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Zagreb as Croatia's core region

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ZAGREB AS CROATIA'S CORE REGION

Introduction

In contrast to the traditional approach to studying regions, which is based on the collection of data associated with a given region's physical and social features—making the regions seem static, unified and unique in the process—today's approaches emphasize the variability in the nature of regions. Regions are distinguished as dynamic units whose formation, with the exception of their geographic features, are additionally influenced by the processes which operate in them, as well as their interaction with other regions. One of the essential concepts of such an approach to the study of regions is the center-periphery model, which was given its theoretical foundations by John Friedmann. This model consists of two components: the center, or core region, and the peripheral region. The population, economy, innovations, productivity and so forth are concentrated in the core, which is why it dominates the periphery and dictates its development. Inasmuch as economic policies favor the core at the expense of the periphery, intense migrations and capital flight from the periphery to the core can occur, and this in turn reinforces the inequalities (G. Myrdal's concept of circular and cumulative causation). Core regions consist of one city or several large cities with their gravitational zones, but they may be broken down into several levels: the national, regional, sub-regional and local, but also the international.

Regional Structure of Croatia

Croatia can functionally be divided into four macro-regions: those surrounding the cities of Zagreb, Split, Rijeka and Osijek. Each of them is further divided into regions at the next level, and depending on the intensity and significance of the leading settlements in the regions, they can be hierarchically differentiated even further. The borders of individual regions are not fixed. They can be moved in accordance with processes that proceed at incongruent rates. This means that the surface area of an individual region, depending on the intensity of its principal center and its involvement in modern processes, can either increase or decrease over time.

The common feature of Croatia's macro-regional centers is that they have over 100,000 residents and 50,000 employed persons that largely participate in their macro-regions. Zagreb deviates considerably in terms of the share of the population and those employed because it accounts for almost one third of the population and one half of the employed in the Zagreb macro-region. In comparison, approximately one fourth of the population and one third of the employed in the Rijeka macro-region live and work in Rijeka, while in the Split and Osijek macro-regions, the function of the population and the labor force is more scattered due to the larger number of regional and sub-regional hubs (Njegaè, 2000). Regional centers generally have approximately 40,000 residents and 20,000 employed. These are: Varaždin, Karlovac, Sisak,

Bjelovar, Slavonski Brod, Vukovar (until 1991, after that Vinkovci), Pula, Zadar, Šibenik and Dubrovnik.*

According to the share in the population and employed in regional centers as compared to regions, the regional centers of Primorje (Croatia's northern littoral) and Karlovac stand out (Njegaè, 2000). The centers in Primorje exhibit a clearly distinguishable process of littoralization, which in Croatia is additionally reinforced by the extremely unfavorable conditions of agrarian land use in its hinterland. This is why some parts of Croatia's littoral, together with Zagreb, have experienced the most intense degree of urbanization in Croatia (Vresk, 1995). Karlovac is additionally specific within the framework of the Zagreb macro-region because a large part of its region is very sparsely populated, so the share of the population and employed in Karlovac as a part of its own region is considerably greater than that of the other regional centers in the Zagreb macro-region. However, all other regional centers, except for Bjelovar, also stand out with correspondingly high shares, so on this basis one can clearly conclude that the regional centers (with their urban zones) represent cores at the level of their functional regions.

An analysis of lower levels has shown that up until 1991, within the framework of the political/territorial organization of Croatia at the time, municipal centers also stood out as centers of polarized development, i.e. as core areas within their municipalities. Thus, for example, the share of employment in the municipal centers in the Hrvatsko zagorje region in 1981 was between 20 and 57 percent of the total number of employed in the municipalities (Njegaè, 1991) with a tendency to grow.

Zagreb as Croatia's Core Region

An analysis at the state level clearly discerns Croatia's core region from its peripheral regions. The Zagreb region accounts for only 8.7 percent of Croatia's surface area, yet 27.8 percent of the country's population lives there (2001) and 29.9 percent of Croatia's labor force is employed in it. The Zagreb region consists of the wider Zagreb urban zone (the Zagreb urban region) together with a broad ring of surrounding urban regions and municipalities which are part of Zagreb and Krapina-Zagorje Counties. In addition to the capital city of Zagreb, the region also includes several larger population cores, primarily within the framework of urban regions. These include the satellite towns of Zaprešić, Samobor, Velika Gorica, Sesvete and Dugo Selo, and then the county seat of Krapina, the towns of Jastrebarsko, Ivanja-Grad, Vrbovec, Sveti Ivan Zelina, Zabok, etc. Under the influence of Zagreb and these smaller settlements, the Zagreb environs have lost their primarily rural character and have acquired the features of an urbanized zone with the corresponding processes that develop within them (industrialization, deagrarianization, deruralization, urbanization) and these processes are most marked in the city's direct surroundings and all along its principal transit routes.

Zagreb is located in the very center of the core region. Its transit/geographic position on the optimum communication route between the Pannonian and Mediterranean spheres contributes to its historical and, even more so, its contemporary significance. Moreover, its advantageous geographic location and

* Until 1991, Vukovar had the proportions of a genuine regional center, but during the Homeland War in Croatia and its aftermath, its population was cut in half, so today the number of employed is one fifth of its prewar level (only 4,300 registered employed persons in 1999). Therefore, Vinkovci is today the potential regional center for the southeastern portion of the Osijek macro-region.

position and the natural openness of its relief have made it possible for the wider Zagreb region to acquire approximately ten major transit routes, of which several have international importance. Zagreb therefore developed into a complex transit hub, one of the most important in this part of Europe (Siæ, 1994). Pan-European transit corridor X, which links northwestern Europe with southeastern Europe and the Middle East, passes through Zagreb. Zagreb is also traversed by branch Xa of this corridor (Graz-Maribor-Zagreb) and branch Vb of corridor V (Budapest-Zagreb-Rijeka), which connects the western Mediterranean region with eastern Europe. Zagreb first began to emerge as a rail hub during the 1860s (the Zidani Most-Zagreb-Sisak line, 1862; the Zagreb-Karlovac line, 1865; the Zákány-Koprivnica-Dugo Selo-Zagreb line, 1870 – and so forth). During the 1990s it began to establish direct international Intercity rail lines with the major cities and regional centers of neighboring countries (Munich, Vienna, Venice, Budapest). Since the 1960s, its importance in overland and air traffic has continued to grow, particularly after 1972, when a highway network began to develop around Zagreb. Besides road and rail transit, Zagreb acquired important air and telecommunications routes, and thanks to the navigability of the Sava River, there is also potential for the development of river traffic (Siæ, 1994). Zagreb's development is therefore very closely tied to its transit value, i.e. with the constant growth in importance of Zagreb's transit hub. Zagreb's demographic and economic vigor testify to this fact, and this has been particularly apparent over the last ten years dominated by intense centralized development at the national level in an independent Croatia.

By far the highest share of the population and labor force are concentrated in the city of Zagreb. A little less than one fifth of Croatia's population lives and works in Zagreb (17.6% of the population, 18.2% of the labor force). Zagreb additionally accounts for approximately one third of the population and one half of the labor force in the Zagreb macro-region and approximately three fifths of the population and three fourths of the labor force of the narrower Zagreb region. When one adds to this that approximately 80 percent of the population (970,000) lives in the wider urban region (i.e. in the Zagreb urban region) and almost 90 percent (370,000, 1991) of the Zagreb region's labor force works in it, while only 20 percent of the population and only 10 percent of the employed are in the remaining portion of the Zagreb region, then it becomes obvious that Croatia's capital city stands out as a core within a core.** However, since contemporary developmental trends increasingly emphasize the importance of suburban zones (particularly around large cities) which are today spatially and functionally integrated with them, any analysis of cities in today's world can hardly be conducted without taking into consideration wider urban regions. Such an approach is also necessary for this analysis.

The Zagreb urban region was formed in the last approximately forty years when the city influenced a process of suburbanization in the surrounding areas, which altered its socio-economic features and hastened its transformation from a rural to an urbanized region. The urban regions encompasses approximately 300 settlements, today largely administered by the City of Zagreb or Zagreb County. In addition to Zagreb, its satellite settlements have special importance: Zaprešić, Samobor, Velika Gorica, Sesvete and Dugo Selo. They are situated in a semi-circle at a distance less

** *The largest centers of the core region's periphery do not have populations that exceed 8,000 (Ivanica-Grad, pop. 7,700) or a labor force in excess of 5,000 (Ivanica-Grad, 4,800). Nevertheless, due to their distance from Zagreb, the function of labor is more vital than in Zagreb's larger, satellite cities (Ivanica-Grad has more persons employed than Sesvete, which is five times larger, or Zaprešić, which is twice as large).*

than 20 km from the city limits and have between 8,500 and 43,100 inhabitants. Since the 1960s, when the suburbanization process commenced, Zagreb's population has grown at an increasingly slower rate, while its surroundings have experienced much faster demographic growth. Thus the population in the satellite settlements during the period from 1991 to 2001 increased 12.8 percent (from 103,300 to 116,500), while Zagreb's population in the most recent period (1991-2001) even decreased slightly (from 706,800 to 682,600), which reflects trends in the world's developed countries. In 1991, as much as 71 percent of the total population of satellite settlements (not including Dugo Selo) moved into them, while only 29 percent accounted for residents since birth (Nejašmić, 1994). Sesvete is characteristic in terms of fast growth and intense development: until World War II it was a tiny settlement (800 residents in 1948) while today it is physically connected to Zagreb and has a population of 43,100. Even so, this somewhat stronger decentralization was only observed in the demographic, but not in the economic sense, since approximately 75 percent of the urban region's population lives in the city itself, while 90 percent of its labor force works there. However, given the existing processes, it is difficult to observe Zagreb in isolation from its surroundings, so when one speaks of the core region, then this certainly means Zagreb with its urban region.

Zagreb's importance became particularly explicit after Croatia became an independent state in 1991. Zagreb then became the center of a new state, and this further reinforced its function and broadened the differences between it and other cities. Its geographic position, transit accessibility, highly concentrated population, high degree of urbanization and dynamic economic growth (especially tertiary activities) all greatly contributed to this.

A comparison of demographic development in Zagreb and Croatia's remaining three macro-regional centers—Split, Rijeka and Osijek—also confirms this fact. During the 1991-2001 period, the differences between Zagreb and the remaining centers increased. Despite the slight decline in Zagreb's population, the ratio between Zagreb and the country's second largest city, Split, increased from 1:3.7 (1991) to 1:3.9 (2001). The ratio between Zagreb and Rijeka increased from 1:4.2 to 1:4.8, while the ratio between Zagreb and Osijek increased from 1:6.7 to 1:7.5. Therefore, the rank-size distribution of Croatia's cities is even more unequal than ten years previously, and indicates the rise of monocentrism. This is occurring under conditions of a considerable decline in Croatia's population, which only left the core region unaffected (the Zagreb urban region grew from 940,000 to 970,000 residents). Depopulation has beset almost all other regions in Croatia, including the urban regions of large cities.^{***} The share of the Zagreb urban region's population in Croatia's total population increased from 19.6 percent (1991) to 22.1 percent (2001).

Yet another indicator of Zagreb's importance is also the number and share of businesses in Croatia. Zagreb's domination in the economic field was marked even before the 1990s. But in the last decade this domination has become even more overriding. Thus, during this period Zagreb's share in the total number of businesses in Croatia grew. In 1993, 168 (33.6%), while in 1997, 201 (40.2%) of the 500 largest Croatian firms were located in Zagreb. At the same time, 28 (1993 and 1997) were located in Rijeka, 18 (1993) and 19 (1997) in Split and 20 (1993) and 19 (1997) in Osijek (Stiperski, 2000). The fact that among the 20 largest firms, 15 (75%) are headquartered in Zagreb speaks sufficiently in and of itself. A similar situation can be found in the banking industry, as 45 percent of Croatia's banks are headquartered in

^{***} *The Split urban region had a population of 248,000 in 1991 (Vresk, 1998), while in 2001 its population was 245,000.*

Zagreb. They possessed a total of 56 percent of the equity of Croatian banks, while in the following year, 1998, this share grew to 62 percent. The concentration of wholesale/retail companies in Zagreb is even more marked: 12 of the 18 largest (67%) (Stiperski, 2000). Given the degree and trends in Croatia's economic development and the increasingly higher demographic concentration in Zagreb and its associated geographic position (its optimum transit accessibility), these data are completely in line with expectations.

Periphery

Among the other Croatian regions, which are peripheral in relation to Zagreb, there are great differences, so they can mutually be differentiated into more developed and less developed. The more developed group includes the urban regions of the remaining macro-regional centers (Split, Rijeka and Osijek) or individual regions along the coast (e.g. western Istria). This category also includes regions that have strong transit links with the core region so, owing to this fact, they are structurally and spatially tied to it by means of transit axes which are simultaneously developmental axes. These are transitional regions (Siæ, 1996), i.e. those which have a level of socio-economic development that distinguishes them from others. An example of such a region is the Varaždin region, with two important centers: Varaždin and Èakovec.****

The second group of peripheral regions encompasses those which remained outside of economic development flows (Lika, Banovina, Kordun, the islands, etc.). The reasons for this can be diverse: the lack of a stronger developmental hub, unfavorable demographic growth, an unfavorable natural/geographic base, poor transit accessibility, unfavorable border position, and so forth. These regions are more sparsely populated, they have low employment rates and they are characterized by long-term, and in some places even century-long, emigration. After 1991, further negative changes occurred in them, primarily caused by war and then by the impossibility of economic restructuring, especially in some of them hardest hit by the war. Some centers in them became depopulated and lost the importance they once had. Knin, along with Vukovar, is the best example of such a center. After the demographic exodus during the Homeland War and the liberation in 1995, Knin's population returned to its 1991 level, but the demographic and economic structure changed completely. Before the war, Knin was a sub-regional center with a vital industrial and transit function, while today both have been greatly reduced, particularly the industrial function, thereby reducing Knin's importance in general.

Some of the peripheral regions, particularly those which border the European Union, have the potential for better development than others, particularly under the new, more favorable political and geographic conditions. They have stronger ties with extra-Croatian regions, keeping pace with the European trend of integrating with neighboring regions that have similar characteristics. This is particularly true of Istria and Međimurje.

Conclusion

Over the last ten years after Croatia became an independent country, the differences between Zagreb and the remaining parts of Croatia widened. The demographic and economic concentration in Zagreb and its wider urban region is

**** Èakovec is the only larger Croatian city that has a labor force larger than its population.

becoming increasingly apparent, while the remaining regions are lagging behind in terms of development. At the national level, the wider Zagreb urban region is becoming an outstanding Croatian core region, while all other regions are becoming peripheral regions. This is the result of the different factors: Zagreb's geographic position, its transit accessibility and the proximity to Europe's more developed portion, the high degree of urbanization and dynamic economic growth, and also the intense centralization of the state, particularly during the wartime period in the first half of the 1990s. Weak transit ties between the core and the periphery, particularly with the Dalmatian region, are also contributing to unequal regional development. Better transit links are therefore one of the prerequisites for Croatia's balanced regional development. It could facilitate the accelerated flow of people, goods and information, as well as the planned dislocation of individual businesses from the core toward the periphery. Moreover, due to the current unsuitable construction levels and the obsolescence of the road and rail traffic infrastructure, Croatia's coastal cities and ports, to which some Central European countries naturally gravitate, cannot take advantage of all of the benefits of their geographic position, which emphasizes their peripheral nature and contributes to their weaker involvement in European developmental trends.

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