entwicklungsperspektiven des Oberzentrums München im Vergleich mit den vier grossen Oberzentren Duisburg, Essen, Bochum und Dortmund im Ruhrraum. Münchner Statistiche Hefte 180 – 212

Kemper, Franz-Josef , 2004, Internal Migration in Eastern and Western Germany: Convergence or Divergence of Spatial Trends after Unification? Regional Studies, 38, 6, 659 - 678

Kemper, Franz-Josef , 2008, Residential mobility in East and West Germany: mobility rates, mobility reasons, reurbanization. Zeitschrift für Bevölkerungswissenschaft, 33, 3-4, 293 - 314

Kontuly, Thomas; Vogelsang, Roland; Schön, Karl Peter; Maretzke, Steffen, 1997, Political unification and regional consequences of German East-West migration.. International Journal of Population Geography, 3, 31-47

Pichler, Edith Pichler, Edith, Pioniere, Arbeitsmigranten, Rebellen, Postmoderne und Mobile: Italiener in Berlin, in Friedrich-Ebert-Stiftung in Verbindung mit dem Institut für Sozialgeschichte e.V. Braunschweig-Bonn (a cura di),

Archiv für Sozialgeschichte. - Bd. 42 Arbeitsmigration in Deutschland nach 1945., Bonn, 2002, pp. 257-274

Pichler Edith, Pioniere, Arbeitsemigranten, Rebellen, Postmodern und Mobile: Italiener in Berlin, Archiv für Sozialgeschichte, Volume XLII/2002

10. Annex: Data reported in tables, graphs and maps

Table 12 NUTS 3 regions of München and its region (DE21 Oberbayern)

Id NUTS3	Id County	Name	Regional planning region
DE211	9161000	KS Ingolstadt	Ingolstadt
DE212	9162000	KS München	München
DE213	9163000	KS Rosenheim	Südostoberbayern
DE214	9171000	Altötting	Südostoberbayern
DE215	9172000	Berchtesgadener Land	Südostoberbayern
DE216	9173000	Bad Tölz-Wolfratshausen	Oberland
DE217	9174000	Dachau	München
DE218	9175000	Ebersberg	München
DE219	9176000	Eichstätt	Ingolstadt
DE21A	9177000	Erding	München
DE21B	9178000	Freising	München
DE21C	9179000	Fürstenfeldbruck	München
DE21D	9180000	Garmisch-Partenkirchen	Oberland
DE21E	9181000	Landsberg a.Lech	München
DE21F	9182000	Miesbach	Oberland
DE21G	9183000	Mühldorf a.Inn	Südostoberbayern
DE21H	9184000	München	München
DE21I	9185000	Neuburg-Schrobenhausen	Ingolstadt
DE21J	9186000	Pfaffenhofen a.d.Ilm	Ingolstadt
DE21K	9187000	Rosenheim	Südostoberbayern
DE21L	9188000	Starnberg	München
DE21M	9189000	Traunstein	Südostoberbayern
DE21N	9190000	Weilheim-Schongau	Oberland

Please see separate MS Excel file.