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# CONTEMPORARY DEMOGRAPHIC PROCESSES IN THE WESTERN BORDERLAND OF UKRAINE

**ABSTRACT.** The paper presents major tendencies within the demographic changes in the western borderland of Ukraine, i.e. in three Regions: Volyn, Lviv and Transcarpathian ones. The period of the analysis comprises the 90s of the 20<sup>th</sup> century, which are the times of the socio-economic transformation of the state.

In the western Regions in the second half of the 90s, like in the whole area of Ukraine, a significant depopulation took place. It resulted from the interference of general long-term European trends and domestic factors, with the economic crisis among others.

The aim of this work is to present population changes in the western borderland with regard to its Regions and the differentiation between the city and the village as well as to determine the major conditions of the occurring changes. The article also presents a spatial differentiation of population processes with respect to districts and cities under Region jurisdiction. The final paragraphs deal with the most important results of population changes as visible mainly in the progressive ageing of the society and the increasing demographic dependency ratio.

**KEY WORDS:** western Regions of Ukraine, economic crisis, second demographic transition, depopulation.

#### INTRODUCTION

In the 90s the whole Ukraine, including the borderland area, became the background for a number of processes and phenomena resulting from the political and socio-economic changes in this part of Europe. Among numerous and diverse aspects of those changes, the most important ones comprise

regaining political independence and starting economic reforms. The latter consisted in switching from a centrally-planned to market economy. On a scale of the borderland the opening of state borders was an essential element, which stimulated both the official international cooperation as well as the informal local trade exchange.

Economic transformations had their consequences in a number of extraeconomic processes, including demographic ones. The results of the transformations were reflected in the vital statistics of population, migrations and population structures. The decrease in the standard of living and difficulties in supporting the family were the main reasons for delaying decisions of getting married and having children. This weakened the rate of the population growth and then in turn resulted in the depopulation (*Demografična kryza...*, 2001; Semenjuk, 2001). The consequence of worse social conditions was also the increase in diseases and death rate.

Next, the lack of political stability in the state and the unconstrained possibility to cross the borders resulted in the increase in emigration abroad, which was mainly of economic character.

The mentioned population changes were stimulated by the fact that Ukraine opened up to the contacts and cooperation with the countries of Western Europe, where for a long time there have been functioning a different model of social attitude reflected mainly in the decreased reproduction of the population (Eberhardt, 2002).

What seems important is another approach towards the regression of population as existing in Ukraine. The problems that arose there have to be tackled from the perspective of the so called "second demographic transition" which in the 90s was typical of post-communist countries, including Ukraine. The transformation symptoms resulting from the "transition" are reflected in clear tendencies towards the weakening of the dynamics of the development of societies. It is caused by the decrease in the number of marriages and in the fertility rate with insignificant fluctuations of the death rate and migration (Kotowska, 1998; Rychtaříiková, 1999).

The fundamental aim of this paper is to present the population processes which occurred in three borderline Regions of Ukraine: Volyn, Lviv and Transcarpathian ones after 1991, when Ukraine regained independence, thanks to which there appeared new political, social and economic conditions. The analysis comprised the changes of the population growth and its components, i.e. natural increase and migration on a general scale as well as with their distribution in cities and in the rural areas.

The paper also presents the spatial diversity of demographic processes in the analysed area, both on the Region scale and in districts, as well as their regional and micro-regional conditions. Therefore, it is possible to mark the increasing role of local factors in the course of demographic changes.

The conclusion of the paper presents the most essential effects of Ukrainian population transformations, which are reflected mainly in the progressing ageing of the society and in the social problems which therefore arise.

### CHANGES IN THE NUMBER OF POPULATION IN THE BORDERLAND IN 1991-2001

The analysed borderline Regions together with a few neighbouring Regions constitute an area which is significantly different from the rest of the country. This refers both to the range of population changes and their dynamics in time. Regression in the number of the population appeared here a bit later than in the eastern part of the country and up to 2001 had been of a smaller scale. This clearly more favourable demographic situation was the consequence of historical, social and economic conditions of the analysed area.

Western Regions had a complex history and are of a strong ethnic and cultural diversity. These cultural differences had a strong influence on the contemporary attitude of the population towards social issues: durability of relationships, concept of marriage and procreation, attachment to tradition, and to a place of living. Currently, in a large part of western Regions (especially in the Transcarpathian one) the rural population prevails, whose basic value is a family with many children.

Different pathological phenomena, which were common for Ukraine, do occur in the western borderland but on a much smaller scale. It is reflected in the significantly lower indices of abortions, illegitimate births, suicides as well as in a smaller number of alcoholics and drug addicts. All this is a direct consequence of the fact that the western borderland was much less affected by russification and communism.

The level of the development and economic structure of western Regions had both a positive and negative influence on the population processes that occurred there. The demographic development was hindered by a number of factors typical for the majority of the analysed area: mono-functionality, an insufficient number of large urban and industrial centres providing jobs and one-sidedly developed industry in small towns. In the situation of the economic recession and the decline in certain industries, such areas did not guarantee the population the sources of income and a proper standard of living. This, in turn, led to the depopulation of certain areas.

On the other hand, however, a large number of the population was strongly tied to the countryside and had a possibility to take advantage of cheaper food. This resulted from the fact that the area was dominated by agricultural functions and a high percentage of the rural population. Thanks to all this, in the new reality the inhabitants were not strongly affected by the results of the economic reforms.

The relatively poor development of large industrial plants in Western Ukraine had also a positive effect as reflected in lower environmental contamination and a smaller number of accidents, injuries and deaths at work.

Borderline location was another advantage of the western Regions. In the years of communism they were disregarded in economic plans (Rudenko, Starostenko, Chomra, 1995). In the transformation period they obtained new chances of economic development through the borderline trade as well as Polish-Ukrainian economic ventures (Powęska, 1995; Eberhardt, 1996; Lucyšyn, 1998). All that stimulated the economic activity, entrepreneurship and spatial mobility of the population. It also boosted the development of some cities and rural areas of the borderline area.

Despite the presented here mutual characteristics, every analysed Region had its own specifics in terms of demographic processes. It was the consequence of additional regional differentiation of the factors determining the population situation. In this connection, the borderline transformations were not analysed together for this area but separately for particular Regions.

Generally, the decline in the population number in the whole of Ukraine started in 1993 and by 2001 it was almost 2.9 million people, i.e. about 5.7%. However, in cities average annual population losses were twice as high as in the village and by 2001 the population number in cities decreased by around 1.9 million people whereas in the village by 1.1 million.

Table 1. Population number in borderline Regions of Ukraine in 1991-2001 (in thousands of people)

		1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001
NO NO	TOTAL	1,069.0	1,072.7	1,077.6	1,080.7	1,078.3	1,075.2	1,071.8	1,067.9	1,063.9	1,058.7	1054.2
Regi	Towns	539.8	549.2	555.5	559.5	559.5	558.3	556.4	555.5	554.4	552.9	549.5
Volyn Region	Rural Areas	529.2	523.5	522.1	521.1	518.8	516.9	515.4	512.4	509.5	505.8	504.7
Z	TOTAL	2,764.4	2,771.3	2,776.9	2,778.3	2,770.3	2,761.5	2,750.6	2,739.6	2,728.6	2716.6	2703.3
LVIV REGION	Towns	1,660.5	1,676.7	1,688.2	1,693.6	1,690.4	1,683.6	1,674.1	1,666.9	1,658.5	1651.7	1644.0
LVIV	Rural Areas	1,103.9	1,094.6	1,088.7	1,084.7	1,079.9	1,077.9	1,076.5	1,072.7	1,070.1	1064.9	1059.3
HAN	TOTAL	1,265.9	1,271.6	1,281.4	1,286.7	1,288.1	1,288.1	1,288.6	1,288.2	1,287.4	1284.0	1282.0
SCARPATI REGION	Towns	529.3	535.8	530.2	529.3	513.2	504.2	503.3	502.7	501.6	500.2	499.1
TRANSCARPATHIAN REGION	RURAL AREAS	736.6	735.8	751.2	757.4	774.9	783.9	785.3	785.5	785.8	783.8	782.9

Source: Demographic Statistical Yearbook of Volyn, Lviv and Transcarpathian Regions from 1991-2001.

In Volyn and Lviv Regions the population number had yet been growing until 1994, however more slowly than before (Table 1). It was only from that year that the population number started to decline with a clear regressive tendency. Finally, in Lviv Region the population number dropped to 2001 by 75,000 people, i.e. by 2.7%. In Volyn Region it fell by more than 24,000 people (2.4%) and it was one of the lowest declines in the whole of Ukraine.

A particular situation took place in Transcarpathian Region, where the exceptional autonomy of demographic processes was noticeable not only in 1990s but also before that period (Pan'kiv, 2003). The regression in the population number occurred here at the latest of the whole country – in 1997 and as a result was 6,600 people, which constituted as little as 0.5% of all the population. Thus, it appeared to be the lowest in the country.

As for the city depopulation, in Lviv and Volyn Regions it became a new phenomenon, different from previous tendencies. It resulted to a great extent from the inhibition of years-long post-war urbanization processes. In the above mentioned Regions it began in the mid 90s and remained on a relatively constant level. The fall in the number of urban population was here much lower than generally in Ukrainian cities and in 2001 was 1.8% in Volyn Region and 2.9% in Lviv Region.

In contrast, in the above mentioned Regions the village population decreased through the whole post-war period, mainly due to the emigration to cities. However, from the time of regaining independence, the population number in both Regions slightly decreased and finally in 1991-2001 the village population number dropped by 4.6% in the Volyn Region and by 4.0% in Lviv Region.

In the third of the analysed Regions - Transcarpathian, the changes in the population number were determined by the changes in rural areas. In 1991-2001, despite the fluctuations in the population growth, the population number increased by 6.2%. The process can be seen as a symptom of the ruralisation of the Region, which resulted from the economic crisis in the local cities. The greatest population growth of Transcarpathian Region took place in the first half of 90s. It was mainly caused by administrative changes due to which a few of the local cities lost their urban status. Therefore, the population number in the Region cities started to decrease in 1992 and stabilized as late as in 1996. As a result, in 2001 the population number of Transcarpathian Region cities was lower than in 1992 by 36,700 people, i.e. by 6.8%.

### CHARACTERISTICS OF VITAL STATISTICS OF POPULATION

The transformation period in the western part of Ukraine, like in the whole country, was characterized by negative tendencies reflected in the values of the basic indices of vital statistics of population. The decline in the birth rate and increase in the death rate were typical of that period. This naturally led to the decrease in the natural increase rate, down to negative values.

The above phenomena were evoked by the same factors which in 1990s occurred in the whole of Ukraine. In the western part of the country, however, they were significantly modified and affected by regional and local conditions. Therefore, they occurred with a certain delay to other Regions. This is why in 2001 the indices of vital statistics of population in the borderland area were more favourable than the Ukrainian average.

In 2001 the highest birth rate was characteristic for the typically agricultural Regions: Volyn and Transcarpathian ones. The index of the death rate was the most favourable in Transcarpathian Region whereas in Lviv and Volyn Regions it was a bit higher (Table 2).

In 1991-2001 greater changes were noticeable in terms of the birth rate and smaller ones concerned the death rate. In the analysed Regions the death rate increased by 1.5‰ on average whereas the birth rate declined by over 3‰ (Table 2).

Table 2. Vital statistics of population in western Regions of Ukraine in 1991-2001 (in ‰)

	_	BIRTHS		DeA	ATHS	NATURAL INCREASE		
		1991	2001	1991	2001	1991	2001	
NO O	TOTAL	14.2	10.9	12.2	14.0	2.0	-3.1	
Regi	Towns	15.0	9.4	8.8	11.3	6.2	-1.7	
Volyn Region	Rural Areas	13.4	12.4	15.6	17.1	-2.2	-4.7	
Z	TOTAL	13.6	8.8	11.2	12.3	2.4	-3.5	
REGIC	Towns	13.2	8.4	8.6	10.4	4.6	-2.0	
Lviv Region	Rural Areas	14.3	9.4	15.2	15.3	-0.9	-5.9	
AN	TOTAL	16.6	10.7	10.2	11.2	6.4	-0.5	
PATH ON	Towns	15.3	9.7	8.8	10.6	6.5	-0.9	
Transcarpathian Region	Rural Areas	17.5	11.4	11.1	11.6	6.4	0.2	

Source: Demographic Statistical Yearbooks of Volyn, Lviv and Transcarpathian Regions from 1991-2001 and the unpublished data from Local Statistical Offices.

To a certain extent the decline in the birth rate can be connected with the decreasing number of marriages. However, what seems the most important here, is more and more difficult economic situation of the population as well as the legal liberty of abortion. The increased death rate was mainly the result of the progressing ageing of the Ukrainian population (Rudnickij, 1989) and worsening living conditions.

Also the equal balance between the birth and death rates in western Regions occurred with a several-year shift in relation to the whole of Ukraine. While at the beginning of the 90s the country was at "the second demographic transition", the western Regions were in the last phase of the "first demographic transition". "The second transition" started here a bit later, i.e. in the mid 90s and in the case of Transcarpathian Region as late as at the end of the past decade.

In Volyn and Lviv Regions the negative natural increase rate was recorded for the first time in 1995 and from then on it constantly decreased. In contrast, for most of the analysed period the population rate in Transcarpathian Region was positive and only as late as in 1999 it dropped below 0‰. In 2000 it was positive and in 2001 it fell to about -0.5‰ (Table 2).

The absolute rate of population loss evoked by the negative natural increase was different in particular Regions. In 1995-2001 in Lviv Region it was over 40,000 people whereas in Volyn one it was about 15,000 people. In Transcarpathian Region the natural population loss was scarce and was slightly above 1,000 (On the basis of Demographic Statistical Yearbooks of the Lviv, Volyn and Transcarpathian Regions from 1991-2001).

Like in the whole of the country, also in the western borderland there were large differences in the natural increase between the city and the village. Generally, rural areas were characterized by a higher than in cities birth rate and at the same time by a high death rate. As a result the natural increase rate was much lower in the village in comparison to the city.

In 2001 the birth rate in the cities of all the three Regions was between 8% and 10%. In the village it ranged from 9% to about 12%. The highest birth rate indices in the village and in the city were typical of the Region of Volyn.

In 2001 Volyn Region had the highest death rate both in the village and in the city. In the other two Regions, the cities of Lviv Region and the rural areas of Transcarpathian Region were in a more favourable situation in terms of the death rate (Table 2).

The natural increase in the city and in the village started to have negative values at different times in particular Regions. At the earliest, i.e. in 1997, it appeared in the cities of Lviv Region. Therefore, it had the lowest value of all the three Regions. In the cities of Volyn and Transcarpathian Regions the negative natural increase rate occurred for the first time in 1999. Its values were there more favourable than those in Lviv.

The natural increase in rural areas was running in a reverse direction. In Volyn and Lviv Regions it was negative already in the times of socialism. And yet after the break-up of the Soviet Union, in a new political system there occurred its further decline (greater in Lviv Region), interrupted by one-year increases. In Transcarpathian Region the natural increase rate also declined, but its negative value was recorded only once in 1999 within the whole period of 1991-2001 (Table 2).

### POPULATION MIGRATIONS

For the presented changes in the population number in the borderland area, inter-region and international migrations were of primary importance and they were determined by economic reasons. However, their role in shaping the population growth varied as for particular Regions. In Lviv Region, the migration population loss was connected mainly with inter-region migrations whereas in Volyn and Transcarpathian Regions with international migrations.

In 1991-2001 all the three Regions were characterized by a negative migration balance of both inter-region and international character, which in both cases was higher in Lviv Region. In the analysed years the migration balance in particular Regions was as follows: in Volyn Region – inter-region migrations: -1,845 people, international migrations: -9,275 people, in Lviv Region – inter-region migrations: -30,399 people, international migrations: -5,849 people, in Transcarpathian Region – inter-regional migrations: -5,150 people, international migrations: -7,094 people. The final balance of interregion migrations in the borderland was -37,400 people whereas of international migrations -32,200 people (Unpublished data from the Central Statistical Office in Kiev).

Inter-region migrations were of seasonal character and their significance in the 90s increased. At the beginning it was the rural population that migrated. In 1991 those people constituted almost 80% of the total of immigrants and emigrants in Lviv Region and almost 70% in Volyn and Transcarpathian Regions. Their share declined at the end of the 90s when more and more rural inhabitants started to leave for other parts of the country in search of jobs and wages (Romaniuk, 1998; Pan'kiv, 2003).

Inter-region migrations took place mainly within neighbouring areas, i.e. the three borderline Regions as well as the Regions of Ivano-Frankivsk, Rivne and Ternopil. Moreover, a great part of emigrants headed for farther but better-developed Regions of the country, e.g. to the ones of Kharkiv, Cherkasy and Dnipropetrovsk. Another popular migration destination was the capital of the country – Kyiv (*Migracijni procesy v L'vivs'kij oblasti...*, 2001; *Migracijni procesy v oblasti...*, 2002; *Naselennja Zakarpats'koji oblasti...*, 2001).

International migrations were of permanent or temporary character. Their main destination remained, like in the times of communism, the former Soviet Union republics, defined as "near foreign countries". However, from the mid 1990s this share started to decline to the advantage of "far foreign countries", namely other non–Russian countries (Upublished data from the Central Statistical Office in Kiev). The most frequent destinations for permanent migrations were countries like the USA, Canada, Germany and Israel. For temporary migrations

people went to Russia, Poland, Byelorussia, Hungary, the Czechs and Slovakia (Migracijni procesy v L'vivs'kij oblasti..., 2001; Migracijni procesy v oblasti..., 2002; Naselennja Zakarpats'koji oblasti..., 2001).

Apart from inter-region and international migrations, what influenced the population number in particular Regions, districts and places was the intra-region migrations.

A distinctive feature of the 90s was the shift from the direction: village-city, which dominated earlier, into the city-village, which gained greater and greater significance (*Demografična kryza...*, 2001). Looking for jobs and financial means became the main reason for these migrations. The migrations concerned the ones to big cities both from villages and from smaller settlements. They were also come-back migrations to home villages, which was connected with the loss of the urban wage source. It was also then that a new phenomenon began. It was a dispersion of the population of large urban areas and their moving around to neighbouring rural areas.

The most intense migrations within the Regions were recorded in borderland at the beginning of the 90s, when the living conditions worsened drastically. Their largest scale occurred in Lviv Region, which had a relatively high economic potential, concentrated in different parts of the Region. Their smallest scale was in Transcarpathian Region, where rural estates prevailed and the economy was dominated by agriculture and forestry.

Despite the new tendencies in intra-region migrations, their final result was a positive migration balance in cities, which in 1991-2001 was 9,600 people in Lviv Region, around 2,200 in Volyn and 3,800 in Transcarpathian Region (Unpublished data from the Central Statistical Office in Kiev).

## CHANGES IN THE POPULATION NUMBER IN DISTRICTS AND CITIES UNDER REGION JURISDICTION

A particular characteristic of the analysed demographic changes was their clear relationship with local conditions, mainly with the social and economic character of the area. Its influence is noticeable at the level of Regions and yet even better at the level of lower administrative units — districts and cities. However, it must be pointed out that at the current stage of development of Ukraine, with its randomly conducted reforms, a definite identification of these conditions is exceptionally difficult.

In order to establish the relationship between the population density and local factors influencing them, there were analysed 63 administrative units. These were 49 districts and 14 cities under Region jurisdiction, for which population dynamics was determined for years 1991-2001 (Fig. 1).

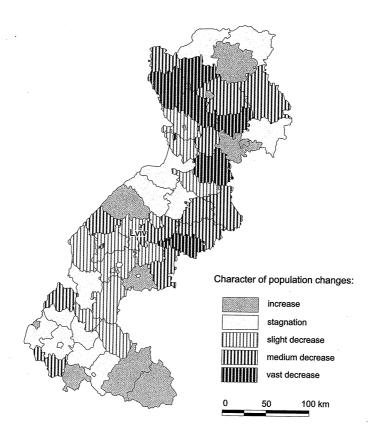


Fig. 1. Changes in the population number in districts and cities under Region jurisdiction in the western Regions of Ukraine in 1991-2001

Source: Self-calculations on the basis of data from statistical yearbooks of Volyn, Lviv, and Transcarpathian Regions in 1991-2001.

The regression of the population was a dominating tendency in the analysed units. It concerned almost 60% of them. It was mainly characterized by small or medium scale declines. A half of all the regressive units were in Lviv Region. In 2001 they comprised over 70% of the population of the districts affected by the depopulation in the western part of Ukraine. It can be concluded that the decline in the population in Lviv Region was the most important for the processes of the depopulation. A smaller share of the depopulation fell to the districts from Volyn Region and yet even smaller to Transcarpathian Region.

The second group in terms of a number was the one of cities and stagnating districts. They comprised almost ½ of all the units and of the whole population number. The least numerous ones within the analysed area were the cities and districts in which in 1991-2001 the population number grew. They constituted 18% of the total and concentrated almost 23% of the population (Fig. 1).

The established, for particular districts and Region cities, character of demographic changes was the result of the interaction of various factors: social, economic as well as environmental ones, which very often occurred together.

The regressive districts comprised the areas of varied landscapes, ranging from Volyn lowlands, through upland in Lviv Region to mountainous Transcarpathian Region. Their distinctive feature was their mono-functional character, which was mainly agricultural (Buski district), forest (Skolski district) or industrial, but dominated by one industrial branch (Mikolajovski district). Most of them were situated peripherally in relation to large urban-industrial centres. It is also essential that regressive districts were characterized by high unemployment, which to a certain extent reflected their bad economy.

The decline in population occurred also in a number of districts situated at the border with Poland. It means that at the present stage of political transformations it was not yet in the whole western borderland of Ukraine that there were fully activated economic and social processes, which would be beneficial to the population as it happens in other borderline areas of Poland and Europe (Powęska, 1995).

The districts with a population growth or stagnation of the number of the inhabitants were characterized by other different features – they were mainly multi-functional (Jaworowski, Samborski and Vinogradovski districts).

It is noticeable that a local economic situation was of basic importance for the demographic transformations in western Regions in the 90s, although it was not everywhere so. As it seems, the character of demographic transformations in certain areas could be determined by cultural features of local societies. These were such types of traditional attitudes as having a number of children, respecting the institution of marriage and being attached to family land. It concerned mainly the areas of a relatively high percentage of rural population, and in Transcarpathian Region – also of highlanders (Kamienski, Turecki and Rachovski districts) (Pan'kiv, 1998). These were districts of one-sidedly developed economy but at the same time of a stable population situation.

### CERTAIN EFFECTS OF POPULATION TRANSFORMATIONS

The regression of the population always stimulates a number of different phenomena and processes, which are often of negative character and unfavourably affect the future functioning and development of an area. In the western Regions of Ukraine the phenomena resulting from population changes are at different stages of development.

The most serious and dangerous for the future of the Regions is the process of ageing, which is of a specific character here. It is taking place mainly "from the bottom", i.e. through the decline in the number of births. The process of real

ageing connected with the increase in the number of old people – "ageing from the top" is of weaker intensity (Šablij, Hudzelak, Labinska, 2002). The constantly rising death rate and shortening of average life expectancy are the basic reasons for this.

In 2001 in comparison to 1989, in all three Regions there was observed a clear decrease in the ratio of children in the total number of the population. In Volyn Region the percentage of children declined by circa 3.5%, in Transcarpathian Region by almost 5%. The percentage of the elderly rose in Lviv Region by 3.2%, in Transcarpathian Region by 2.8% and in Volyn Region by 2.4% (*Sklad naseljennja Ukrajins'koji RSR...*, 1991; *Sklad nasseljenja Ukrajiny za stattju ta vikom...*, 2001).

The differences in the dynamics of particular groups in cities and in rural areas are very important in the transformations of the age structure. While the urban populations of the analysed Regions age "from the bottom" significantly more intensely than the rural ones (Šablij, Hudzelak, Labinska, 2002), the village of the western Regions ages "from the top" (Kusiński, 1996).

The changes within the structure of the population age in relation to an economic criterion were the consequence of the general ageing of the population. There was a clear drop in the percentage of people of the pre-productive age and a gradual growth in the post-productive age population. There was also a rise in the population of productive age, who in the future will gradually increase the post-productive group (Table 3).

Table 3. Number of people of pre-productive, productive and post-productive age in total population number in 1989 and 2001 (in %)

	VOLYN REGION		Lviv F	REGION	TRANSCARPATHIAN REGION		
	1989	2001	1989	2001	1989	2001	
PRE-PRODUCTIVE AGE	26.1	22.1	24.0	20.5	28.1	23.3	
PRODUCTIVE AGE	53.0	56.4	56.6	57.9	56.2	59.1	
POST-PRODUCTIVE AGE	20.9	21.5	19.4	21.6	15.7	17.6	

Source: L'vivščyna: socjal'nyj trend..., 2000; Naselennja Volyni..., 2000; Naselennja Volyni vid perepysu do perepysu, 2003; Naselennja Zakarpats'koji oblasti..., 2001; Sklad naseljennja L'vivs'koji oblasti..., 2001.

Estimating the Regions of western Ukraine in terms of contemporary and future resources of population with their working capabilities, it can be stated that Transcarpathian Region is in the best situation (Table 3). There exists here a favourable structure of population age, which is connected with a great number of pre-productive people. At the same time the area currently has the smallest number of people of the post-productive age (Pan'kiv, 2003). The two other

Regions, especially Lviv one, are in a worse situation. Lviv Region is characterized by the smallest percentage of the pre-productive group. This, in a dozen or so years, will influence the drop in the number of people with working capabilities. Here, like in Volyn Region (Krul', 1998), the population of the post-productive age will increase quickly.

Changes in the population number of particular age groups in the 90s were directly reflected in the index of the dependency ratio. The currently existing favourable situation in terms of the dependency ratio between the productive population and the non-productive one is only apparent. It results from the lower number of the pre-productive population, which should be regarded as a negative phenomenon. Besides in a few-year perspective this situation will become worse and worse because of the predicted further rise in the percentage of people of the post-productive age.

In a spatial perspective it was Transcarpathian Region that was characterized by the most favourable general index of the dependency ratio. In 2001 there were 692 people of non-productive age per 1,000. In Volyn and Lviv Regions the values of indices were higher and they were respectively: 791 and 727 people (L'vivščyna: socjal'nyj trend..., 2000; Naselennja Volyni..., 2000; Naselennja Volyni vid perepysu do perepysu, 2003; Naselennja Zakarpats'koji oblasti..., 2001; Sklad naseljennja L'vivs'koji oblasti..., 2001).

In connection with the progressing ageing of the population, in the social life of borderline Regions there newer and newer problems connected with old people will be appearing. One of the most difficult issues that the Ukrainian authorities have to deal with now is ensuring welfare benefits to the increasing number of the retired. In the very Lviv Region in 1991-2001 the number of the retired grew from 624,000 to 718,000, i.e. by 100,000 people (*L'vivščyna: socjal'nyj trend...*, 2000; *Rajony ta mista L'vivs'koji oblasti...*, 2001). However, considering the current state of the country's economy and the increase in unemployment, the authorities will find it difficult to ensure an appropriate level of retirement benefits. Moreover, additional budget expenditures of this kind will entail insufficient funding of the remaining spheres of life in the country, e.g. the ones connected with health, social welfare or education (Libanova, 2000).

So far the demographic transformations have not caused clear changes in the population density in the Regions but only maintained the already existing differences in the population distribution. Only at the local level could it be observed that the number of people per 1 km² was changing most quickly in the districts of the low population density. As a result, with the long-term gradual population loss, this can lead to their total depopulation.

There were not observed any clear transformations in the settlement distribution. However, there are disappearing single villages which have lost a significant part of their population and cannot function as separate units. This process may intensify in the future in places of a very small number

of inhabitants. It is worth noticing that some small towns with their gradual depopulation lose their urban rights whereas small rural estates with a high population growth gain the status of towns. Such transformations have taken place e.g. in Volyn and Lviv Regions.

The above mentioned observations concern solely some of the consequences of population changes which have taken place in recent years in the western area of Ukraine. It can be easily noticed that the causes and effects of depopulation processes function there at the principle of feedback, which is similar in the depopulating areas in Poland (Eberhardt, 1989; Miszczuk, 1993; Bański, 1999). Bad economy in the area contributes to the decrease in the birth rate and high emigration especially of the young population. Their results are reflected mainly in the quick ageing of the society. These phenomena will probably spread, which as a consequence will cause large shortages of people with working capabilities. As a result, unfavourable economic relations and structures of the area will not only be eliminated but will still remain and will become more and more profound.

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