

# CAEE

## The case for agglomeration economies in Europe

Targeted Analysis 2013/2/1

Appendix C4: Barcelona Case Study | 30 June 2010



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**The Case for Agglomeration Economies in Europe (CAEE)**  
**Barcelona City-Region Case Study**

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## 1. Introduction

The Barcelona city region case study report is one of the four city studies in the CAEE project. This project forms part of the ESPON 2013 programme and is a 'targeted analysis based on user demand'. The user demand, in this instance, came from four key policy-making and delivery bodies (the "policy stakeholders") based in Manchester, Barcelona, Dublin and Lyon which, under the leadership of the Commission for the New Economy in Greater Manchester, were interested in exploring the impact of agglomeration economies within and beyond the territories they cover and the extent to which the beneficial impacts of recent patterns of agglomeration have been shaped, and might be managed more effectively, by public policies and programmes.

The policy stakeholders, in co-operation with ESPON, established a brief that was intended to promote the achievement of a number of key objectives:

- To provide an understanding of the sources of agglomeration within the four case study areas, and outline whether there is a policy role for influencing agglomeration economies;
- To develop strategic policy options which ensure that agglomeration growth spills over to benefit the wider regional economy, drawing as appropriate upon lessons from the success and failures of past policy responses and looking at policy options that could potentially help future growth.

The research consortium commissioned by ESPON on behalf of the four policy stakeholders for the four cities have sought to achieve these objectives through specific, detailed, and comparative case study-based analysis - in a way that provides a basis for the practical assessment and development of strategic policy options. The policy stakeholder in Barcelona is the *Barcelona Provincial Council*, through its *Territorial Observatory*<sup>1</sup> and the partner in the research consortium is the *Universitat Politècnica de Catalunya* (UPC) through its *Centre de Política de Sòl i Valoracions* (CPSV)<sup>2</sup>.

Through their individual case study research each city was required to explore a number of common questions, paramount among which are:

- Is it possible not only to identify 'past policy responses' to agglomeration processes but also to judge whether they have broadly failed or succeeded?
- Is it possible to specify particular policy levers, at various levels within governmental

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<sup>1</sup> <http://www.diba.cat/territori/default.asp>

<sup>2</sup> <http://www.upc.edu/cpsv/>

systems that can be pulled in future in order to maximise the benign effects of agglomeration and encourage spill-over effects in neighbouring areas?

- Is it possible to judge the effect that governance arrangements in the target areas, and not just policy choices, have on spatial economic performance, and
- It is possible, on the basis of case study observations, to set out practical policy and governance implications that can be taken up in other (national) contexts?

Interviews were conducted with leading city-regional stakeholders in selected policy areas designed to assess the way in which the levels of autonomy they command have been used to shape the reasons factors that influence agglomeration effects.

The first part of the report examines the administrative structure of the Barcelona city-region and the evolution of metropolitan governance; while the second part focuses upon the economic structure of the city-region in general, prior to a more detailed analysis of a number of key economic sectors in order to reach an understanding of the effects of agglomeration economies over the territory.

## 2. The administrative structure of the Barcelona city-region and the evolution of metropolitan governance

The Spanish case reflects some special features because its political system changed relatively recently to one of democracy after the Francoist dictatorship (1939–1975). The Spanish Constitution of 1978 changed the basic territorial structure in Spain. As in some other European countries, the decentralisation process has resulted in progressive rationalisation or the rise of stronger levels of sub-national government (Keating and Loughlin, 1997). The territorial model adopted was the State of Autonomies, where seventeen Autonomous Communities (*Comunidades Autónomas*) have significant legislative and executive powers over a wide range of areas – housing, urban and regional planning, agriculture, transport, health, education, social welfare and culture – according to the terms of their individual autonomy statutes. The Autonomous Communities (AC) have progressively achieved more competences, demonstrated by trends in the distribution of public expenditure between central, regional and local governments.

Article 137 of the Spanish Constitution states that: "The State is territorially organized in municipalities, provinces and the Autonomous Communities that can be constituted: all those entities enjoy autonomy in the management of their own interests". As a consequence there are three levels of government: central, the regional tier (formed by the 17 Autonomous Communities<sup>3</sup>) and the local tier (formed by 8,113 municipalities and 50 provinces).

The treatment of local government in the 1978 Spanish Constitution is relatively brief, with most of the articles being devoted to the newly created regions. The 1985 Local Government Law (LBRL) specifies general principles regarding the territory, internal organisation and functions of local government; the more concrete details are left to regional legislation. Each Autonomous Community can determine its own local government arrangements, always respecting the existence of municipalities and provinces, which have constitutional recognition. This is why different local institutions are found, such as the *comarcas* (counties) in Catalonia, Aragon or Galicia, *Cabildos* in the Canary Islands and *Insular Councils* in the Balearic Islands<sup>4</sup>. The central government also determines the economic resources of municipalities and provinces through the Law on Local Finances (*Ley Reguladora de*

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<sup>3</sup> There are also two Autonomous Cities, Ceuta and Melilla, with fewer powers than the ACs.

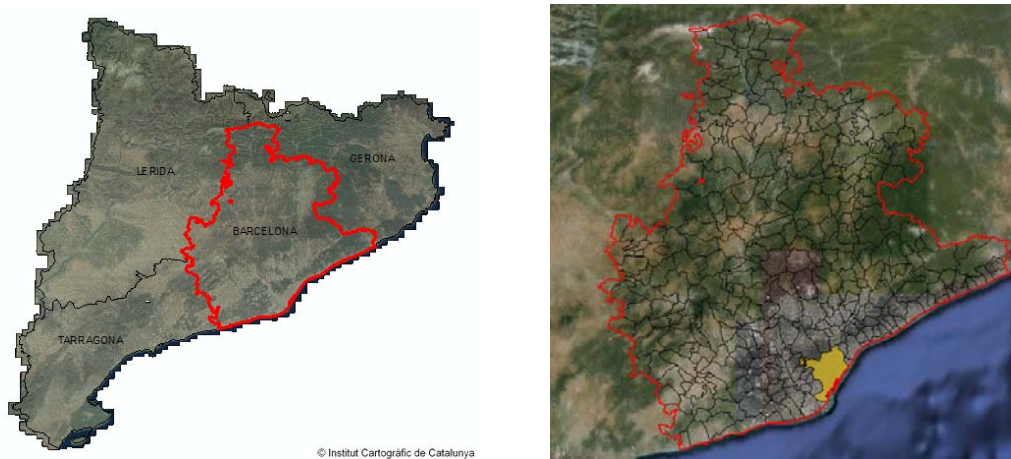
<sup>4</sup> Bosch and Espasa (2006) identify a total of 12,943 local government units in Spain: 8,110 municipalities (N.B. increasing to 8,113 by 2010); 50 provinces; 1,070 supra-local entities comprising 10 *cabildos* and insular councils, 975 *mancomunidades* (voluntary agreements between at least two municipalities), 81 counties and 4 metropolitan areas; 3,708 infra-local entities; and 5 other units.

*Haciendas Locales*, 1988).

In fact, as will be seen in the case of metropolitan areas, there is a share of competences between central and regional governments in relation to the local level. Central government sets the general legislation and then each Autonomous Community legislates its own arrangements, respecting the general legislation.

### The Barcelona city-region

For the purposes of this study, the Barcelona city-region is taken to be the spatial extent of the **Barcelona Province** (NUTS3).



Map 1: (a) the city-region in the context of Catalonia; and (b) the spatial structure of the municipalities of the city-region, highlighting the location of Barcelona.

Source: Institut Cartogràfic de Catalunya and own elaboration

However prior to examining the Barcelona city-region in detail, it is appropriate to make some passing remarks concerning the city-region within the wider Spanish context. As part of on-going monitoring of the Spanish urban system carried out on a periodical basis by the Ministry of Housing, the most recent exercise positioned the urban area of Barcelona in second place, after that of Madrid, in the list of 13 “large urban areas”<sup>5</sup> (Ministerio de Vivienda, 2007). Work previously undertaken by ESPON leading to the identification of the Functional Urban Areas (FUAs) and Metropolitan European Growth Areas (MEGAs) resulted in both Madrid and Barcelona being classified as MEGAs and ascribed the description as “European engines”<sup>6</sup>. Other Spanish MEGAs comprised Bilbao, Valencia and Palma de

<sup>5</sup> The list of large urban areas comprised Madrid, Barcelona, Valencia, Sevilla, Bilbao, Málaga, Central de Asturias, Zaragoza, Alicante-Elche, la Bahía de Cádiz, Murcia, Vigo-Pontevedra and Las Palmas de Gran Canaria.

<sup>6</sup> The full list of “European engines” comprised Munich, Frankfurt, Madrid, Brussels, Milan, Rome, Hamburg, Copenhagen,



Mallorca, each described as “potential MEGAs”, and Sevilla as a weak MEGA (ESPON, 2004). Hall’s differentiation between a “political” and a “commercial” capital in relation to Madrid and Barcelona is particularly fitting and perhaps poignantly indicates the *raison d’etre* for the little relation between Spain’s two principal metropolitan urban regions (Hall, 2005).

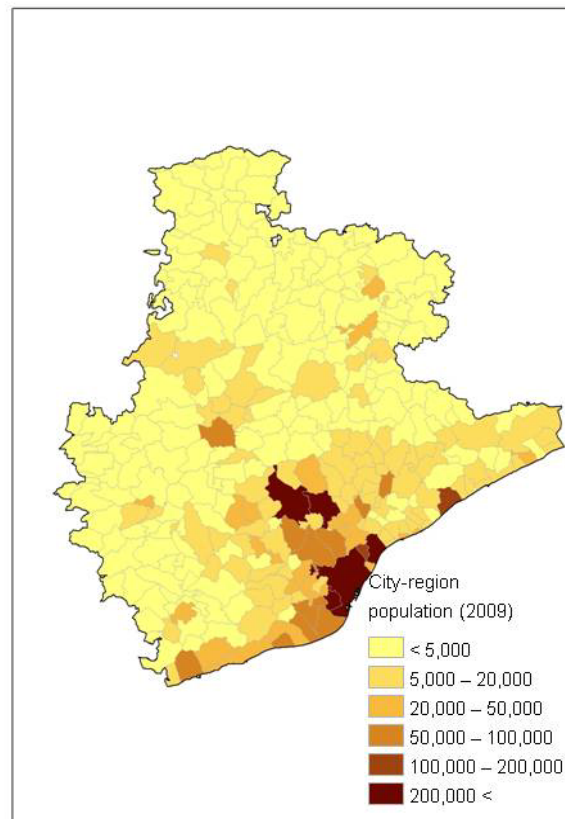
The competences of provinces are principally those of offering technical support for the municipalities and the coordination of supra-local services, especially for small municipalities. They are also the electoral district for general elections and also for Catalan regional elections. Transfers from central government constitute the main economic resources for provinces.

The **Province**, one of four within the **Autonomous Community of Catalonia**<sup>7</sup>, had a population of 5,487,935 in 2009, distributed throughout a total of 311 municipalities and 11 counties, with an area of 7,728 km<sup>2</sup>. As can be seen from Table 1, over 50% of the population of the city-region lies within 7 municipalities with populations in excess of 100,000 inhabitants. This population of more than 2.75 million is concentrated within 3.5% of the total area of the city-region, focussed primarily on **Barcelona** (1.62 million) and two adjoining municipalities [**L’Hospitalet de Llobregat** (253,782) and **Badalona** (219,547)], as well as two important cities of the immediate hinterland [**Terrassa** (210,941) and **Sabadell** (206,493)]. By contrast just over 20% of the population resides in 161 municipalities of less than 20,000 inhabitants, distributed over more than 87% of the city-region. The remaining 29% of the population of the city-region lies within 37 towns and cities in the 20,000-100,000 range, spread over just 9.5% of the total area. Therefore the urban structure of the city-region is clearly that of a significantly high proportion of the overall population concentrated within a few small towns and cities, with a correspondingly small proportion of the population spread out widely across the wider city-region as illustrated by Map 2.

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Zurich, Amsterdam, Berlin, Stockholm, Stuttgart, Barcelona, Düsseldorf, Vienna and Cologne.

<sup>7</sup> The four Catalan provinces comprise *Barcelona* (5,487,935 persons); *Girona* (747,782 persons); *Lleida* (436,402 persons) and *Tarragona* (803,301 persons) contributing to an overall population of the Autonomous Community of 7,475,420 persons in 2009, and representing 16% of Spain’s total population.



Map 2: Population of the Barcelona city-region (2009)

Source: INE, own elaboration

Against this overall urban structure, there are many different interpretations of what constitutes the metropolitan structure of Barcelona. From an administrative perspective two definitions are used locally – one refers to the **Metropolitan Area of Barcelona (AMB)** and the other refers to the **Metropolitan Region of Barcelona (RMB)**. Neither of these corresponds, to date, with an institutional level of government, as in the case of the province. These two conceptions refer to a smaller territory than that of the province and concentrate higher urban densities, while the province is a mixture of both urban areas of varying densities and rural areas intrinsically linked to the urban areas.

The political future of the **AMB** could change in the following months. What this would achieve would be to bring together the 36 municipalities or the first ring of the wider metropolitan region that probably will be given a new instrument of governance if the Catalan Parliament approves the Law of the Metropolitan Area of Barcelona (now at discussion stage). It should be recognised that the urban continuity of these 36 municipalities which form the central urban core of the city-region accounts for almost 60% of the total population. As will be seen later, the objective of creating a single metropolitan authority gathering 36 municipalities is to put an end to the institutional fragmentation that has characterised the

metropolitan area since 1987 with the demise of the former **Metropolitan Corporation of Barcelona** (CMB). Although this will be discussed in depth in the section relating to institutional capacity, it is worth remarking that spatial extent of the former CMB forms another interpretation of the metropolitan structure of the city-region.

Population range	Municipalities	% of total muns.	Population (2009)	% of total pop.	Area (km <sup>2</sup> )	% of total area
200,000 <	5	1.61	2,515,556	45.84	240.6	3.11
100,000-200,000	2	0.64	241,439	4.40	29.39	0.38
50,000-100,000	12	3.86	824,511	15.02	305.93	3.96
20,000-50,000	25	8.04	771,052	14.05	417.42	5.40
5,000-20,000	86	27.65	880,936	16.05	1,749.78	22.64
< 5,000	181	58.20	254,441	4.64	4,985.08	64.51
<b>TOTAL</b>	<b>311</b>	<b>100</b>	<b>5,487,935</b>	<b>100</b>	<b>7,728.2</b>	<b>100</b>

Table 1: Spatial structure of the municipalities of the Barcelona city-region (2009)

Source: Own elaboration, INE

The **RMB** comprises 164 municipalities, being considered as the functional area of Barcelona by urban planners, geographers and architects since the 1968 (Artal, 2002). At present it has no institutional recognition, but this situation is at a turning point. Firstly, the territory of the RMB corresponds to the **Metropolitan Territorial Plan**, which was approved by the Regional Government on 20 April 2010. Secondly, these 164 municipalities correspond to a new administrative level, the *vegueria*, which is proposed in the Catalan Law of Territorial Organisation, at present on parliamentary commission (July 2010). If approved, the RMB will become a level of decentralization of the Catalan Government, substituting the provinces. However, to date it is unclear whether this law will be passed, owing to a) the lack of a consensus about the territorial divisions proposed, and b) the fact that the Catalanian Parliament cannot abolish provinces since they are constitutionally recognised and so this reform would require the approval of the Spanish Parliament.

Other research relating to spatial dynamics within the wider metropolitan region has produced alternative interpretations of the true extent of the **functional metropolitan urban region of Barcelona**. An application of the methodology deriving from the Census Bureau of the United States and based upon the statistical exploitation of travel to work data contained within the 2001 Census of Population led to the delimitation of a metropolitan urban region of Barcelona extending well beyond the north-eastern and south-western spatial limits of the RMB and the Province (CPSV, 2001 and 2004; and Burns, 2008). The resulting **metropolitan**

**urban region** covered some 227 municipalities with an area of 4,796 km<sup>2</sup>. It had a population of over 4.5 million persons in 2001, rising to over 5 million inhabitants by 2006.

While each one of the previously mentioned designations, be they formal or informal, relates to territorial structures emanating from the core, in this case the municipality of Barcelona as the political and administrative capital city of the city-region/province/region, it is important to acknowledge the weight attached to the cities of the metropolitan arc<sup>8</sup>. The metropolitan arc refers to a group of seven cities (Granollers, Martorell, Mataró, Sabadell, Terrassa, Vilafranca del Penedès and Vilanova i la Geltrú) which were formerly known as the cities of the second outer metropolitan ring. In 1992 these cities initiated a dialogue and the staging of a number of meetings relating to the territorial issues of common interest. Each of these cities lies within the spatial limits of the city-region and the seven cities had a combined population of just over 730,000 inhabitants in 2009, representing over 13% of the population of the city-region.

In order to understand the case of Barcelona it is important to take into account both the evolution of the Spanish State and the internal dynamic of the city-region.

In Barcelona, as in many Spanish metropolitan areas, the twentieth century has witnessed a steady migration process from rural to urban areas. The 1960s and the 1970s were the years of greatest expansion of cities, including Barcelona, which reached 1.9 M inhabitants. From 1975 onwards the growth has continued, but its pace has been slower, and over the last two decades urban areas have evolved towards a relative sprawl model. The present trend involves an increasing consumption of land, a loss of population in central municipalities, and increased growth occurring in metropolitan peripheries with relatively lower density patterns.

The population, spatial extent, density and political fragmentation of the Barcelona city-region are illustrated in Table 2. The different definitions of the metropolitan reality are taken into account and include the weight of the central city and each territory in relation to both the city-region and the AC in their entirety:

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<sup>8</sup> <http://www.arcmetropolita.org>

<b>Territorial unit</b>	<b>Population (2009)</b>	<b>% of total population of region (Catalonia)</b>	<b>% of total population of city-region (Province)</b>	<b>Area (km<sup>2</sup>)</b>	<b>Density (inhab./km<sup>2</sup>)</b>	<b>Admin. Units(s)</b>
Barcelona	1,621,537	21.69	29.55	98.21	16,510.92	1 mun.
Former metropolitan corporation of Barcelona (CMB)	3,097,876	41.44	56.45	476.01	6,508.01	27 mun.
Metropolitan area of Barcelona (AMB)	3,218,071	43.05	58.64	633.84	5,077.10	36 mun. 4 counties
Cities of the metropolitan arc	730,810	9.78	13.32	211.71	3,451.94	7 mun.
Metropolitan región of Barcelona (RMB)	4,992,193	66.78	90.97	3,239.23	1,541.17	164 mun. 7 counties
Rest of the Province (excluding the RMB)	495,742	6.63	9.03	4,488.97	110.44	147 mun. 4 counties
Province (Barcelona)	5,487,935	73.41	100%	7,728.17	710.17	311 mun. 11 counties 1 province
Region (Catalonia)	7,475,420	100%	N/A	32,113.39	232.78	947 mun. 41 counties 4 provinces

Table 2: Portrait of the Barcelona city-region (2009)  
Source: Own elaboration with data deriving from INE

The province of Barcelona represents almost 75% of the Catalan population and the City of Barcelona just over 20%. However what is the weight of the central city in relation to the city-region? Table 3 illustrates the differences in the distribution of population of the central city at the three metropolitan scales: the metropolitan area, the wider metropolitan region and city-region.

There are clear differences in the concentration of population in urban areas and the weight of the central city (the City of Barcelona with 1.6 M inhabitants). This weight decreases when taking into account the whole city-region, that is, the province of Barcelona. For this scale, the central city means 30% of the total population.

Over half the 5.5 million inhabitants of the city-region live in 7 cities with 100,000 inhabitants or more. Almost 30% (1.6 million) live in the central city of Barcelona, with the

remainder distributed amongst 6 other cities (L'Hospitalet de Llobregat, Badalona, Terrassa, Sabadell, Mataró and Santa Coloma de Gramenet). Not all of these cities are immediately contiguous - L'Hospitalet de Llobregat, Badalona and Santa Coloma de Gramenet are physically adjacent to Barcelona and connected by subway. By contrast the other three cities are located within the wider metropolitan region and are sub-centres of their own standing.

Population range	Metropolitan area		Metropolitan region		Province of Barcelona (City-region)	
	No. of mun.	% of total pop.	No. of mun.	% of total pop.	No. of mun.	% of total pop.
300,000 <	1	50.39	1	32.48	1	29.55
200,000-300,000	2	14.81	4	17.91	4	16.29
100,000-200,000	1	3.72	2	4.84	2	4.40
50,000-100,000	7	15.41	11	14.98	12	15.02
20,000-50,000	11	11.85	22	13.45	25	14.05
5,000-20,000	11	3.486	63	13.84	85	16.05
< 5,000	3	0.33	61	2.507	182	4.64
<b>Total</b>	<b>36</b>	<b>100.0</b>	<b>164</b>	<b>100.0</b>	<b>311</b>	<b>100.0</b>

Table 3: Distribution of municipalities and population in the province of Barcelona, the metropolitan region and the metropolitan area (2009)

Source: Own elaboration with data deriving from INE.

The remaining 50% of the population of the city-region is divided between 304 municipalities, with lower densities. Of these 304 municipalities, 182 have less than 5,000 inhabitants, representing less than 4.5% of the total population.

However it is important to recognise that over the period 1991-2009, some 35 municipalities of the city-region underwent demographic growth of such a degree to increase their population from under 5,000 inhabitants to place them in the 5,000-20,000 inhabitants range – effectively constituting new urban sub-centres through their conversion from villages to “small towns”. Of these 35 municipalities 5 lie within the limits of the metropolitan area (AMB)<sup>9</sup>, 24 within the limits of the remainder of the metropolitan region (RMB)<sup>10</sup>, with the remaining 6 within the hinterland or remaining area of the city-region<sup>11</sup>. These 35 new “small towns” constituted 4.7% of the city-region’s population in 2009. Over the same period some twelve municipalities experienced demographic growth to change their status from “small towns” (5,000-20,000 inhabitants) to “cities” (greater than 20,000 inhabitants) of the city-

<sup>9</sup> Begues, Castellbisbal, Santa Coloma de Cervelló, Tiana and Torrelles de Llobregat

<sup>10</sup> Ametlla del Vallès, Arenys de Munt, Bigues i Riells, Cabriels, Cubelles, Gelida, Lliçà de Vall, Matadepera, Palafolls, Polinyà, Sant Andreu de Llanereres, Sant Antoni de Vilamajor, Sant Esteve, Sant Feliu de Codines, Sant Fost de Campsentelles, Sant Pol de Mar, Sant Vicenç de Montalt, Santa Eulàlia de Ronçana, Santa Margarida i els Monjos, Santa Maria de Palautordera, Sentmenat, Sesrovires, Teià, Vacarisses and Viladecavalls

<sup>11</sup> Artés, Masquefa, Moià, Sant Fruitós de Bages, Santpedor and Taradell

region. Of these twelve new “cities” 2 lie within the spatial limits of the metropolitan area (AMB)<sup>12</sup>, 9 within the area of the remainder of the metropolitan region (RMB)<sup>13</sup> and just one<sup>14</sup> within the remainder of the city-region. So the city-region has witnessed important changes to its spatial and geographical structure over the past twenty years.

To sum up, the province of Barcelona gathers dense urban centres with small rural municipalities; this is why it is seen as a “too large” administration for the metropolitan reality. What will be seen later is that the municipalities of the metropolitan area have developed their own networks of cooperation, separately from the province.

Besides, the city-region is fragmented in counties and other supra-local entities, as explained in the next section.

### **Institutional fragmentation**

The structure of local administration

The organisation of local government is a regional competence, shared with the central government. Article 5 of the Statute of Autonomy of Catalonia states, "The Generalitat of Catalonia shall divide its territorial organization into municipalities and counties ("Comarques"), although it may also set up larger administrative districts".

In accordance with those provisions of the Statute, in 1987 the Parliament of Catalonia approved the so-called "Territorial Organization Laws", than set up the local administrations of Catalonia. According to this legal framework, Catalonia is territorially organized in municipalities, counties and provinces. They are territorial entities; and each one is fully autonomous in the management of its own interests.

The municipality is the basis of all the territorial organization, and the first level of the citizen's participation in public affairs. The municipality is ruled and administered by the council, formed by directly elected councillors and the mayor, elected by the councillors. To date, there are 947 municipalities in Catalonia. The population of 28 of them is less than 100

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<sup>12</sup> Sant Andreu de la Barca and Molins de Rei.

<sup>13</sup> Castellar del Vallès, Esparreguera, Martorell, El Masnou, Olesa de Montserrat, Pineda de Mar, Sant Pere de Ribes, Santa Perpètua de Mogoda and Sitges.

<sup>14</sup> Manlleu

inhabitants; 492 have a population between 100 and 1,000 inhabitants; 254 between 1,001 and 5,000; 121 between 5,000 and 20,000; 31 between 20,000 and 50,000; and 21 with populations of over 50,000 inhabitants. In other words, 70% of the Catalan population lives in the 45 municipalities whose populations exceed 20,000 inhabitants. Their incomes come from direct and indirect taxes (related mainly to propriety values) and transfers principally from central government.

The county is a second tier of local administration, specific of the Catalan local government organization. It is ruled by the council, whose members are appointed by the political parties, among the municipal councillors, according to the results of the municipal elections. The councillors elect a President amongst them. There are 41 counties, which were created in 1987. They give support to the municipalities, mostly the small ones, in order to provide its citizens with all the services granted by law. Their financial resources rely almost exclusively on transfers from the Catalan government.

The province is another second tier of local administration and one of the constitutional levels of government in Spain. The provincial division was imposed by central government in 1833; during the Franco dictatorship, its chief, the *gobernador civil*, was the delegate of the central power in Catalonia. This radically changed during the democracy with the creation of the AC. In Barcelona, the province has been very active in promoting the cooperation of municipalities through local networks and programmes. However, for a part of the Catalan political elites, the provincial division is an old-fashioned administrative level that does not correspond to the territorial reality, which would be better adapted through 7 territorial districts or *vegueries*. Provinces are ruled by the council, formed by councillors or “diputats” that are elected in districts. Each district has a number of deputies weighted according to the population, and these are distributed proportionally to the election results obtained in municipal elections throughout the district. As mentioned previously there are 4 provinces in Catalonia and their task is to give legal and technical assistance to municipalities. Provinces are financed mainly by transfers coming from central government.

However, the Catalan local structure is much more complex from the administrative point of view, with the existence of other local entities. It will be seen later that this applies also for the city-region. Besides the municipalities, counties and provinces, two other types of local administration can be distinguished: the supra-local level (formed by mancomunitats, consortiums and metropolitan authorities) and the infra-local level (the municipal decentralised entities).



The municipal decentralised entities are little villages, or parishes, inside the boundaries of a municipality, mostly in rural and mountain areas. A Neighbourhood Council, with its President, rules them. At the supra-local level, there are two types of voluntary agreements: the *mancomunitats* and consortiums. The former is a voluntary agreement between two municipalities; the latter is a voluntary agreement between different levels of administration (municipalities, provinces, AC, etc.) and also with private actors. Finally, two metropolitan authorities can be found, created by the Parliament of Catalonia in 1987, devoted to transport<sup>15</sup> and environmental<sup>16</sup> issues in the metropolitan area of Barcelona. As will see in the following section, these are sectorial agencies that replaced the then existing metropolitan government.

Table 4 illustrates the diversity and number of local administrations in Catalonia.

<b>Local administration units</b>	
Municipalities	947
Provinces	4
Supralocal entities	409
Mancomunitats	75
Consortiums	291
Counties	41
Metropolitan authorities	2
Infralocal entities	59
<b>Total</b>	<b>1,419</b>

Table 4: Number of local government units in Catalonia (2010)

Source: Own elaboration with data deriving from the Generalitat (SIAL),

<http://www.gencat.cat/municat/>

Moreover, all local governments are autonomous to create public and public-private agencies and societies for the management of services.

### Regional-local relationships

Local governments are considered as the Cinderella of Spain's recent political evolution. The decentralisation over the last 30 years has been focused on the regional level (the Autonomous Communities). In the case of Catalonia, this process has been even more important for its cultural and identitarian needs. In other words, the issue of acquiring more legal and financial

<sup>15</sup> [http://www.amb.cat/web/guest/Entitats\\_AMB/Entitat\\_Trans/Presentacio](http://www.amb.cat/web/guest/Entitats_AMB/Entitat_Trans/Presentacio)

<sup>16</sup> [http://www.amb.cat/web/guest/Entitats\\_AMB/Entitat\\_Medi\\_Ambient/Presentacio](http://www.amb.cat/web/guest/Entitats_AMB/Entitat_Medi_Ambient/Presentacio)

autonomy has guided the Catalan governmental strategy at the expense of other issues. For example, Catalan governmental leaders periodically start negotiations with the central government to change the financial system of the AC. Over the last few years, one of the main debates – still open - has been the approval of the revision of the Statute of Autonomy. As a consequence, the attention paid to local issues has been minor, with punctual reforms, as in 1987 (creation of counties) and maybe in 2010 (via the creation of the Metropolitan Authority of Barcelona and the *veguerías*). As will be seen in the following section relating to key city regional governance themes, the relations between the Catalan government and the municipalities belonging to the city-region have been influenced both by the Spanish-Catalan debate and the differences in political majorities of regional and local governments. Among political divergences, the political struggle between the Generalitat and the City of Barcelona has been particularly relevant.

The fragmentation of Catalan – and Spanish - local government is not exceptional but a general feature of the Franco type of local government, according to the classification of Hesse and Sharpe (1991). The Napoleonic model – which includes Spain, France, Italy, Portugal and Greece - is characterised by high local identity at the expense of high local autonomy. In other words, the essence of local government is political rather than functional. Local governments are considered to embody territorial communities and office holders are expected to represent the interests of this community, especially in relation to higher levels of government (being national and regional in the Spanish case) (Hesse and Sharpe, 1991).

This “political localism” (Page, 1991) explains local fragmentation and the advocacy for keeping small units of government. Several proposals from the Catalan government (most recently in 2001) to merge municipalities have failed; on the contrary, the number of municipalities has been increasing, with the 947<sup>th</sup> being created in April 2010. By contrast, in North European countries and in the United Kingdom and Canada there have been huge territorial reforms imposed by central or regional governments to diminish the number of municipalities, so as to ensure better efficiency in the delivery of services. The high – and increasing - number of different instruments of cooperation between Catalan municipalities illustrates the limits of small governments. As will be seen in the next section, the capacity of local governments is also influenced by the insufficiency of economic resources.

### **National level decentralisation policy and support for city-regional capacity building and autonomy**

In formal legal terms, a “metropolitan area” in Spain is an organisational arrangement that an AC can set up in its territory when it considers it is necessary to coordinate action among several municipalities linked by economic or social ties. Then each regional government decides whether these linkages exist and, when they do exist, it approves the institutionalisation of formal arrangements among the municipalities involved. As a top-down policy, the AC decides to set up (or not) the institution of a “metropolitan area” in order to coordinate specific services and policies, mainly pertaining to transportation and services related to the environment (waste, water supply and sewage, etc.). By creating a formal structure of this type, the regional government acknowledges the existence of “integrated networks of municipalities in big urban agglomerations which have economic and social linkages” (Art. 43, 7/1985 Local Government Act) and makes the decision to establish a formal network of local governments for the coordination of certain policies (Alba and Navarro, 2005). However, few regional governments have made use of this prerogative and when they have done it –as in Barcelona and Valencia– it has been with very limited purposes.

The fact that there are almost no metropolitan areas in the formal legal sense of the term does not mean that the global (territorial-functional) trend of metropolisation has been alien to the country. Today Spain has ‘an urban society in a preponderant rural territory’ (Rodríguez Álvarez, 2002, p. 108). Some 40.5 % of the Spanish population lives in fifty-seven municipalities with more than 100,000 inhabitants (representing 0.7 per cent of the total number of municipalities). Densely populated urban areas on the Spanish coastal areas and in Madrid contrast with a pattern of lower density development in the central zones of the country. There are twelve cities with more than 300,000 inhabitants, whereas more than 85% of the municipalities have less than 5,000 inhabitants (Rodríguez Álvarez, 2002). Although the metropolisation of urban spaces is a reality in the country and the local government units that comprise those spaces face the same kinds of governance challenges as everywhere else, the Spanish political system has not provided a substantive answer on how metropolitan spaces should be organised, and how policies should be designed and implemented. Several circumstances contribute to draw a confusing picture on this issue.

In the first place, there is not a clear and unique definition of what a metropolitan area (MA) is in physical terms or of how many municipalities should constitute each MA. The long tradition of statistical identification of MA present in other western countries has no parallel in Spain and it is only very recently that the census has provided consistent data on links between municipalities based on mobility. However, this step has not been complemented by

an effort to establish the limits of each of the approximately 25 metropolitan areas above 200,000 inhabitants estimated to exist in the country. In a few cases, such as Barcelona, there has been a political definition of the components of the MA (Alba and Navarro, 2005).

In the second place, for almost three decades of democratic rule in Spain, there have not been incentives to promote and encourage the consolidation of metropolitan areas as organisational arrangements to solve complex urban issues. Because of the specific features of the Spanish political system –and specifically those features that refer to its territorial structure – the consolidation of Autonomous Communities has been the priority. Indeed, the development of other forms of local autonomy which could potentially challenge the power of the new (and in phase of consolidation) political actors has been systematically postponed to a later stage. Only recently, the system has carried out reforms at the local government level through the reinforcement of its autonomy and powers, and once again, the metropolitan issue has not been present in this wave of reforms. Although acknowledged in communities of experts as one of the main challenges to global governance for the next decades, metropolitan governance is not a prominent issue in the political agenda, neither at the national level, nor at the individual level of each MA (Navarro and Tomàs, 2007).

The law approved in June 2003 by the Spanish Parliament (*Proyecto de Ley de Medidas para la Modernización del Gobierno Local*) emphasises the questions of local efficiency and democracy. In relation to efficiency, two main reforms have been implemented. Firstly, several elements characteristic of the New Public Management (such as instruments of benchmarking and evaluation) have been introduced. Secondly, the law reinforces the role of the mayor and the executive committee by differentiating more clearly their functions and those of the assembly. At the same time, the new regulation introduces some measures to enhance the participation of citizens (such as popular initiatives and the use of new technologies). The law requires the creation of Social Councils in cities of over 250,000 inhabitants to represent economic, professional and neighbourhood groups that will make reports and be consulted on big urban projects (Rodríguez Álvarez, 2002).

Local governments have been seeking financial reform over the last few years, through the Spanish Association of Municipalities and Provinces (*Federación Española de Municipios y Provincias*, FEMP), but without success. In fact, they have been claiming a second decentralisation of the State that would give local governments more financial autonomy. As determined by the Law on Local Finances (*Ley Reguladora de Haciendas Locales*, 1988), the provincial resources depend on State grants. Municipalities can set their own taxes and collect

other indirect taxes; but these are mainly linked to propriety issues. Moreover, the transfers municipalities receive from other levels of government are conditional, which weaken their level of autonomy (Suárez Pandiello, 2008).

Table 5 gives an indication of the share of local government expenditure in Spain. This distribution was fixed in 1978 and has evolved mainly with an increase of expenditure at the regional level at the expense of central level, while the local government share has remained basically constant since then, resulting in clear inequalities.

<b>Level of government</b>	<b>% of total</b>	<b>% of GDP</b>
Central	52.4	20.3
Regional	35.1	13.6
Local	12.5	4.9
<b>Total</b>	<b>100</b>	<b>38.8</b>

Table 5: The share of local government expenditure in Spain (2004)  
Source: Bosch and Espasa, 2006, p.108

As a result of the economic crisis which began in 2008 and especially of the crisis in the construction sector, the financial resources of municipalities have decreased even further, while the demands for social services have increased. Central government has implemented conjunctural measures (plans of direct local investments) that do not resolve the question of a reform of local finances (Tomàs, 2009b).

### **Concluding remarks**

At this point it is appropriate to make some concluding remarks on the national context for city regional governance. Starting firstly with the extent to which local and/or regional autonomy exists in Spain, it needs to be emphasised that Spanish and Catalan local governments belong to the Franco type of local government, with more emphasis on the political dimension rather than on functional issues. In terms of legal autonomy, municipalities and provinces have constitutional recognition. Regional governments can change the number of municipalities in their territories, but face strong opposition. That explains the high level of fragmentation of Catalan local government. Municipalities are the closest government for citizens; they provide the basic services for the day-to-day life of citizens. Nevertheless, municipalities suffer from a lack of economic resources, a situation that has been worsening since the beginning of the economic crises in 2008. The distribution of financial resources between the central, regional and local levels of governments shows a

marginal share for local governments. Moreover, the trend since 1978 has been the increase of regional expenditure at the expense of central level, while the proportion of local governments has remained approximately the same (around 13%).

The process of decentralization in the last 30 years has reinforced the intermediate level of government, the Autonomous Communities. In the case of Catalonia, the claim for regional autonomy has dominated the political debates. In this context, the debate on responsibilities and financial resources of local governments has been secondary and even postponed.

In terms of city regional institutions/governance arrangements fitting in with this, the case of Barcelona shows different definitions of the metropolitan question. As pre-determined by the ESPON CAEE project, the city-region corresponds to the NUTS3 level of government, i.e. the spatial extent of the administrative limits of the Province of Barcelona. This is a second tier of local government with tasks of legal and technical assistance for municipalities. The province comprises 311 municipalities, which are very disparate in terms of surface area and population. However there are other conceptions of the metropolitan reality conveyed by geographers, urban planners and architects alike, but also by local and regional politicians. On the one hand, the metropolitan region (RMB) or the functional area comprising 164 municipalities and conceived as the suitable level for planning. On the other hand, the metropolitan area formed by the City of Barcelona and its 35 surrounding municipalities. This constitutes the core of the metropolitan region and it is enhanced by local elites as the right scale for a single metropolitan authority. Clearly other interpretations of the real functional city-region exist as well.

The city-region of Barcelona is embedded in a system of multilevel governance. The city-region is obviously affected by the general trends depicted above, like local fragmentation and insufficiency of economic resources or the lack of incentives to promote and encourage the consolidation of metropolitan areas. However, the characteristics specific to the city-region and the political and economic importance of the City of Barcelona alter the general set of conditions. The following section will focus on the particular pattern of governance for the city-region of Barcelona.

## Key City Regional Governance Themes

### Institutional Capacity

City regional institutional capacity

The following tables summarise the main indicators of city-region institutional capacity, including elements related to local democracy and local government, formal and informal networks, competences, financial resources, etc.

The first table (Table 6) presents a general overview of the Catalan institutional architecture.

Level	Competences	Political representation	Main Resources (2003)
Regional	Education Health Social services Environment Culture, Sports Urban planning Roads, Public works Agriculture Tourism Police, Emergencies	Direct election of 135 deputies	Tax and fees (52.2%) Transfers (43.2%)
Municipalities	Transit Civil protection Health and education services Urbanism Roads, Public works Culture, Sports Public transport Tourism Municipal markets Basic services	Direct election of councillors	Tax and fees (51 %) Transfers (42.4 %)
Counties	Support to small municipalities to provide basic services	Indirect election: delegates from municipalities	Transfers (95 %)
Provinces	Legal and technical assistance to municipalities Enhancing local cooperation Roads	Indirect election: delegates from municipalities	Transfers (85 %) Tax and fees (10%)

Table 6: Characteristics of levels of government in Catalonia  
Source: Own elaboration with data coming from (Bosch and Espasa, 2006)

At the city-region level, there is a complex institutional organisation illustrated in the following four tables. The first of these (Table 7) shows the different conceptions of the

metropolitan scale, their institutional fragmentation and political representation.

<b>Territorial unit</b>	<b>Population (2007)</b>	<b>% of total pop.</b>	<b>Political representation</b>	<b>Administrative units</b>
Barcelona	1,595,110	29.9	Direct election of local councillors	1 municipality
Metropolitan area	3,150,380	59	Indirect representation in metropolitan authorities	36 municipalities 4 counties
Metropolitan region	4,856,579	91	No political representation	164 municipalities 7 counties
Province of Barcelona (city-region)	5,332,513	100.0	Indirect representation in provincial council	311 municipalities 11 counties 1 province

Table 7: Population, political representation and administrative units in the city-region  
Source: Own elaboration with data coming from the Catalan Institute of Statistics (Idescat)

The next one (Table 8) shows the institutional fragmentation at the city-region scale, including municipalities, supra-local entities –metropolitan authorities, counties, consortiums and mancomunitats– and infra-local entities.

Municipalities	311
Supralocal entities	201
Mancomunitats	35
Consortiums	153
Counties	11
Metropolitan authorities	2
Infralocal entities	3
<b>Total</b>	<b>515</b>

Table 8: Number of local government units in the province of Barcelona (2010)  
Source: Own elaboration with data deriving from the Generalitat (SIAL),  
<http://www.gencat.cat/municat/>

The following table (Table 9) is focused on specific metropolitan institutions: the Metropolitan Transport Authority, the Metropolitan Transport Entity, the Metropolitan Environment Entity, the Mancomunitat of Municipalities and the Consortium of Municipalities. For each institution, the population and number of municipalities is identified, together with their powers, their financial resources and their political representation.



<b>Institution</b>	<b>Population and number of municipalities (2007)</b>	<b>Competences</b>	<b>Financial resources</b>	<b>Political representation</b>
Metropolitan Transport Authority (ATM) (Consortium created by the Generalitat, 1997)	5,217,864*  202 municipalities	1. Cooperation, coordination, planning and financing of public transit services and infrastructures 2. Management fees 3. Future regulatory framework 4. Other functions related to mobility	Transfers (55%) (Generalitat, State, City of Barcelona and EMT) Fees from services (45%)	Indirect Members of regional and local levels. Also members of central government (with no vote) and non-profit associations (as observers)
Metropolitan Transport Entity (EMT) (created by the Catalan Parliament, 1987)	2,790,803  18 municipalities	1. Planning and management of public transport systems 2. Provision of subway service in seven municipalities 3. Management and control of the taxi system 4. Programming transit and road network	Transfers from ATM (56%) Fees from services (33%) Contribution of the Mancomunitat and other income (11%)	Indirect Member municipalities: by population, with fixed assigned number of representatives to the City of Barcelona
Metropolitan Environment Entity (EMA) (created by the Catalan Parliament, 1987)	3,126,294  33 municipalities	1. Hydraulic works and water supply 2. Drainage and sewerage 3. Coordination of urban drainage and sewerage systems 4. Treatment and utilization of municipal and industrial waste 5. Coordination of municipal environmental services	Fees and utility rates (55%) Transfers from the Generalitat (36%) Contribution of the Mancomunitat and other income (9%)	Indirect Member municipalities: by population, with fixed assigned number of representatives to the City of Barcelona
Mancomunitat of Municipalities of the Metropolitan Area of Barcelona (MMAMB) (created by local initiative, 1988)	3,026,380  31 municipalities	1. Improving metropolitan infrastructure, public space, housing and land 2. Cooperation and technical assistance to municipalities	Transfers from municipalities (72%) Fees and other income (28%)	Indirect Member municipalities: by population, with fixed assigned number of representatives to the City of Barcelona

Consortium of the Metropolitan Area of Barcelona (CAMB) (created by local initiative, 2009)	3,150,380  36 municipalities	Develop the competences of other entities (except for the ATM) and other: Urban planning and public roads, transport and mobility, environment, parks and forests, economic promotion, social services, culture, sports, immigration and housing	Funded by the consortium organizations: EMT, EMA and MMAMB	Indirect Member municipalities: by population, with fixed assigned number of representatives to the City of Barcelona
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\* Data of 2006

Table 9: Metropolitan institutions of the city-region

Source: Tomàs, 2009a, pp. 88-89.

To all this complexity all sorts of public and public-private agencies have to be added, that operate in the city-region for the management of metropolitan services such as water supply, drainage and sewerage, treatment and utilization of waste, etc.

Finally, apart from formal networks, there are several informal networks between municipalities, such as strategic plans, mobility plans and pacts to promote economic development. All these informal arrangements have indirect political representation and are financed by their own members. They deal mainly with issues regarding economic development. The principal ones are referred to in Table 10.

	<b>Members</b>	<b>Objective</b>
Metropolitan Strategic Plan of Barcelona (since 2003)	36 municipalities of the metropolitan area of Barcelona Metropolitan institutions (EMA, EMT, MMAMB) Other administrations (Generalitat, Provincial Council of Barcelona, county councils) Most important economic and social bodies (Chamber of Commerce of Barcelona, employer's organisations, trade unions, University of Barcelona, Fair of Barcelona, Port and Airport, etc.)	Identify and promote support strategies for the economic and social development of the metropolitan area of Barcelona, that is: Anticipate future challenges; Provide the necessary changes to meet such challenges; Promote the participation of all the agents involved; Enable a consensus among differing interests; Prioritise decisions.
Industrial Agreement of the Metropolitan Region of Barcelona (1997)	44 municipalities of the metropolitan region of Barcelona Metropolitan institution (MMAMB) Other administrations (Generalitat, Provincial Council of Barcelona, county councils) Most important economic and social bodies (business organisations, all universities of the province, trade unions, Fair of Barcelona, Port and Airport, etc.)	a) The economic and social development and employment promotion throughout Metropolitan Region. b) Promote and disseminate measures to achieve increased current weight of the industrial sector within the metropolitan area through the improvement of business competitiveness and the diminution of unemployment.
Strategic Plan of the Coast of Metropolitan Region of Barcelona (2004)	27 municipalities of the metropolitan region of Barcelona Metropolitan institution (MMAMB) Other administrations (Generalitat, Provincial Council of Barcelona) Port of Barcelona	a) The preparation of the Strategic Plan for the coast of Barcelona Metropolitan Region and the actions to stimulate and monitor their implementation. b) Ensure that the Plan is a tool that meets the needs of municipalities and moves towards an integrated coastal management. c) Develop studies and papers about the general needs of the territory within its performance, paying particular attention to

		<p>those issues related to coastal issues.</p> <p>d) Provide studies and proposals that may be used for understanding and preparing strategies for the whole Catalan coast.</p> <p>e) Establish a relationship of close collaboration with the Metropolitan Strategic Plan of Barcelona.</p> <p>f) Promote and disseminate the culture and methodology of strategic planning as a tool citizen participation in their processes of economic and social development.</p>
Barcelona Economic Triangle (BET) (since 2009)	3 municipalities of the metropolitan area (Barcelona, Cerdanyola del Vallès and Viladecans) Generalitat de Catalunya	Promote areas of high economic value in international markets and attract investors in three areas (Vallès, Besòs and Llobregat)

Table 10: Main informal networks in the city-region of Barcelona  
Source: Own elaboration

To sum up, high levels of fragmentation can be observed at the city-region scale, with many institutions (province, counties, metropolitan authorities, mancomunitats, consortiums, etc.) that operate in different territories. Moreover, there are other less institutionalized mechanism of cooperation between municipalities, other levels of administration and private actors. Among these, the Metropolitan Strategic Plan needs to be highlighted and is discussed in due course.

#### Institutional capacity – qualitative understandings

In order to determine the extent to which the high level of fragmentation observed in the previous section affects the institutional capacity of the city-region, it is necessary to examine the recent institutional and political context of the city-region.

For the past 50 years, the city of Barcelona and the inner ring have shared the same institutional organisation, regional plan and management of services. The most powerful body was the Metropolitan Corporation of Barcelona (MCB) (1974-1987), comprising 27 municipalities and bearing a number of responsibilities such as public transit, water supply, waste treatment and urban planning (particularly, the implementation of the General Metropolitan Plan of 1976). The political influence of a single institution's gathering half of the Catalan population was feared by the AC government. Similar to what happened in London with the Greater London Council in 1986, the MCB was abolished in 1987 by the Catalanian Regional Government, in the

framework of a general reform of the territorial structure.

In order to replace the MCB, two specialised metropolitan bodies were created by the Parliament of Catalonia: a) covering 33 municipalities, the Metropolitan Environment Entity, with responsibilities in water supply, sewage disposal and urban waste treatment, and b) the Metropolitan Transport Entity, formed by 18 municipalities to organise, manage, plan and coordinate public transport services (buses, metro, taxi) in its area. Moreover, the responsibilities in planning were transferred to the AC government. The reform was not supported by locally elected officials, not only because it fragmented the metropolitan interest but also because of its political significance. Indeed, the majority of metropolitan municipalities were ruled by left-wing political parties, while the AC government that passed the law was ran by the Catalan nationalists (on the centre right). In order to diminish the impact of the reform, 23 municipalities decided, one year later, to get together on a voluntary basis. They formed the *Mancomunitat* of Municipalities of the Metropolitan Area of Barcelona to carry out the MCB's remaining powers, such as road construction, public works and technical assistance to the municipalities (since 1988, the members of the association have increased up to 31). In 1997 the Generalitat created the Authority for Metropolitan Transport. The function of the ATM (which is a public consortium) is to organise the public transportation system in an area larger than the metropolitan region but smaller than the Province or city-region. The integration of the system of transport fares has been its main achievement to date (Négrier and Tomàs, 2003).

The Association of Municipalities with Urban Transport of the second metropolitan ring, known as the AMTU<sup>17</sup>, is a network of voluntarily associated municipalities which aims to enhance and promote urban public transport in their cities, and support urban mobility in general within the metropolitan region (RMB). The AMTU is a public interest association and forms part of the ATM. A total of 65 cities of the city-region belong to the AMTU, only four of which lie beyond the spatial limits of the metropolitan region (RMB)<sup>18</sup>.

The question of diminishing institutional fragmentation has been on the agenda of metropolitan municipalities since the dissolution of the MCB. These claims have risen since 2003, when the Socialist Party took power of the the *Generalitat* (in coalition with two other left-wing parties). The nomination of Pasqual Maragall, ex-mayor of Barcelona, as prime minister of the AC

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<sup>17</sup> <http://www.amtu.cat/amtu/>

<sup>18</sup> Igualada, Manresa, La Pobla de Claramunt and Vic.

government opened a policy window. He succeeded Jordi Pujol, leader of the nationalist federation *Convergència i Unió*, who had been ruling the AC during 23 years. Since the election, mayors have advocated for the real institutionalisation of the metropolitan area. Considering it as a “natural” evolution, they wish to unify the three metropolitan bodies and their competences in a single institution, the Metropolitan Area of Barcelona. As will be seen in due course, one way to give visibility to the “metropolitan reality” was the approval of the First Strategic Metropolitan Plan of Barcelona in 2003, which gathered the 36 municipalities of the metropolitan area, other public administrations and the main economic actors. The coincidence of political parties (the Socialist Party has been leading the City Council of Barcelona since the first democratic elections in 1979) appeared as the necessary condition to recognise the specificity of the metropolitan area.

Nevertheless, and much to the disappointment of metropolitan mayors and councillors, political priority was given to the approval of the new Statute of Autonomy of Catalonia, the law that contains the basic institutional regulations of the AC. After the elections held in 2006, socialists repeated the coalition government with the two other parties, but with another prime minister, José Montilla, former mayor of one of the biggest cities close to Barcelona (Cornellà). Montilla announced the creation of a metropolitan single authority, which is currently discussed in Parliament. However, the 36 municipalities of the metropolitan area decided voluntarily in 2009 to create the Consortium of the Metropolitan Area of Barcelona, which gathers the three metropolitan entities, so as to prepare the institutional transition to the new metropolitan authority. In other words, there is a consensus coming from local elites that the current institutional fragmentation is harmful to the interests of the metropolitan municipalities.

Yet what has to be born in mind is that if the single metropolitan authority is created, it will correspond to a smaller part of the city-region, formed by 311 municipalities. At this level, the coexistence of other administrations with overlapping powers would have to be taken into account, which would limit the city-regional autonomy.

### **City regional autonomy**

In this section an analysis of the city-regional autonomy is carried out, taking into account the overlap of responsibilities and the financial sources.

As seen in the previous section, there are several metropolitan institutions and different levels of local governments with responsibilities within the city-region.

Firstly, there is the Provincial Council of Barcelona (*Diputació de Barcelona*). In the metropolitan area, the intervention of the Council is minimal, since both functions of technical and legal assistance to municipalities are carried out by the *Mancomunitat*. Municipalities of the first ring are quite large (98% of municipalities have more than 10,000 inhabitants) and therefore their councils have sufficient resources (technical and legal). In cooperation with the *Mancomunitat*, the *Diputació* manages the most important parks of the metropolitan area. However, the *Diputació* effectively acts as a support for small and medium towns in the metropolitan region, which do not benefit from an association like the *Mancomunitat*. The *Diputació* helps these municipalities in the development of local services (such as waste management) and provides them with technical support (such as in the preparation and implementation of projects or collecting the taxes).

Secondly, there are 11 counties in the city-region (Alt Penedès, Baix Llobregat, Barcelona, Garraf, Maresme, Vallès Occidental, Vallès Oriental, Bages, Osona, Anoia and Berguedà). According to the laws of territorial organization of Catalonia approved by the Parliament in 1987, the counties are the basic level of supra-local organisation. They support the provision of local services in cases where they cannot be provided by the municipalities. As in the case of the Provincial Council, the county has a different role in the metropolitan area than in the city-region. Within the metropolitan area, the county has a minimal role and is regarded as an aggravating factor of institutional fragmentation. In fact, the creation of the counties coincided with the elimination of the Metropolitan Corporation of Barcelona (MCB) and the creation of metropolitan bodies. The territory of the MCB was divided into different counties, considered by most local elected as an “artificial division”. On the contrary, counties in the rest of the city-region have greater symbolic importance and identity. They also help small municipalities in the provision of local services such as planning, environment and social services. However, the lack of financial resources and the overlapping of responsibilities with the *Diputació* limit their importance.

Last but not least, the institutional capacity of the city-region of Barcelona is influenced by the role of the Catalan government, the *Generalitat*. As depicted in the previous section, the powers

of the AC Government are governed by its Statute of Autonomy and under the Spanish Constitution. Regarding the local government, State government and AC governments share legislative powers. The State has exclusive competence to legislate in terms of general precepts and basic constitutional guarantees of local authorities (powers, electoral system and financial resources). The Catalan Government, under these State laws, has passed laws relating to local government, mainly the territorial laws in 1987 and the revised text of the municipal law and local government of Catalonia in 2003. As stated in the previous section, the Parliament is currently discussing a project for creating seven territorial divisions (*vegueries*) to substitute provinces. If approved, the territory of the city-region, that is, the province of Barcelona, would be divided into two *vegueries*: 164 municipalities of the city-region would belong to the metropolitan *vegueria*.

With regard to metropolitan governance, the Government's intervention – or the lack of intervention – has been important. Two decisions that have affected the city-regional autonomy are worth citing. In the first place, the dissolution of the MCB meant not only the loss of the institution but also the loss of capacity planning at the metropolitan scale. Planning powers were absorbed by the *Generalitat*, and, partially, by municipalities. As seen previously, the abolition of the metropolitan authority resulted in a fragmentation of the metropolitan area between different bodies and was very much criticised by locally elected representatives. After 10 years of a lack of crucial decisions affecting the city-region, the creation by the *Generalitat* of the Authority for Metropolitan Transport in 1997 represented a change in the recognition of the metropolitan reality. This consortium formed by different levels of administrations has been essential for enabling citizen's mobility across a large part of the city-region's territory thanks to the integration of public transit systems.

By contrast, there has been a lack of intervention from the *Generalitat* in relation to territorial planning and particularly regarding the revision of the General Metropolitan Plan of 1976. This Plan refers to the 27 municipalities of the ancient MCB and has been the main tool for urban planning in this area. However, for most urban planners, geographers and architects, the plan is obsolete to deal with the contemporary urban reality (Nel-lo, 2001). In 1995, the *Generalitat* approved the Territorial General Plan, which established the boundaries of six areas for planning, one of them corresponding to the metropolitan region of Barcelona (164 municipalities). On 20 April 2010, the Catalan Government granted its formal approval to the Territorial



metropolitan plan, covering the seven counties (comarques) of Barcelonès, Baix Llobregat, Maresme, Alt Penedès, Garraf, Vallès Oriental and Vallès Occidental.

The role of the *Generalitat* in the city-region is also essential in soft policies such as health, education, social services, etc. As in most metropolitan areas, metropolitan authorities have responsibilities in hard policies, mainly urban planning, public transport and environment (Tomàs, 2009a). To sum up, there is little city-regional autonomy. The city-region of Barcelona is divided into multiple institutions with responsibilities mainly in environment and public transport. The provincial council, the county council and the *Mancomunitat* have similar tasks, i.e. promoting municipal cooperation and giving assistance to municipalities.

In relation to fiscal autonomy, as explained in the previous section, the share of local government expenditure is marginal compared to the regional and central levels of government. In Spain, the creation of the Autonomous Communities after the dictatorship transformed the fiscal distribution (from central government to regional government, while the fiscal capacity of local government has not improved). Municipalities and provinces claim for a reform of local finances so as to increase their financial resources. Provinces are dependent on State transfers, while the income of municipalities is dependent on propriety taxes. In practice, local governments assume more tasks than those assigned to them, without more resources. This situation specially applies to big cities, which concentrate more diverse populations with specific needs. In the city-region, the City of Barcelona benefits from a particular charter that provides the city with more economic resources. In fact, the City of Barcelona is wealthier in terms of gross product and family income per capita than the average municipality belonging to the metropolitan area. The City of Barcelona is the largest contributor to the *Mancomunitat* of municipalities and, relative to its population, the smallest beneficiary of the investments made by the organisation (Àrea Metropolitana de Barcelona, 2003).

### **Favourability**

As explained in the previous section, the Barcelona city-region is characterised by high institutional fragmentation and little fiscal autonomy. Moreover, it is politically underrepresented in both Catalan and Spanish elections. However, within the city-region, the City of Barcelona has more economic significance and reputation not only to deal with other

levels of government but also to generate international networking.

### The city's political significance

#### a. Electoral significance

As occurs in most countries, urban population is underrepresented in regional and/or national Parliaments. This is the case of the Barcelona city-region, which corresponds with the electoral district (the province), both in the Catalan Parliament and in the Spanish House of Commons. For the Spanish Senate, the electoral system combines a direct election of deputies with an indirect election by the AC governments according to their population, so in this case the province is not the only electoral district.

Table 11 compares the political weight of the city-region in the last Catalan and Spanish House of Commons elections (2006 and 2008, respectively). In the first two columns, the table shows the current number of deputies and their percentage in both elections. The last two columns show the number of deputies and their percentage taking into account the proportional criterion, that is, the weight that the city-region would have according to the electoral census (with data of last elections).

	<b>Number of deputies in current situation</b>	<b>Weight of the city-region</b>	<b>Number of deputies with proportional criterion</b>	<b>Weight of the city-region with proportional criterion</b>
Catalan Parliament 2006	85 out of 135	63 %	101 out of 135	75 %
Spanish House of Commons 2008	31 out of 350	8,8 %	40 out of 350	11.3 %

Table 11: Comparison of the political weight of Barcelona city-region in Catalan and Spanish elections  
Source: Own elaboration

In the Catalan elections, the province of Barcelona holds around 60% of the total seats, less than it would correspond with a strictly proportional criterion. In the case of the Spanish House of Commons, the city-region is also underrepresented, as the city-region of Madrid. In both elections there is the same electoral system, plurinominal districts with a proportional formula (Hondt Law). However, the assignment of seats to each district is not proportional to their

populations but searches for a balance between rural and urban areas, meaning that the ratio of voters per deputy is higher in urban provinces like Barcelona than in rural or less densely populated provinces. For example, in the Spanish elections each electoral district (there are 52) has at least two deputies, independent of its population, and the rest are assigned according to the population of the district.

In Catalonia, the cleavage between rural and urban areas has traditionally reflected a political difference between conservative Catalan nationalist electoral support in the inner territory and socialist and left-wing parties in Barcelona and its metropolitan area. The party political congruence between different levels of government has influenced city-regional governance, as shown in the following section.

#### b. Party political congruence with relevant higher tiers of government

In Catalonia, there are just local direct elections for municipal councillors and deputies: in provincial and county councils, as well for the councils of metropolitan authorities, their members represent the municipalities according to municipal political results.

In the last 25 years, there has been political divergence between the government of the *Generalitat* and the councils of most of the municipalities belonging to the metropolitan area, including the City of Barcelona. Between 1980 and 2003, the *Generalitat* was headed by Jordi Pujol, leader of *Convergència i Unió*, while the City of Barcelona has had 4 mayors since the first democratic elections in 1979, all from the Socialist party (Serra, Maragall, Clos and Hereu). Moreover, most of the surrounding municipalities and bigger cities of the city-region have been ruled by left-wing parties. This political divergence was especially visibly during the first years of democracy, where the main parties (CiU and PSC) tried to monopolise their electoral supports. The political rivalry between Jordi Pujol and Pasqual Maragall that symbolise the opposition between the conservative *catalanists* and the urban *progressists* was parallel to the development of the City of Barcelona after the Olympic nomination in 1986. In this context, as described previously, the Parliament of Catalonia, with absolute majority from CiU, abolished the existing metropolitan institution (MCB) and replaced it with two metropolitan authorities. So in this case, the political divergence really affected metropolitan governance.

However, political congruence existing since 2003 between local and regional level has not led, at present, to substantial changes in the favourability of the city-region. Some urban policies have been implemented, but they have been focused at the neighbourhood scale and conceived for all the AC (*Pla de barris*), not specifically for the city-region of Barcelona. Even if the two Socialists prime ministers (Maragall and Montilla) have been previously mayors of big cities of the city-region (Barcelona and Cornellà, respectively), the political priority was given to the approval of a new Statute of Autonomy. In other words, the debate on the place of Catalonia inside Spain affects the political agenda of the Generalitat, whatever is the political party at the head of the government.

#### c. Political networks

In Catalonia, there is not the French tradition of the *cumul de mandats*, meaning that mayors and local councillors are at the same time deputies and senators. In Catalonia, studies show that around 20% of deputies at the Parliament are also mayors or local councillors (Magre, 1999).

Mayors try to pressure to higher tiers of government through other channels, mainly within political parties and in alliance with other municipalities. In Catalonia there are two associations of municipalities linked to political parties. The Association of Municipalities of Catalonia gathers municipalities ruled mainly by CiU, while the Federation of Municipalities of Catalonia assembles councillors from left-wing parties.

Among the municipalities of the city-region, the City of Barcelona has its own political networks. At the national level, at the start of the 1990s Barcelona joined a lobby formed by the seven biggest cities in Spain (G-7: Madrid, Barcelona, Bilbao, Valencia, Seville, Zaragoza and Malaga). They claimed specific legislation for big cities that recognises their specificities and allows them with more powers and economic resources. As stated previously, recent changes in national legislation on local government (*Proyecto de Ley de Medidas para la Modernización del Gobierno Local*, 2003) have not satisfied the demands of the biggest cities (Rodríguez Álvarez, 2002). Barcelona also fought for having a special charter, as it had in the 1960s. In 1997, the City Charter of Barcelona was approved by the Barcelona City Council and in 1998 by the Parliament of Catalonia (when CiU governed). However, the necessary approval of the

Spanish Parliament was postponed until 2006, thanks to political negotiations between the AC government and the central government that had been fruitless before. Thanks to the City Charter, the City has regained most powers on urban planning and has improved the financial resources, among other issues.

The city's economic significance

a. Contribution to national wealth/ tax-base

According to data from the Catalan Institute of Statistics (Idescat), the Catalan economy produced goods equivalent to 19.87% of the total for Spain in 2007. Catalonia is the region that contributes most to the Spanish GDP and is the second largest region in terms of population (City of Barcelona, 2008).

At the end of 2007 there were 477,942 businesses located in the province of Barcelona, according to the Central Business Directory of the INE. This figure corresponds to 14% of all the businesses in Spain and 76.3% of the total number of Catalan businesses. Catalonia, with 626,020 businesses (18.3% of the total), continues to be the AC with the highest number of businesses. The total number of businesses in Spain was 3,422,239. According to the Central Mercantile Register of the National Institute of Statistics, in 2007 Catalonia located 17.9% of new companies constituted in Spain. A total of 25,466 companies were created. The province of Barcelona contributed 13.5% of all the companies constituted in Spain, with 19,188 businesses created in 2007.

b. Growth potential

Barcelona has a long and solid tradition of classic manufacturing activities and has been the Spanish leader for many years in different production sectors: automobiles, chemical-pharmaceutical, food, publishing, consumer electronics, etc. Many of these activities have been gradually abandoned by the city and, in recent decades, they have been moved out to the metropolitan region or other locations. The industrial structure of the city-region is polycentric, with a diversified economy on the whole but with specialized centres in the medium and small-

sized cities around Barcelona. The economic structure of the City of Barcelona has been changing in the last decade, where knowledge-based industries are replacing the old industrial sites. The City of Barcelona has concentrated on services, which employ 83.1% of its workers. According to the Central Business Directory of the National Institute of Statistics, 78.1% of businesses with employees in the province of Barcelona in January 2007 were in the services sector, 14.2% in industry and 7.3% in construction.

In relation to growth potential, the city of Barcelona and Catalonia have high rates of activity among their working-age population in comparison with the average for Europe and for Spain. Nevertheless, the recent slowdown in the global economy means that the forecast for positive trends in labour market indicators is not so good going forward as the behaviour of the market until early 2008. In this context of uncertain forecasts, typical of a period of change in the economic cycle, it should be noted that, until well into 2008, the labour market in Barcelona resisted the economic slowdown well and is maintaining high levels of employment and low levels of unemployment in relation to historical trends.

#### c. Population size

The City of Barcelona experienced accelerated growth during the 1960s and the 1970s, reaching 1.9 million inhabitants in 1979. The 1980s and the 1990s were characterised by a steady loss of population that moved out of the city to the surrounding municipalities. The negative trend changed over the last 10 years, with the arrival of foreign population. In January 2008, the foreign population represented 17.3% of the total number of residents of Barcelona (City of Barcelona, 2008, p. 6).

This demographic evolution is parallel to the weight of the City of Barcelona within the city-region. As the next table shows, the population of the central city has passed from representing almost 50% to 30% out of the total population of the city-region.

	<b>Barcelona</b>	<b>Province of Barcelona (city-region)</b>	<b>% of the city region</b>
1965	1,655,603	3,368,620	49.1
1975	1,751,136	4,387,319	39.9
1981	1,752,627	4,620,056	37.9
1986	1,701,812	4,598,249	37.0
1991	1,643,542	4,690,996	35.0
1998	1,505,581	4,666,271	32.2
2002	1,527,190	4,906,117	31.1
2007	1,595,110	5,332,513	29.9

Table 12: Evolution of population of the City of Barcelona and the city-region

Source: Own elaboration with data coming from the Catalan Institute of Statistics (Idescat) and the City of Barcelona

## Reputation

In Barcelona, political divergences as well as the institutional fragmentation of the city-region have been obstacles to building an integrated vision of the metropolitan area. However, the model of urban governance has succeeded in avoiding the ‘joint decision trap’ (Scharpf, 1988).

Political blockage on the development of metropolitan projects has been overcome under the leadership of the mayor of Barcelona and through the complicity of civil society (an important instrument has been strategic planning, discussed further in the next section). The need for collaboration is regularly renewed on the basis of high-profile projects, usually accompanying place-related events. This cooperative pattern was followed in a similar way in the past, with the hosting of the 1888 and 1929 EXPOs. In the democratic context after the era of Franco, the motor for the development of the metropolitan area was the 1992 Olympic Games. The ‘Barcelona model’ for organising the Olympics was based on large urban projects combined with small operations in the neighbourhoods, the decentralisation of the city into ten districts and the modernisation of public administration. At the same time, the need to collect funds encouraged the representatives of the city to negotiate with other levels of governments and different international organisations (such as the International Olympic Committee). In order to ensure the investment of private actors, the strategy adopted was focused on public–private partnerships (Borja, 1995).

The same model of cooperation was repeated with a new place-related event, *Fòrum 2004*. On this occasion, cooperation was more difficult since it was the first time that this cultural event was held in the world. Moreover, the model of urban development conceived for the area of the event (*Besòs*) was highly criticised by some urban planners and architects. Nevertheless, the alliance was sustained through the leadership of the city, the support of the regional government and the main actors from civil society (Tomàs, 2005). Recently, the city's mayor announced the candidature of Barcelona for hosting the 2022 Winter Olympic Games, following the model of cooperation between public and private actors on the basis of international events.

Moreover, since the 1992 Olympic Games, Barcelona has been promoting its own foreign policy based on leadership and membership of pan-European urban networks (such as Eurocities and Metropolis). The use of strategic planning has also been an instrument for city marketing since it has been exported all over the world (Le Galès, 2002).

However, political leaders recognise that it is necessary to reinforce shared leadership and operational capacity. Projects are delivered but slowly and with a lot of obstacles. Several levels of government coexist and share responsibilities in enhancing the economic competitiveness of the city-region. As the latest document of the Metropolitan Strategic Plan of Barcelona states: “the mayors and leaders of the metropolitan region have not yet actively taken on the Plan. In other words, there is no decisive Leadership for the different projects and objectives with a clear and comprehensible message for the people. Finally, there are gaps in the shared Leadership among the representatives of the public sectors and those of the social and economic institutions” (Strategic Metropolitan Plan of Barcelona, 2006, p. 64). So as to renew the Leadership, the Plan proposes to create a Territorial Council of Mayors. This new body has the aim of guaranteeing the leadership and participation of the mayors “who ideally would become the great defenders of the SMPB” (Strategic Metropolitan Plan of Barcelona, 2006, p. 65).

Scope for city-regional officials to operate in and at higher levels

In Barcelona, as has been seen there is not a lot of tradition of combining the role of deputy with that of local councillor. However, political leaders have periodically tried to deliver the projects on the basis of place-related events that oblige the representatives of different levels of



government (central, regional and local) to sit together around the same table.

The use of strategic planning has become the instrument of creating a collective vision and designing the main guidelines for the city's development over a ten-year term. During the 1990s, three Strategic Plans were approved (1990, 1994, 1999) based on the City of Barcelona. After Maragall, the new mayor Clos decided to go one step further and started working on the first Strategic Metropolitan Plan (approved in March 2003). The first Strategic Metropolitan Plan is different from the other plans because it includes representatives from 36 municipalities of the metropolitan area of Barcelona. The leadership comes from the mayor of Barcelona (who is the president of the general council of the plan, which includes 300 representatives from different sectors) and also from members of his team (who lead different commissions). This plan has also enabled the participation of other local leaders (and mayors from other political parties) for the first time. One of the collective demands supported by the majority is the need to simplify the institutions of the metropolitan area and create a new body to coordinate the 36 municipalities. Furthermore, this plan has provoked a reaction from municipalities in the metropolitan region that are not included. Seven medium-sized municipalities have argued for participation in the plan, raising the question as to whether the limits of the metropolitan area are too small (Colomé and Tomàs, 2002). In fact, the latest document of the Strategic Plan underlines the need to reinforce the body's relations with the second metropolitan ring and the metropolitan region of Barcelona (Strategic Metropolitan Plan of Barcelona, 2006).

In relation to the participation of other local and regional authorities, this plan integrates all the municipalities that belong to the three different metropolitan bodies created in the 1980s (Environment, Transport and Mancomunitat). It also includes the bodies in charge of the Port and the Airport of Barcelona, as well as representatives from the two supra-local levels (counties and the province of Barcelona). The plan also has three commissions which work with the regional government (through meetings four times a year), with other big cities such as Madrid and Valencia (through meetings twice a year), and with other European cities that have expertise in strategic planning such as Lyon and Milan (through annual meetings). The corporate actors are represented in several commissions such as those centred on tourism and economic development. They include the Chamber of Commerce, Industry and Shipping, the Fair, the trade unions (CCOO and UGT, but also the unions of farmers, hospitals and metallurgic sector), employers' organisations (*Foment del Treball*), financial groups, hotel groups and the utility companies. Finally, a wide variety of actors from civil society participate

in the general council of the plan, including NGOs, private foundations, centres for research, universities, the mass media and several associations (ranging from arts, crafts and sports to automobiles). There are also some individuals who participate as experts on specific issues.

### **Concluding remarks**

This section has focussed on the three questions of *capacity*, *autonomy* and *favourability* in the context of city-regional governance. With regard to capacity, it can be concluded that according to Spanish legislation, the government of Catalonia indeed has the capacity for creating metropolitan areas. However, the *Generalitat* has made use of this prerogative to abolish the existing metropolitan government and to create metropolitan agencies with single functions (transport, environment). This is understandable if one considers that an additional layer of government would represent a competitor for an institutional actor (the Autonomous Community) which is still in a phase of development in the Spanish political system. Thus in this field a paradoxical situation is faced, whereby the legal provisions for institutional consolidation of metropolitan areas, far from contributing to the emergence and spread of this kind of organisational arrangement have hampered it because the actors responsible for initiating the process have no incentives to do so.

In relation to city-regional autonomy, in Spain, the creation of a regional tier has transformed the fiscal distribution (from central government to regional government, while the fiscal capacity of local government has not improved). The same thing has happened in urban policies, especially urban planning. In Barcelona, the regional level “centralised” the competences in urban planning of the metropolitan area with the abolition of the metropolitan authority, diminishing the capacity of local governments to be autonomous. This has happened since regional governments have competences over local government, shared with the central government.

There is a high level of institutional fragmentation within the city-region, with many infra-local, local and supra-local authorities such as the province, counties, consortiums, mancomunitats, etc. Metropolitan authorities have responsibilities in the management of environmental and public transport services. The *Mancomunitat* gives technical and legal assistance to its 31 members. Provincial and county councils develop similar tasks mainly in small and medium-

sized municipalities of the city-region. The *Generalitat* has the main responsibilities in soft policies but also in hard policies like urban planning, infrastructures, transport, etc.

Finally, the case of Barcelona confirms the idea that any study of metropolitan governance needs to consider political factors in regional governance as well as the relation of powers within the city-region. The party political divergence between the government of the *Generalitat* and the City of Barcelona counts for the abolition of the metropolitan government in 1987. This political decision illustrates the cleavage between conservative Catalan nationalist support in the inner territory and the political dominance of left-wing parties in Barcelona and its metropolitan area. Party political congruence since 2003 has not led to the specific recognition of the metropolitan reality, however this is in the process of change with the approval of the Metropolitan Territorial Plan and the Law on the Metropolitan Area of Barcelona.

The City of Barcelona has special economic significance within the city-region, but its economy is directly connected with its hinterland. The city-region is changing into a service-based economy, where knowledge is called to have a central role. This structural change is clearly visible in the City of Barcelona, where knowledge-based industries are replacing the old industrial sites, which, in turn, are moving into the wider metropolitan region.

In order to improve economic performance, the City has developed a model of cooperation between public and private actors which is renewed mainly on the basis of specific events like the 1992 Olympic Games. Strategic plans turn out to be the instrument used to integrate a collective vision and to design the main guidelines of the city's development. After the approval of three plans (1990, 1994 and 1999) based on the City of Barcelona, its mayor decided to go one step further and started working on the first Strategic Metropolitan Plan. It includes representatives from the 36 municipalities that belong to one of the three metropolitan bodies. For the first time, this plan now enables the participation of other local leaders and mayors from other political parties, having a platform to discuss and exchange information. It also offers them the opportunity to introduce themselves as the Metropolitan Area of Barcelona to other groups (private sector, universities, other administrations, etc). Approved in March 2003, the first Strategic Metropolitan Plan suggests reinforcing policies on the metropolitan level in order to develop a metropolitan vision shared by public and private actors.

### 3. The economic structure of the Barcelona city-region

#### Spatial distribution of employment (1991-2001)

The travel to work data collected from the 2001 Census, which formed the basis for the physical delimitation of the functional metropolitan urban region of Barcelona referred to in the previous section, provides key information relating to the sectors of the economy in which the **economically active resident population** is employed, as well as the economic sectors and divisions of the **locally-based jobs**. While the data of the economically active resident population gives an indication of the economic sectors in which the workforce is employed, it gives no indication of the spatial location of where the workforce is employed. By contrast the value of the complementary locally-based jobs data lies in contributing to an in-depth understanding of the functional nature of a particular spatial territory. Put another way, the figures of the economically active resident population represent the demand for employment, while the figures for locally-based jobs represent the potential to meet that demand, through the supply of locally-based employment.

Regrettably until the corresponding results of the 2011 Census are published, data deriving from the 2001 Census will remain the only such data which can be used for a dynamic analysis of the spatial distribution of employment.

Applying these notions to the city-region, it can be seen from Table 13 that over the period 1991-2001, there was an 8.5% increase in the **economically active resident population** of the city-region, rising from 1.975 million in 1991 to 2.140 million in 2001. Over the same period the **locally-based jobs** in the city region increased by 16.9% from 1.732 million in 1991 to 2.025 million in 2001. As to be expected there was a significant decrease of 16.86% in the locally based jobs in the industrial sector, falling from 663,590 in 1991 to 551,689 in 2001, and a concomitant increase by more than 40% in jobs within the service sector, rising from 919,547 in 1991 to almost 1.292 million in 2001.

As can be appreciated from Table 14 and Map 3 in 2001 over 50% of the locally-based jobs of the city-region were contained within 5 municipalities (Barcelona, Sabadell, Terrassa, L'Hospitalet de Llobregat and Badalona) with well over a third of the city-region's employment provided for within the central city. The total number of jobs within each of the other four

municipalities lay in the 50,000-100,000 range. A further 28% (558,687) of the locally-based jobs of the city region were contained in some 28 municipalities with employment in the 10,000-50,000 range, divided between 10 municipalities<sup>19</sup> with 287,324 jobs in the 20,000-50,000 range (14.19% of the city-region's employment) and 18 municipalities<sup>20</sup> with 271,363 jobs in the 10,000-20,000 range (13.40% of the city-region's employment). Almost 10% of the city-regions jobs were contained in 30 municipalities with jobs in the 5,000-10,000 range, with the remaining 11.5% distributed amongst the other 249 municipalities of the city-region. What is patently clear from Map 2 is the concentration of employment within the area broadly conforming to the spatial limits of the **RMB**. What needs to be added is that the seven cities of the **metropolitan arc** (Granollers, Martorell, Mataró, Sabadell, Terrassa, Vilafranca del Penedès and Vilanova i la Geltrú) collectively provided some 270,000 locally-based jobs in 2001, representing 12% of the city-region's total jobs. These were located primarily in the service sector (58.9%), followed by the industrial sector (31.5%), and the construction (8.9%) and agricultural (0.7%) sectors.

	<b>Agriculture</b>	<b>Industry</b>	<b>Construction</b>	<b>Services</b>	<b>TOTAL</b>
Economically active resident population 1991	30,400	775,680	177,463	990,486	1,974,029
(% of total)	1.54	39.29	8.99	50.18	100
Economically active resident population	21,403	569,300	198,368	1,350,834	2,139,905
(% of total)	1.00	26.60	9.27	63.13	100
Locally-based jobs 1991	22,614	663,590	126,342	919,547	1,732,093
(% of total)	1.31	38.31	7.29	53.09	100
Locally-based jobs 2001	19,868	551,689	161,444	1,291,641	2,024,642
(% of total)	0.98	27.25	7.97	63.80	100

Table 13: Change in the economic structure of the city-region over the decade 1991-2001

Source: INE, Census of Population, 2001

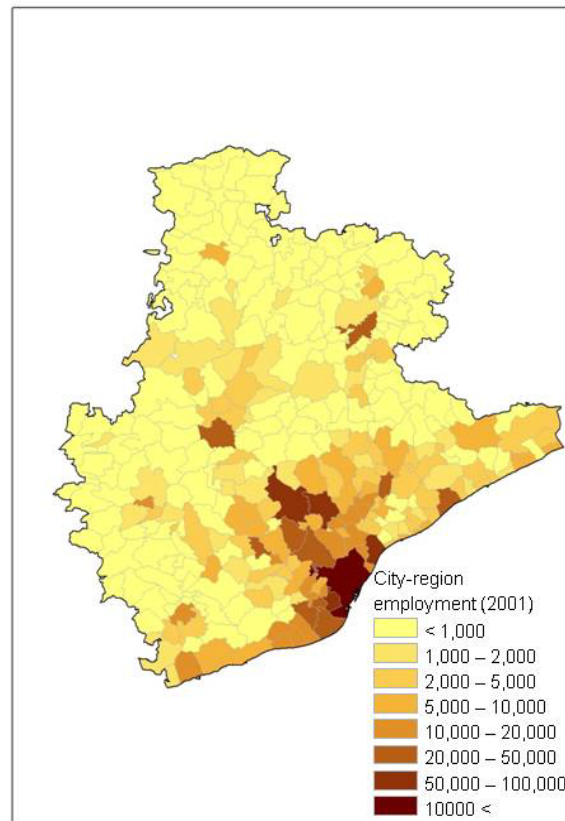
<sup>19</sup> Mataró (42,429), El Prat de Llobregat (31, 863), Granollers (31,776), Manresa (29,674), Cornellà de Llobregat (27,809), Rubí (27,640), Sant Cugat del Vallès (27,188), Martorell (24,749), Sant Boi de Llobregat (23,561) and Vic (20,635).

<sup>20</sup> Igualada (19,401), Vilanova i la Geltrú (19,343), Santa Coloma de Gramenet (19,249), Cerdanyola del Vallès (19,156), Barberà del Vallès (17,465), Montcada i Reixac (15,828), Santa Perpètua de Mogoda (15,397), Esplugues de Llobregat (15,377), Mollet del Vallès (15,274), Gavà (15,213), Viladecans (14,640), Vilafranca del Penedès (14,031), Sant Feliu de Llobregat (12,908), Sant Joan Despí (12,726), Sant Andreu de la Barca (12,211), Castelldefels (11,881), Paret del Vallès (10,707) and Sant Adrià de Besòs (10,556)

Locally-based jobs range	Municipalities	Total locally-based jobs	% of total locally-based jobs
100,000 <	1	779,296	38.49
50,000-100,000	4	258,986	12.79
20,000-50,000	10	287,324	14.19
10,000-20,000	18	271,363	13.40
5,000-10,000	29	195,786	9.67
2,000-5,000	44	128,903	6.37
1,000-2,000	39	55,021	2.72
< 1,000	166	47,963	2.37

Table 14: Spatial distribution of locally based jobs (2001)

Source: INE, Census 2001



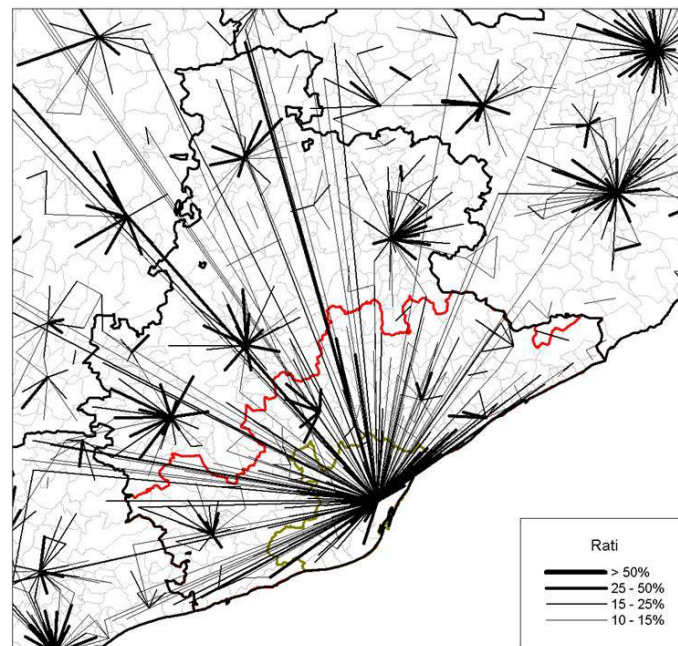
Map 3: Spatial distribution of locally-based jobs within the Barcelona city-region (2001)

Source: INE, Census 2001

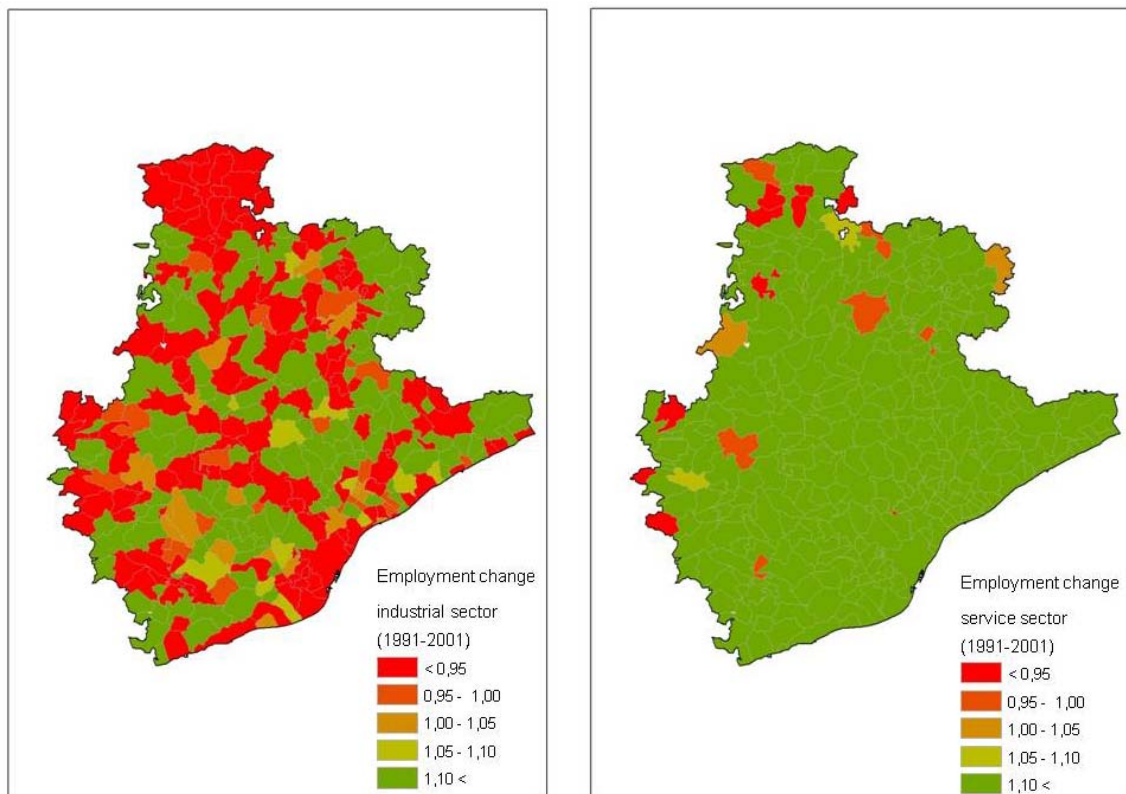
However alongside this clear concentration of local employment within the part of the city-region conforming broadly to the spatial extent of the RMB, it is important to recognise the weight of local sub-centres within the spatial configuration of the city-region and the wider territory beyond. This is clearly evident from Map 4 which illustrates the weighting of work related travel flows between municipalities. Barcelona, the central city, is clearly the principal

point of attraction for the city-region, but other locations such as Vic, Manresa, Martorell and Berga, within the part of the city-region beyond the limits of the RMB, indicated by the red line, provide evidence of the existence of employment sub-centres.

In terms of the spatial distribution of the evolution of employment over the period 1991-2001, Maps 5 and 6 illustrate the change experienced in the industrial and service sectors. Map 5 highlights the relative decrease in locally-based jobs industrial in 146 municipalities of the city-region, while Map 6 indicates the corresponding decrease of locally-based jobs in the service sector in just 10 municipalities. Against these figure it needs to be stated that overall job losses were experienced in 62 of the city-region's municipalities over the 1991-2001 period.



Map 4: Travel to work flows between municipalities of Catalonia  
Source: INE, Census of Population, 2001



Maps 5 and 6: Change in locally-based jobs (1991-2001) in the industrial and service sectors  
Source: INE, Census of population 2001 and 1991

A more detailed breakdown of the employment structure of the city-region in 2001 is provided in Table 15. Here the figures are given of the locally-based jobs within different economic divisions each for each of the spatial units (metropolitan area, metropolitan region, etc.) of the city-region, together with share of jobs relative to all jobs within the overall city-region. It can be seen that over 90% of the total employment of the city-region was concentrated within the area of the metropolitan region and indeed 62% of the jobs focussed within the 36 municipalities of the metropolitan area. Conversely just 8% of the total employment lay within the 147 municipalities of the remainder of the city-region (excluding the RMB). Almost 50% of the locally-based jobs of the industrial divisions were contained within the spatial limits of the metropolitan area, whereas in relation to the divisions of the service sector, the corresponding share of the locally-based jobs was over two-thirds that of the overall city-region. What is perhaps of most significance is that 41% of the principally industrial related jobs were located in municipalities of the metropolitan region, but in the area beyond the limits of the metropolitan area, i.e. within the hinterland of the metropolitan region.





<b>Territorial unit</b>	<b>No. of mun.</b>	<b>Agriculture and fisheries</b>	<b>Industrial extraction</b>	<b>Other industry</b>	<b>Construction</b>	<b>Commerce, hotel trade, personal services and health</b>	<b>Other services</b>	<b>Public admin.</b>	<b>Total locally-based jobs</b>
<b>Metropolitan area</b>	36	6,103	238	280,223	94,061	439,719	428,256	73,381	1,321,981
<b>% of city-region</b>		29	11	48	56	66	72	70	62
<b>Metropolitan region (RMB)</b>	164	15,464	465	516,818	151,526	615,823	564,159	97,924	1,962,179
<b>% of city-region</b>		72	22	89	90	93	95	94	92
<b>Rest of the metropolitan region (excluding the AMB)</b>	128	9,360	227	236,596	57,465	176,104	135,902	24,543	640,198
<b>% of city-region</b>		44	11	41	34	27	23	23	30
<b>Rest of the city-region (excluding the RMB)</b>	147	5,867	1,668	65,498	16,983	45,415	28,823	6,594	170,848
<b>% of city-region</b>		28	78	11	10	7	5	6	8
<b>Barcelona Province (city-region)</b>	<b>311</b>	<b>21,330</b>	<b>2,133</b>	<b>582,316</b>	<b>168,509</b>	<b>661,238</b>	<b>592,982</b>	<b>104,518</b>	<b>2,133,027</b>

Table 15: Spatial distribution of locally-based jobs (2001) within key economic divisions

Source: INE, Census of Population, 2001

## **Key sectors**

In order to reach an understanding of the effects agglomeration economies exert over the territory, economic sectors linked to "knowledge economies" (areas defined by the OECD as high-tech industries, medium and high technology industries, high knowledge activities) have been selected. Textile and clothing industries were also selected on the basis of the strong historic tradition of such activities within Catalonia and their importance within the economic base of the city-region.

The analysis was carried out for 2001, drawing upon 2001 Census data, and in a complementary form for 1991. The objective was, in the first place, through a dynamic analysis to identify, the details of the process of evolution of the localisation of the selected economic activities; and in the second place to gather criteria for the selection of a number of municipalities of the study area which represent processes of growth in these such economic sectors. This enabled a qualitative analysis (through interviews) to be carried out, to determine the degree to which governance processes had facilitated, or not, this process.

## **Selection of the key sectors**

The economic sectors analysed correspond basically to the group of sectors linked to knowledge intensive sectors (*KIS*). In order to select these, consideration was given in an initial phase to the classification established by the OECD with regard to the economic classifications, highlighting from this classification, the activities which belong to the groups defined as: high technology industries (4), high knowledge based activities (6), and medium-high technology industries (3)<sup>21</sup>. The final selection contains, basically, the economic sectors included in the first two groups.

The employment distribution data of the city-region was that obtained from the Census of Population and Employment, from the National Statistical Institute (INE), corresponding to the 2001 Census. The locally-based jobs which explain the distribution of employment at the municipal

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<sup>21</sup> The OCDE classification (1999) defines 7 groups of activities which concentrate all economic sectors. These are 0-Primary industry; 1 Low technology industries; 2-Medium-low technology industries; 3-Medium-high technology industries; 4-High technology industries; 5-Knowledge intensive industries; 6-Knowledge non-intensive industries.

scale are linked to the National Classification of Economic Activities (CNAE) and the National Classification of Occupations (NCO).

The five sectors selected for investigation related to:

- 1) Creative industries (e.g. media, culture, sportive)
- 2) Financial and business related services (e.g. bank, insurance, finance)
- 3) Medium-high technological industries (e.g. hardware, precision machinery and medical instruments, advanced electronics)
- 4) Education and Research and Development; and
- 5) Textile related activities.

Collectively these five sectors accounted for almost 24% of the total number of locally-based jobs of the city region in 2001, with 11.2% in the financial and business related services sector, 5.9% in the education and research and development sector; 4.1% in the textile centre; 1.6% in the creative industries sector, and finally 0.6% in the sector of medium-high technological industries and medical machinery.

### **Selection of sub-centres**

The methodology used for the identification of the economic sub-centres, based upon density, followed the approach of identifying such sub-centres via cut-off (García-López, 2007)<sup>22</sup>. A municipality can fulfil the criteria of a sub-centre for a given economic activity where the two following conditions are met:

- 1) The employment mass of such an industry is equivalent to at least 1% of the overall regional employment; and
- 2) The net employment density of such an industry is greater than the employment density of the region.<sup>23</sup>

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<sup>22</sup> Other authors noted for their work in the area of density cut-offs include: Giuliano and Small (1991); Song (1994); Cervero and Wu (1997); McMillen and McDonald (1997); Bogart and Ferry (1999); Anderson and Bogart (2001); Sheamur and Coffey (2002); and Hall and Pain (2006).

<sup>23</sup> The employment density was taken as the number of locally-based jobs per km<sup>2</sup> of *artificialised* or developed land – this latter information being derived from the CORINE Land Cover project, i.e. categories 1.1.1, 1.1.2, 1.2.1, 1.2.2, 1.2.3, 1.3.1, 1.3.2, 1.3.3, 1.4.1 and 1.4.2 all belonging to the Level 1 classification of ‘artificial’ areas.

### Sub-centres of concentrated employment by sector (2001)

The concentration of locally-based jobs within these sectors is far from uniform throughout the city-region. The sectors of *Textile activities* and *Medium-high technological industries and medical machinery* are the most spread out, with 57.1% of the former lying within 13 municipalities and 67.9% of the latter being concentrated in some 18 municipalities. The *Financial and business related services*, and *Creative industries* sectors are the two which indicate the greatest concentration of locally-based jobs, in both case with approximately 76% of their locally-based jobs concentrated in just 11 municipalities. The *Education and research and development* sector is the one which presents intermediate values with regard to the remaining sectors, with 71.4% of the locally-based jobs being concentrated in 15 municipalities.

Employment sub-centres	Textile industries	Creative industries	Financial and business related services	Medium-high technological industries and medical machinery	Education, research and development
No. of municipalities	13	11	11	18	15
Total locally-based jobs per sector	49,885	25,651	181,907	9,011	89,937
Locally-based jobs per sector/Locally-based jobs per sector in the city-region	57.1%	76.0%	76.1%	67.9%	71.4%

Table 16: Locally-based employment sub-centres of the key sectors (2001)

Source: INE, Census of Population, 2001

Figure 1 represents the relation between the number of sub-centres and the employment contained therein. Clearly the higher the employment in the sub-centre, the higher the concentration of such employment, while the greater the number of sub-centres of a given activity, as in the case of H-manufacturing, the greater the degree of polycentrism.

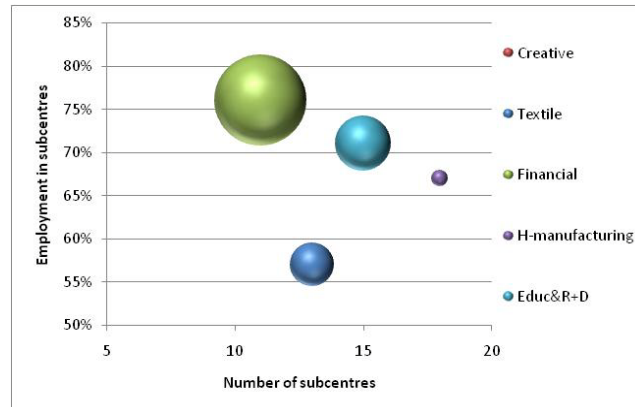


Figure 1:  
Source: INE, Census of Population, 2001

### Emergence of sub-centres of concentrated employment (1991-2001)

The majority of the employment sub-centres identified as such for 2001 were similarly so for 1991, being constant in most cases. Only the *Medium-high technological industries and medical machinery* sector indicated a significant number of emerging employment sub-centres over the 10 year period (6 of the 18 sub-centres: Montcada i Reixac, Esparraguera, Viladecavalls, Vacarisses, Palau de Plegamans and Lliça de Vall). This is a phenomenon resulting from the development of new industrial estates or the development of industrial estates to cater specifically for the demand arising from the relocation of existing firms and businesses from the central core of the city region. As a consequence, the employment market in some municipalities was found to be extremely specialised and even to the extent of being mono-specialised, as occurred in the case of Viladecavalls and Vacarisses with the manufacture of electrical apparatus.

In the remaining sectors the levels of emerging sub-centres of employment were lower and basically occurred in municipalities close to the central core of the city region, or in municipalities integrated within the central core. In the *Financial and business related services* sector, the municipalities of Sant Cugat del Vallès, Cornellà de Llobregat and el Prat de Llobregat all emerged as sub-centres. In the *Creative industries* sector the three municipalities of Granollers, Cornellà de Llobregat and Sant Just Desvern all emerged as sub-centres. In the *Education and Research and development* sector, el Prat de Llobregat emerged as a sub-centre.

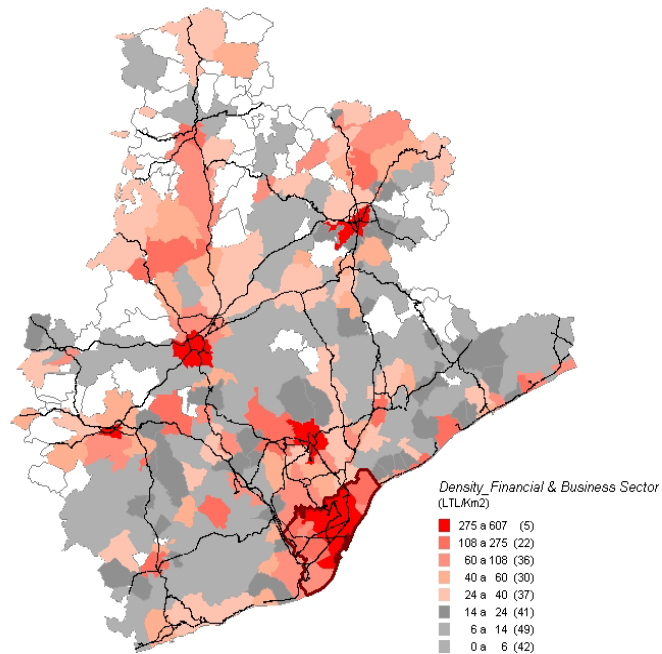
Finally with regards to the *Textiles* sector, no municipality emerged as a sub-centre. On the

contrary, a number of municipalities indicated a loss of employment concentrations in this sector, both within the core of the city-region, as in the case of L'Hospitalet de Llobregat and el Prat de Llobregat and within the metropolitan region as in the case of Castellar del Vallès.

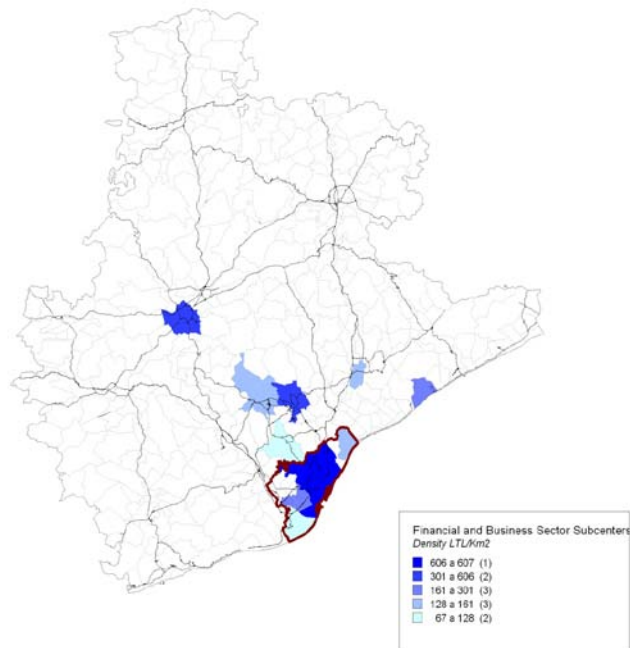
Maps 7-16 indicate the **density of locally-based jobs** and the **sub-centres of locally based jobs** for each of the five key sectors under analysis – the *financial and business related services* sector (Maps 7 and 8); the *creative industries* sector (Maps 9 and 10), the *education, and research and development* sector (Maps 11 and 12); the *medium-high technological industries and medical machinery* sector (Maps 13 and 14); and finally the *textile industries* sector (Maps 15 and 16).



## Financial and business related services



Map 7: Density of locally-based jobs within the financial and business related sector (2001)  
Source: Own elaboration, INE, Census of Population 2001

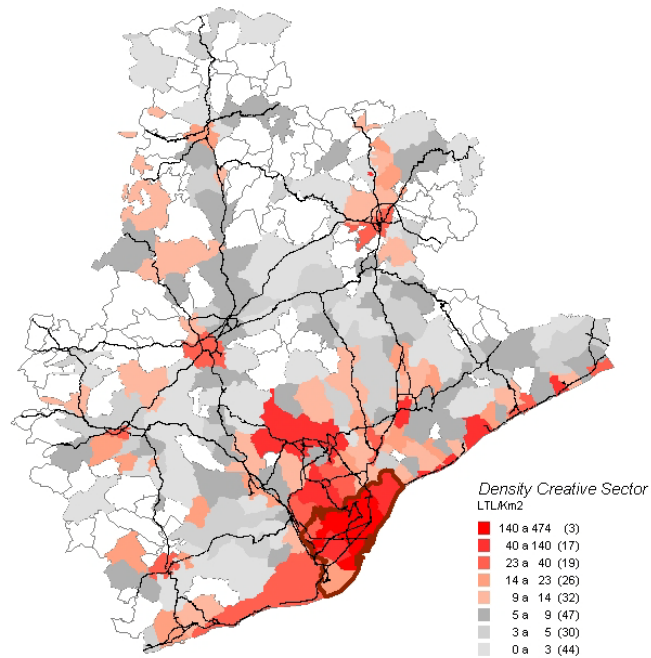


Map 8: Sub-centres<sup>24</sup> of locally based jobs within the financial and business related services sector (2001)

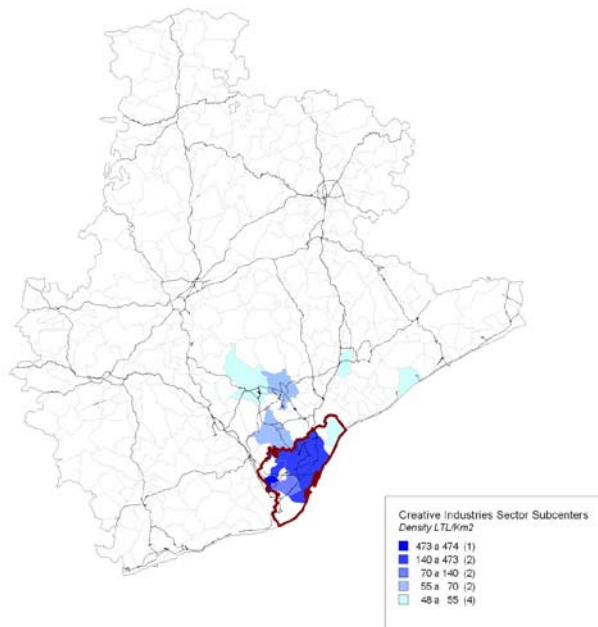
<sup>24</sup> Badalona, Barcelona, Cornellà de Llobregat, Granollers, L'Hospitalet de Llobregat, Manresa, Mataró, El Prat de Llobregat, Sabadell, Sant Cugat del Vallès and Terrassa.

Source: Own elaboration, INE, Census of Population 2001

## Creative industries



Map 9: Density of locally-based jobs within the creative industries sector (2001)  
Source: Own elaboration, INE, Census of Population 2001

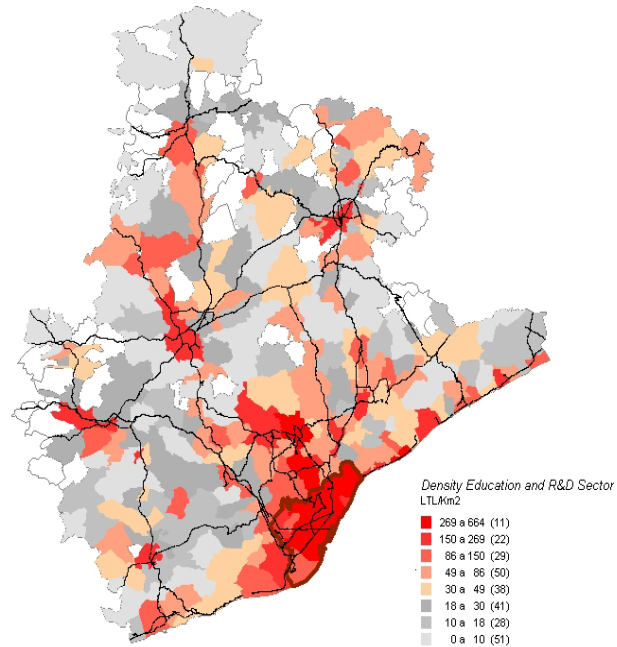


Map 10: Sub-centres<sup>25</sup> of locally based jobs within the creative industries sector (2001)  
Source: Own elaboration, INE, Census of Population 2001

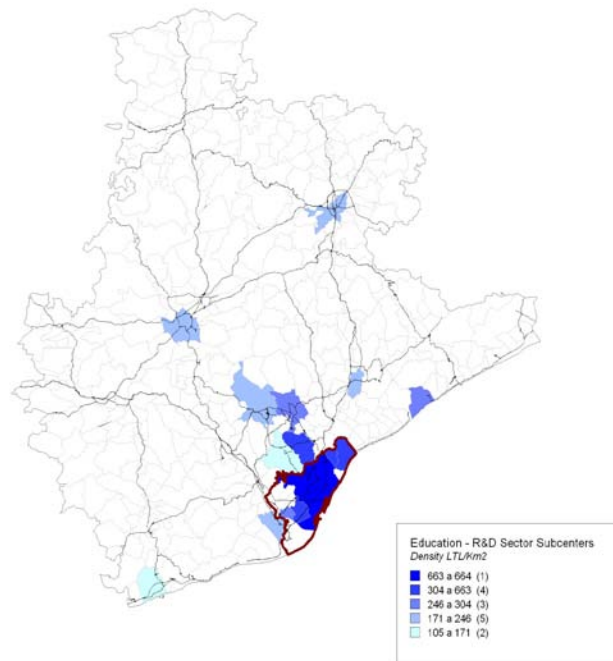
<sup>25</sup> Badalona, Barcelona, Cornellà de Llobregat, Granollers, L'Hospitalet de Llobregat, Mataró, Sant Cugat del Vallès, Sant Joan Despí, Sant Just Desvern and Terrassa.



## Education, and Research and Development



Map 11: Density of locally-based jobs within the education and research and development sector (2001)  
Source: Own elaboration, INE, Census of Population 2001

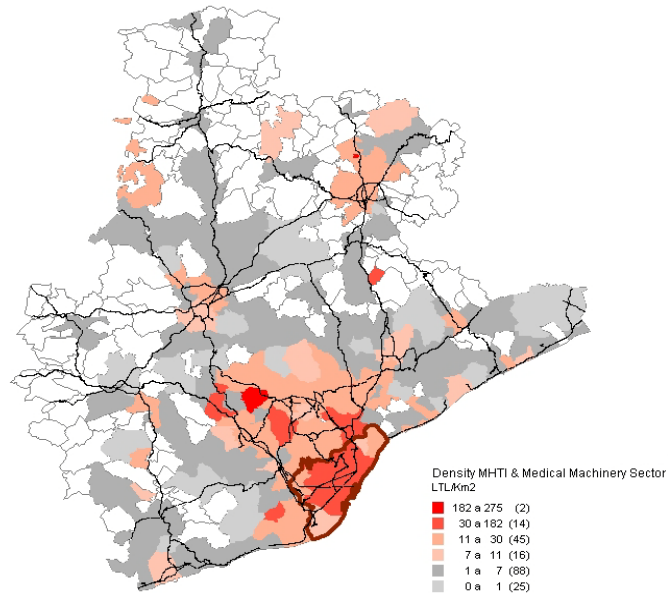


Map 12: Sub-centres<sup>26</sup> of locally-based jobs within the education and research and development sector (2001)

<sup>26</sup> Badalona, Barcelona, Cerdanyola del Vallès, Cornellà de Llobregat, Granollers, L'Hospitalet de Llobregat, Manresa, Matarò, Sabadell, Sant Boi de Llobregat, Sant Cugat del Vallès, Santa Coloma de Gramenet, Terrassa, Vic and Vilanova i la Geltrú..

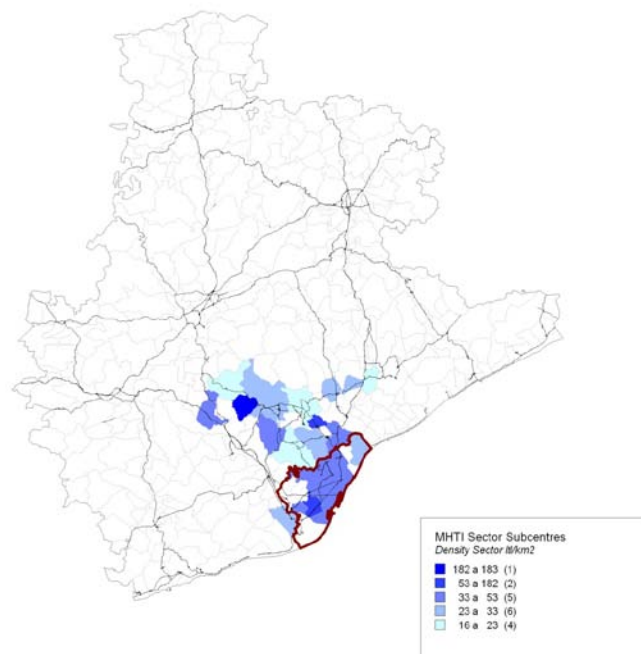
Source: Own elaboration, INE, Census of Population 2001

### Medium-high technological industries and medical machinery



Map 13: Density of locally-based jobs within the medium-high technological industries and medical machinery sector (2001)

Source: Own elaboration, INE, Census of Population 2001



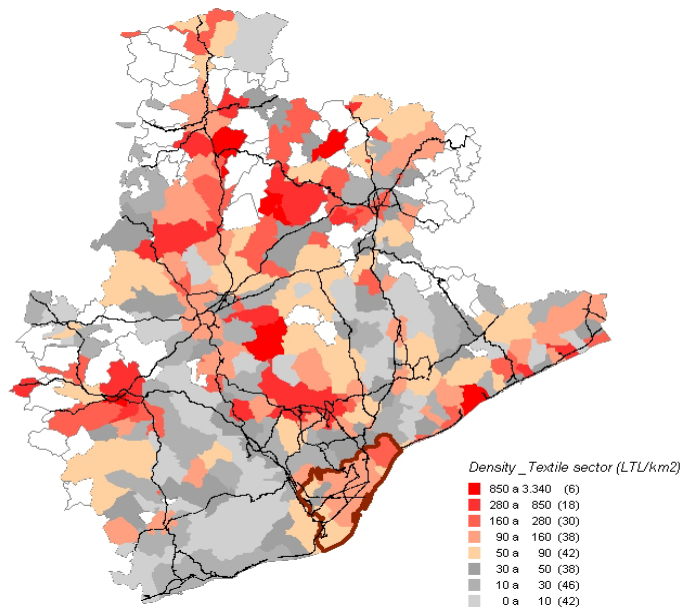
Map 14: Sub-centres<sup>27</sup> of locally-based jobs within the medium-high technological industries and medical machinery sector (2001)

<sup>27</sup> Badalona, Barberà del Vallès, Barcelona, Cerdanyola del Vallès, Cornellà de Llobregat, Esparreguera, Granollers, L'Hospitalet de Llobregat, Lliça de Vall, Montcada i Reixac, Palau-solità i Plegamans, Rubí, Sabadell, Sant Boi de Llobregat, Sant Cugat del Vallès,

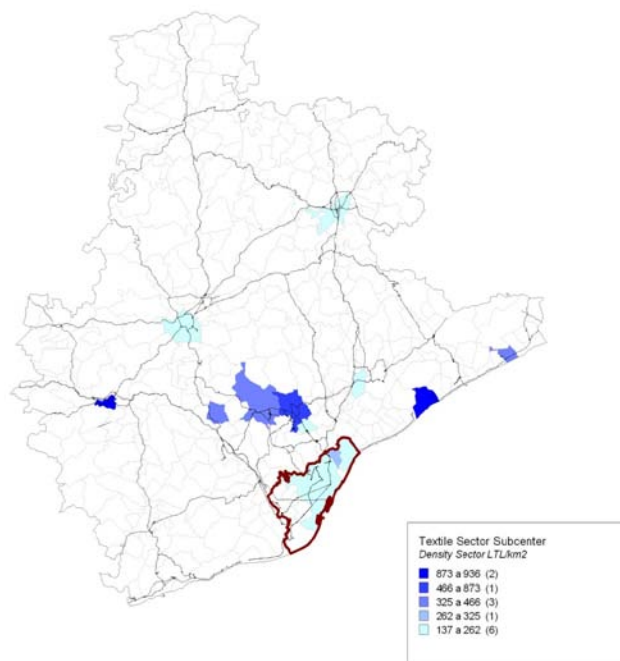
Source: Own elaboration, INE, Census of Population 2001



## Textile industries



Map 15: Density of locally-based jobs within the textile sector (2001)  
Source: Own elaboration, INE, Census of Population 2001



Map 16: Sub-centres<sup>28</sup> of locally based jobs within the textile sector (2001)  
Source: Own elaboration, INE, Census of Population 2001

<sup>28</sup> Badalona, Barberà del Vallès, Barcelona, Granollers, Igualada, Manresa, Matarò, Olesa de Montserrat, Pineda de Mar, Sabadell, Santa Coloma de Gramenet, Terrassa and Vic.



Figure 2 indicates the spatial distribution and strength of the sub-centres throughout the city-region in 2001, with the relative importance of the key sector(s) in each such sub-centre.

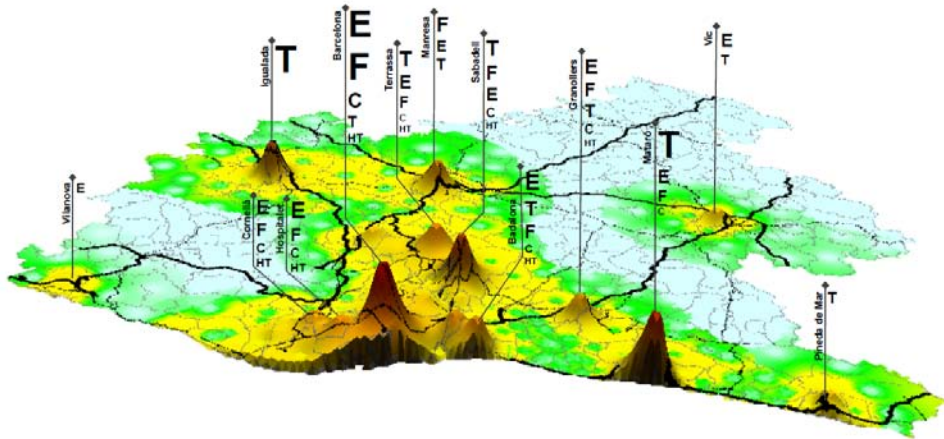


Figure 2 Sub-centres of the 5 key sector economic activities across the city-region (2001) [C = creative; E = education and research and development; F = financial and business; HT = HT manufacturing; T = textile]

Source: Own elaboration, INE, Census of Population, 2001

Prior to turning attention to the qualitative case studies, it is appropriate to make some concluding remarks concerning the KIS analysis. The said KIS sectors account for some 19% of the total employment of the city-region and as is usual for post-industrial economies; their growth rates are higher than other sectors. As a result they increase their employment share. This share would be considerably higher if the true functional area of the Barcelona city-(metropolitan)-region were to be analysed, being much smaller than the city-region designation of the Barcelona Province.

Of the 5 key sectors studied, the financial and business, creative, and education and R+D sectors all indicated a significant increase in their share. By contrast the high-tech manufacturing and in particular the textile industries sectors both lost their shares. Textile industries lost both their share and employment, but some of them have transformed their production chains towards more 'advanced and fashionable' fabrics.

Barcelona stands out as the most polycentric metropolitan urban region in Southern Europe, and it is interesting to note that traditional KIS activities such as finance, insurance, real estate, consultancies, etc, still remain highly concentrated in the municipality of Barcelona as well as

in the adjoining municipalities. It might suggest that such sectors are highly dependent upon ‘urbanisation’ economies: the core of metropolitan region (RMB) is the most diverse in terms of economic activity and social diversity in Catalonia (i.e. advanced services require both highly educated population as well as people willing to accept low salaries for banal services). The same seems to be valid for cultural and creative industries, which are also linked to the patrimonial heritage located in the older towns (sub-centre in Mediterranean-Europe)

Since *education and research and development* is basically publicly funded in Spain, the location decisions are based on spatial planning and social-targeted decisions, so their spatial pattern is more balanced across the metropolis. In the Spanish paradigm, such sectors might be used to promote a more equilibrated territorial model.

High-tech manufacturing is rising across new industrial belts located further away from the metropolitan core and mature sub-centre. Usually they follow opportunistic land assemblies promoted both by the local and regional authorities, which in Spain share the spatial planning powers.

Finally despite showing losses in employment, textile industries remain in pockets distributed beyond the functional area of Barcelona, in localities whose economic base has been orientated to such an activity for the past five centuries. It might suggest that textile is quite dependent on ‘localisation’ economies, especially on firms’ tradition and skilled labour markets.

### **Qualitative case studies**

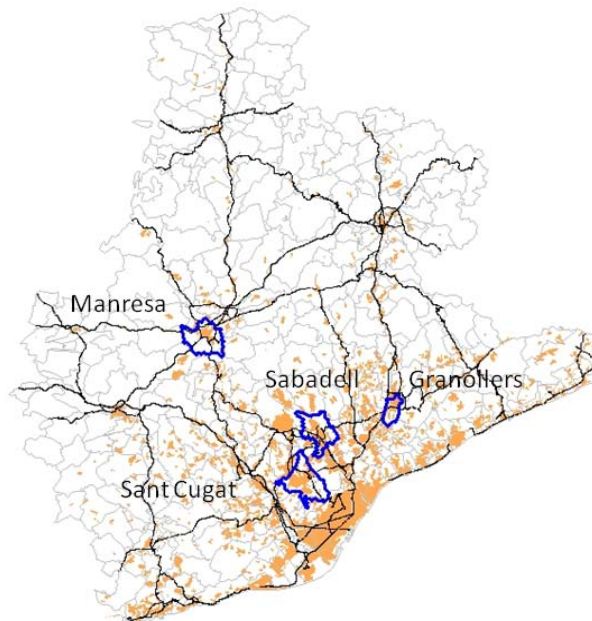
Four municipalities were selected for an in-depth qualitative analysis. On the basis of the strong concentration of economic activity in and immediately around Barcelona there are many examples where the relationship between such activity and public policy is intrinsically clear. The 22@Barcelona<sup>29</sup> urban regeneration project currently being undertaken on former industrial land of the Poble Nou district of the city, in order to lead to the creation of a new mixed-use innovation district, based upon the three pillars of urban, economic and social innovation, is of a scale (almost 200 hectares) where public policy backed economies of agglomeration can be found. However for the in-depth analysis it was considered more interesting to focus on

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<sup>29</sup> <http://www.22@barcelona.com>

municipalities beyond the built-up and economic core of the city-region. For this reason the sample of chosen cities includes Sabadell, Sant Cugat del Vallès, Manresa and Granollers (see Map 17). In 2009, Sabadell had the highest population (206,493 inhabitants), followed by Sant Cugat del Vallès (79,253 inhabitants), Manresa (76,558 inhabitants) and Granollers (60,658 inhabitants).

The in-depth analysis was carried out as a result of interviews with staff of the respective local authorities, in the main within the economic promotion departments. All of these municipalities correspond to stable and diversified sub-centres. The last three are sub-centres for the five key sectors previously examined; historically they have been employment sub-centres of the Province and municipalities giving employment structure at the county and provincial scale. Sant Cugat del Vallès is a municipality which has emerged in recent years as an employment sub-centre of the province and the metropolitan region (RMB), principally in the sectors linked to high technology industry and knowledge-based economies (KIS sectors). Basically it has been its proximity to the core of the city-region and its privileged location surrounded by a variety of important communication networks which have contributed to Sant Cugat development in this way.



Map 17: Location of the four case study areas  
Source: Own elaboration

Of the four municipalities, Sabadell and Granollers are the two which stand out as employment

sub-centres in the five key sectors. Sant Cugat del Vallès stands out as well in all but *textile industries* and Manresa stands out in *financial and business related services, education and research and development* and *textile industries*.

Sabadell presents a greater specialisation in all of the key sectors, with the exception of *technology and medical*, despite its being an employment sub-centre for the five sectors. Granollers is more specialised in *financial and business* than the other sectors. Sant Cugat del Vallès is specialised in all of the KIS sectors, but not in the *textile industries* sector for which it is not a sub-centre. Manresa is specialised in the sectors for which it is an employment sub-centre.

The analysis indicates that over the period 1991-2001, Sabadell is the only municipality of the tour which has shown stability as an employment sub-centre for the five key activities, the same is true for Granollers, with the exception of the *creative* sector, for which it became a sub-centre in the period leading up to 2001; Sant Cugat del Vallès, maintained stability as an employment sub-centre for the *education and research and development* and *technology and Medical* sectors, and emerged in 2001 as an important sub-centre for the *financial and business* sector. Manresa maintained stability in the sectors for which it is an employment sub-centre.

These then are the different characteristics of each of the four municipalities, employment sub-centres in their own right, and reflecting the dynamics experienced across the Barcelona city-region in the period 1991-2001. Furthermore they illustrate the effect that economies of agglomeration have had in the dynamics of the emergence and stability of the sectors, as a consequence, amongst other factors, of the processes of decentralisation and de-location of some economic activities and processes of urban development.

#### Case study 1<sup>30</sup>: **Sabadell**

In the case of *Sabadell*, almost 21 km from the centre of Barcelona, the activities which stand out in its economic structure relate to the **financial and business related services** sector, the

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<sup>30</sup> The authors gratefully acknowledge the assistance provided by staff from the economic promotion service (*Promoció Econòmica de Sabadell, S.L.*) of the *Ajuntament de Sabadell*.

**textile industries** sector, the **creative industries** sector and finally the **education, and research and development** sector.

With regard to the **textile industries** sector, what is occurring is a gradual conversion from more traditional textile related activities, to a niche of high quality textile products, where one of the important local firms is making considerable investment in research and development. The City Council offers support, but of a purely technical nature. The local firms of this sector receive assistance, but not from a local level – rather from the Regional Government in the form of strategic investment through the purchase of machinery, and in business planning, via consultancies, directed towards strategic business reorientation.

As of 2004, the Central Government has promoted “Strategic Textile Plans” in order to determine the most appropriate strategies to enable the textile industry to gain in competitiveness, in the face of ever-increasing competition from Asian countries. Those firms which have achieved positive results are those who have introduced innovation within their working practice. The “Strategic Textile Plans” have had continuity at a local level with “Innovation Plans”, which detect clusters within the wider area, one of which is the textile industry. These Innovation Plans set targets and actions with firms of the sector in order to increase competition, to assist in finding new forms of finance, to propose training programmes, etc. What is clear that none of this assistance is in the form of direct economic support, but providing contact and support with consultants to enable the resolution of these strategic business considerations.

Furthermore effort is being made by the City Council to reconvert some of the existing industrial estates of the zone with special characteristics (warehouses with extensive floor areas, etc.) for the relocation of textile related firms by way of modifications through local planning, designed to favour smaller firms, given that the current activities are generally more intensive and diversified.

Turning to the **creative industries**, the city has witnessed an enormous increase in service related activities and also leisure and recreation activities.

One of Sabadell’s most important avenues, **Eix Macià**, which gives structure to the city, is currently going through a process of redevelopment. What is being sought, from the City

Council, is the connection of the northern part of the city with its centre. With the descent of industrial activity, the intention of this major redevelopment is to reconvert the zone in a huge commercial and office façade, as well as the creation of “**Parc Catalunya**” to generate attraction. What is being promoted is the “capitality” of Sabadell in commerce, offices and services linked to financial services, and construction. The key location of a store of the firm El Corte Inglés, Spain’s prime chain department stores, is symptomatic of the expectations such a company has in the integrated redevelopment of this central zone of the city.

In the **financial and business related services** sector the city is important for the name it gives to a bank (Banc Sabadell) and a building society (Caixa Sabadell), both of which have undergone considerable expansion in recent years with the opening of new central headquarters and offices.

In terms of **economic promotion**, it would appear that the City Council is making a concerted effort to consolidate and attract investment, in order to increase the city’s competitiveness and attraction, focussed principally on the **industrial estates** (better management, the detection of firms’ needs, census of firms, etc.); the detection of **clusters** and promoting consortiums of firms to encourage synergies; the setting up of a one-stop-shop type of **business advice centre** (OAEA - *Oficina d’atenció a la empresa d’autònom*); and publicising useful business contacts (Chamber of Commerce, textile employers’ organisation, etc.) capable of providing advice and resolving (specialist) business related enquiries.

**Economic positioning** of Sabadell:

- Good accessibility and communications – public transportation (rail); proximity to Barcelona (15 minutes); C-58, AP7, B-30, etc.; and Sabadell Airport;
- Proximity to resident population representing a high percentage of the labour market of the city-region; and
- Proximity to specialised pool of labour, especially in the vicinity of the Autonomous University of Barcelona (UAB).



Case study 2<sup>31</sup>: **Sant Cugat del Vallès**

In the case of *San Cugat del Vallès*, at a distance of almost 16 km from the centre of Barcelona the activities which stand out in its economic structure relate to the **medium-high technological industries and medical machinery** sector and the **creative industries** sector. In addition to the presence of a large number of important firms and bodies in these sectors (Hewlett Packard, Mitsubishi Electric and Sharp, and TVE Catalunya (Televisió Espanyola) and the Catalanian National Archive) it is also relevant to comment on the evolution of two other of the key sectors within the city. The **education and research and development** sector, by virtue of the location of important prestigious firms specialised in business studies training (ESADE) as well as the International University of Catalonia (UIC); and the **financial and business related services** sector by virtue of the location of one of the headquarters of the Banc de Sabadell.

Focussing on the **medium-high technological industries and medical machinery** sector, its importance arose as a direct consequence of the location of Hewlett Packard approximately 25 years ago, being the first firm to locate on the Can Sant Joan industrial estate. The initiative came from the Regional Government and land was ceded from the ownership of INCASOL, the Catalanian Land Institute. The objective was to create an important business space and create a precedent as an engine to attract other advanced industrial firms, knowledge-based service firms, central headquarters of large companies, as well as R + D departments. As a consequence other firms which relocated in this cluster include Mitsubishi Electric, Sharp, JVC, Delphi, Intercom, Ubisoft and Fractus.

In terms of the **creative industries** sector, two organisations are worthy of attention: the Centre of High Sporting Performance (CAR) developed between 1987 and 1992 as an initiative of the regional Government; and the Theatre and Auditorium of Sant Cugat, promoted by the City Council in 1995. With regards to the CAR there was no ceding of land, but assistance was provided in favouring its location through local development plans in order to ensure its location within a privileged setting.

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<sup>31</sup> The authors gratefully acknowledge the assistance provided by staff from the economic promotion service (*Institut de Gestió Estratègica, Promoció Econòmica i Societat de la Informació*) of the *Ajuntament de Sant Cugat del Vallès*.

Sant Cugat had not had an industrial tradition, in contrast to other municipalities located nearby (Sabadell, Cerdanyola del Vallès, Rubí, etc.) and benefitted from large tracts of land surrounding the built-up nucleus of population. Several important organisations were located within Sant Cugat – TVE Catalunya and Catalana Occident and the City Council’s intentions were very clear – to attract important firms of the technological sector such as Hewlett Packard to act as motors to drive further development and attract firms capable of creating business related synergies. According to the City Council the attraction of firms is generated through a clear positioning of a “territory favouring business activity”, with a clear vision of providing a first class business environment conducive to advanced economic development of Catalonia, extending well beyond the industrial traditions. Furthermore the added value deriving from the close proximity to Barcelona is recognised, but without having to endure the negative aspects of the urban agglomeration (high land costs, traffic congestion, higher taxes, etc.).

As a result of the pursuit of this astute vision, Sant Cugat has converted itself into an “attraction pole”, without the necessity of offering fiscal benefits to attract investment. It seeks to maintain and preserve the most important competitive elements, choosing to not favour firms such as IKEA, logistic firms, and large commercial enterprises, preferring to generate complicity with developers to position the municipality in this sense and reject the location of firms which are of no interest.

Currently an initiative referred to as “**Silicon Vallès**” involving Sant Cugat and the municipality of Cerdanyola) is being discussed, by a consortium promoting technological firms, comparable with what is known the “Catalonian Innovation Triangle” (Cerdanyola-Rubí-Sant Cugat) located nearby, in order to project a territory and unite efforts so as to emphasise strengths.

Another initiative being discussed is the revamping of a project (Túnel ferroviari d’Horta) to reduce the congestion on the road network and to link to scientific poles – the **22@Barcelona innovation district** in the heart of Barcelona, and the **Parc Tecnològic del Vallès**<sup>32</sup>, also named as **Silicon Vallès** all of which would boost the local economy.

#### **Economic positioning** of Sant Cugat:

- No industrial tradition; availability of open space and land at favourable costs;

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<sup>32</sup> <http://www.ptv.es/>

- Excellent accessibility and communications – public transport (rail); proximity to Barcelona (20 minutes) and Barcelona Airport (25-30 minutes); Vallvidrera Tunnels (1990s); AP7, B-30; highways;
- Proximity to resident population representing a high percentage of the labour market of the city-region;
- Proximity to specialised pool of labour;
- High quality residential areas and low density of residential built form;
- High proportion of population employed in the business sector;
- Low industrial offer, making it less attractive as a destination for Spanish migrants and as a consequence less pressure on construction for residential purposes;
- Low levels of congestion (traffic and people); and
- Political stability – municipality ruled by right-wing party (CiU) since 1983.

### Case study 3<sup>33</sup>: **Manresa**

In *Manresa* located some 56 km from the centre of Barcelona the economic activities which stand out are those of the **textile industries** sector, the **financial and business related services** sector and the **education, and research and development** sector. Manresa together with the rest of the county (Bages) have had and still have a strong industrial tradition. The productive base is diversified and balanced between the industrial and service sectors, and SMEs coexist alongside large multinationals, however at this point in time the city needs to opt for more qualitative growth and construct new infrastructures.

The **textile sector** has always had an important role in the city's economic structure, but is currently suffering the consequences of international competition, especially from countries like China and India. The textile industry is now concentrated in two specialised areas: tapes and sanitary related fabrics, and the firms in this sector have been able to adapt and compete with success in the international markets.

The growth of the **education, and research and development** sector is explained in part as a consequence of the growth in population of the city and Manresa being a focus for the influx of

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<sup>33</sup> The authors gratefully acknowledge the assistance provided by staff from the *Centre de Desenvolupament Empresarial* (CEDEM) of the *Ajuntament de Manresa*.

population arriving in Catalonia from abroad as part of the wave of immigration. Between 1996 and 2005 the city's population increased by 10%. Having said that projects have been carried out to favour the growth of activities related to this sector, such as the increased offer of places in the *Fundació Universitària del Bages* (FUB) and the *Escola Universitària de Ciències de la Salut de Manresa*, (EUCSM - UAB) which has been offering new degree courses in physiotherapy (1998), podology (1999) and speech therapy (2001).

The City Council understands clearly that one of the keys of the economic development is the increase in productivity and that cooperation and the grouping of firms is one of the paths in order to channel new projects which will generate value and new benefits to local companies. A series of actions under the heading of “**Manresa Innovation and Knowledge**” aim to reflect upon the system of innovation of the county at the level of clusters and have detected, the following clusters, amongst others:

- Cluster of the manufacture of design
- Cluster of advanced business services
- Cluster of eco-eno-gastronomy

Manresa benefits from an enormous culture of business support, which over the years has been institutionalised. In 2001 a local agency called **CEDEM** was created, as a joint initiative between the **Manresa City Council** and the **Manresa Chamber of Commerce**, which offered support to entrepreneurs. In 2006 CEDEM widened its support, offering more diversified services and increasing interest from the industrial estates. Today it offers services to entrepreneurs and those wishing to establish businesses, to businesses themselves, in the area of training, and also offers assistance through its bank of resources.

A **Manresa Strategic Plan 2015** was prepared in 2005, based upon cooperation, competition and the notion of working together to make it a unique place for the generation of wealth.

The four strategic principles of the said Strategic plan read as follows:

1. Manresa, central station (accessibility, mobility, etc.)
2. A capital city, articulated and with quality of life
3. Heritage, culture and knowledge
4. Wealth: innovation and economic sectors.

The ability to attract industrial activities with high added value will depend upon the capacity to offer industrial land and high quality workers. In this regard the offer of industrial land is being reinforced with the development of new estates of economic activity and will be complemented during 2010 with the **Parc Tecnològic de la Catalunya Central**<sup>34</sup>, destined to accommodate technologically advanced firms, together with centres of technology and research.

**Economic positioning** of Manresa:

1. Manresa has a strong attractive pull for industrial activities, enjoying a privileged situation with excellent access to the highway network: E9 (Barcelona-Toulouse); C-25 or Transversal Axis (Girona – Vic – Manresa – Cervera); C-15 or Llobregat Axis; and C-16. This good communication network facilitates the connectivity between the 4 Catalanian provincial capitals – (Barcelona, Girona, Lleida and Tarragona) and their proximity to France, contributing to make the area in and around Manresa a zone of strategic interest within Catalonia and the city-region with considerable potential.
2. The greater part of the industrial activity has concentrated around the urban centres of Manresa leading to the establishment of industrial estates, of which at present there are 9 with a wide diversity of facilities making it an attractive location for national and international firms alike. In particular the **Bufovent** estate provides a good example of excellent management, encouraging links and exchanges between firms, and enjoying advanced fibre optics.
3. The availability of industrial land will be augmented through developments for new industrial estates, including the **Parc Tecnològic de la Catalunya Central**, which will accommodate technologically advanced firms, and centres of technology and research.

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<sup>34</sup> <http://www.ptbages.com/ptb.htm>

4. High hope placed upon technology and R+D+I activities, via the Parc Tecnològic de la Catalunya Central, the Centre Tecnològic de Manresa (CTM), the Fundació CATIC (Centre of ICT applications of Manresa), the Fundació Universitària del Bages (FUB) and the Escola Superior Politècnica d'Enginyeria de Manresa (EPSEM), amongst others.
5. Proximity to specialised pool of labour – through the high hopes placed on the development of the *University Campus*: Fundació Universitària del Bages (FUB), ETSEB, UOC and future students' residence.

#### Case study 4<sup>35</sup>: **Granollers**

Finally in *Granollers*, at a distance of 29 km from the centre of Barcelona, the sectors of **financial and business related services** sector and the **education, and research and development** are the two which stand out for their growth over the period 1991-2001. In spite of the growth of these two sectors, in 2001 the two sectors represented just 9.8% and 4.9% respectively of the total number of locally-based jobs of the municipality.

Having said that neither of the two local experts persons interviewed for their qualitative interpretation of the dynamics experienced in these two sectors were aware of the creation of important new firms over this period nor of a conscious attempt to attract firms in either of these sectors. Rather with respect to the growth of activity within the **financial sector** was related to the overall growth of the sector with the Catalanian and Spanish economies, through an important increase in banking and building society activities, as an attempt to capture potential clients, as well as the growth in the weight and creation of new services related to firms, such as financial management, insurance, etc. What should not be overlooked is the growth of the **property activity**, given that 1996 marked the last point up until the present, when house prices fell, leading to an important increase in construction and property finance related activities in general.

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<sup>35</sup> The authors gratefully acknowledge the assistance provided by staff from the economic promotion service of the *Ajuntament de Granollers*.

With respect to the increase experienced in the **research and development** sector, which at the same time includes **education**, the local authority experts viewed this as a result of the natural growth and in-migration experienced by Granollers over the study period, requiring new primary and secondary educational facilities.

In view of the asserted absence of a singularly local explanation for the dynamics experienced by these sectors, it was considered appropriate to analyse business and planning related changes in the period under study, as well as the current and future economic and business realities of Granollers.

The period 1991-2001 saw an important increase in the hotel capacity of Granollers, through both the construction of new hotels and the increase in offer of existing hotels. Two reasons can be detected contributing to this – the construction of the grand prix motor racing complex – *Circuit de Catalunya* – in 1991, at Montmeló in close proximity to Granollers; and the hotel offer required supplementing that of Barcelona itself for the 1992 Olympic Games.

Granollers continues to be a city where employment in the industrial sector is significant and where there is a high degree of diversity. Nevertheless two industries stand out over the remaining – the agro-alimentation sector and the home decoration sector (lighting, curtains, furniture, etc.). What also stands out in the county, beyond the limits of the municipality itself, is the health-related sector, in terms of pharmaceutical industries and medical technology industries.

However the municipality has virtually exhausted all its potential in terms of the supply of industrial land and the availability of space within the existing industrial estates.

**Economic positioning** of Granollers:

- Shortage of land suitable for (industrial) development;
- Highly industrialised and diversified economy;
- Accessibility and communications – public transportation (rail); rapid road access via the AP7 and C-58; and programmed communication route (Ronda del Vallès); and
- Strong pole of attraction for employment and commercial activity

The following key areas give an indication of where there might be scope for future economic and business activities in Granollers:

- The promotion of small-scale commercial activity
- Continuity in the promotion of industrial activity
- Improved management of industrial estates and encouraging associations amongst businesses represented, in order to increase competition and the attraction of Granollers

### **Concluding remarks on the four qualitative case studies**

In the past each of the four case study municipalities was characterised by different approaches towards embracing economic activity in general – generating commercial and office capital in Sabadell, the emphasis on positioning in the case of *Sant Cugat*, improving support given towards enterprises in *Manresa* and enabling the diversity of firms in the case of *Granollers*. However with the exception of *Granollers*, which has adopted an approach of protecting smaller businesses, there would appear to have been a convergence over time in *Sabadell*, *Sant Cugat* and *Manresa* towards a common strategy of making a concerted effort towards improving the efficiency in the management of the industrial estates, in order to augment cooperation, competition and the attraction of the three municipalities.

The other common features of each of the four case studies include good accessibility and communication, less congestion, industrial land prices being lower than in the core of the city-region (i.e. in and immediately around Barcelona), access to a wide labour market and, with the exception of *Granollers*, the availability of industrial land.



#### 4. Conclusions

This section draws together the main considerations of the relationship between the two principal issues examined in this report, i.e. the administrative structure of the Barcelona city-region and the evolution of metropolitan governance, and the economic structure of the city-region itself. These considerations are discussed against the background of the following five questions put to all of the partners of the research consortium towards the close of the ESPON CAEE project, namely:

1. How have agglomeration economies shaped the geography of economic activity within the selected metropolitan areas and city-regions? Another way of putting this is 'how has the distribution of employment in key sectors changed over time and does this suggest evidence of increased advantages from the clustering of activity?
2. What institutional capacity and levels of autonomy are present within the case study areas at the metropolitan/city-regional scale and how have these changed over time?
3. Is there evidence to suggest that public policies and public expenditure have played a key role in the promoting and shaping the pattern of agglomeration economies?
4. To what extent have metropolitan/city-regional institutions and forms of governance contributed to the total public sector effort? and
5. What lessons can be learned from the experience of metropolitan or city-regional governance arrangements in the case study areas, how transferable are they, and how might their capacity to understand, promote and manage the benefits of agglomeration economies develop in future?

What needs to be emphasised is that the spatial distribution of economic activity across the city-region is far from uniform. In terms of locally-based jobs, in 2001 over 60% were located within the limits of the 'metropolitan area' (AMB) representing just 8.2% of the total area of the city-region but accommodating over 60% of the city-region's (2008) population. Over 90% of the city-region's locally-based jobs in 2001 were located in the wider area of the 'metropolitan region' (RMB) which incorporates the AMB – the RMB represents 42% of the total area of the

city-region and in 2008 was home to 91% of the city-region's population. However what is critical to appreciate is precisely the converse, in that just 8% of the city-region's employment was located in a territory representing 58% of that of the entire city-region, but which in 2008 had a population of just 9% of the city-region.

Therefore the principal characteristic of the Barcelona city-region is this concentration of economic activity in and around the metropolitan core, (i.e. the capital, and the 'metropolitan area' and the immediately adjoining part of the 'metropolitan region', and the low representation of such activity within the hinterland or remainder of the city-region, with the exception of important centres of employment such as Manresa, Martorell, Vic and Berga. Furthermore it is precisely this hinterland which, apart from organisations such as the *Metropolitan Arc Association*<sup>36</sup> and the *Association of Municipalities with Urban Transport*<sup>37</sup> is devoid of institutions of a supra-local nature.

In relation to the effect of agglomeration economies in shaping the geography of economic activity within the Barcelona city-region, it is important to emphasise that the start of the period studied, i.e. the end of the dictatorship under Franco in 1975 and the return to democracy with the Spanish Constitution of 1978 coincides with the major structural change in the economy experienced to a large extent across the western world. The deindustrialisation marking the decrease in industrial economic activity and the increase in economic activity in the service sector was very much reflected in the Barcelona city-region. The change from an industrial based economy to a knowledge based economy is exemplified by the urban regeneration project currently being carried out in the heart of Barcelona, in the area of Poble Nou, which in the 19<sup>th</sup> Century lay beyond the city limits and represented Barcelona's historical industrial estate. The 22@Barcelona 'innovation district' development, based upon the notions of a knowledge-based society, is being carried out on the very land which in the late 1960s and early 1970s was characterised by empty warehouses and abandoned industrial land. What industrial activity that survived the effects of deindustrialisation relocated out of the built-up limits of the city to the newly developed industrial estates of Vallès Occidental and Vallès Oriental, which are today very much part of the city-region. However the most dramatic changes in the distribution of employment experienced within the city-region, from the dominance of the industrial sector to

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<sup>36</sup> <http://www.arcmetropolitana.org/>

<sup>37</sup> <http://www.amtu.cat/amtu/>

the dominance of the service sector, have resulted from external economic forces, as opposed to public policy within the city-region itself.

Having said that it is clear from the analysis of the key (KIS) sectors and in particular the four case studies that there are examples of towns and cities (municipalities) where the clustering and/or agglomeration of activities is taking place. In some cases from natural forces while in other cases (e.g. 22@Barcelona, Parc de l'Alba) as part of a clear public policy process.

Turning to the assessment of the degree of institutional capacity and levels of autonomy within the case study areas and the possible changes over time, according to Spanish legislation, the government of Catalonia indeed has the capacity for creating metropolitan areas. However, the *Generalitat* made use of these powers in the mid-1980s to abolish the existing metropolitan government, the former Metropolitan Corporation of Barcelona (CMB) and to create metropolitan agencies with single functions (transport, environment). This can be understood if one considers that an additional layer of government would represent a competitor for an institutional actor (the Autonomous Community) which is still in a phase of development in the Spanish political system. Thus in this field a paradoxical situation is faced, whereby the legal provisions for institutional consolidation of metropolitan areas, far from contributing to the emergence and spread of this kind of organisational arrangement have hampered it because the actors responsible for initiating the process have no incentives to do so.

In relation to city-regional autonomy, in Spain, the creation of a regional tier has transformed the fiscal distribution from central government to regional government, while the fiscal capacity of local government has not improved.

Exactly the same has occurred in urban policies, especially urban planning. In Barcelona, the regional level 'centralised' the competences in urban planning of the metropolitan area with the abolition of the metropolitan authority, diminishing the capacity of local governments to be autonomous. This has happened since regional governments have competences over local government, shared with the central government.

Looking at the role of public policies and public expenditure in the promotion and the shaping of the patterns of agglomeration, in the Barcelona city-region there is evidence to suggest that in some respects this has been crucial. One need only cite the case of 22@Barcelona, promoted by

Barcelona City Council and the public agency of the City Council of the same name, and Parc de l'Alba being developed as part of the joint initiative between the local city council (Ajuntament de Cerdanyola del Vallès), a specially constituted planning consortium (Consorci Urbanístic de Cerdanyola del Vallès) and the land agency of the regional government (INCASOL) to get a notion of the role of public policy and public expenditure shaping agglomeration patterns. However to be fair these two examples are somewhat atypical and in many respects represent 'flagship' type developments.

However the overall support from regional government has been very selective. Cases clearly exist of an important input, as in the case of the support given to the municipality of Sant Cugat to achieve the inward investment from Hewlett Packard, with the cession of land, but across the city region such examples tend to reflect the exception, rather than the norm. Furthermore what needs to be recalled is the low share of total public expenditure enjoyed by the local authorities. While the regional government share of public expenditure has increased over time, with a concomitant decrease in the central government share, the local government share, in the order of 12.5%, has remained unchanged.

Turning to the question of the contribution from metropolitan/city-regional institutions to the total public sector effort in the case of an overall regional (Catalonian) agenda the Autonomous Community, pursuing the competences accrued thereto under the Constitution in terms of spatial planning, has made considerable effort towards the achievement of a *regional agenda*. The broad overall spatial plan for Catalonia (*Pla territorial general de Catalunya*) was approved by the regional government in 1995 and more recently more detailed spatial plans have been prepared for two specific areas of the city-region: firstly the *Pla territorial parcial de les Comarques Centrals*, covering the four central counties of Anoia, Bages, Berguedà and Osona approved in 2008; and secondly, in April 2010, the *Pla territorial metropolitana de Barcelona* covering the seven counties of Barcelonès, Baix Llobregat, Maresme, Alt Penedès, Garraf, Vallès Oriental and Vallès Occidental. Consequently the spatial planning policies for the *city-region* as such are fragmented in two plans, responding to the needs of two spatial realities.

This in many ways is symptomatic of the absence of a shared narrative for the *city-region* as a whole. There is a clear nationalist and cultural narrative for Catalonia, and similarly a narrative for Barcelona emanating from the City Council. Many residents of the city would take exception to the city narrative given the tendency to market a post-card image of a dynamic,

creative, competitive and innovative Mediterranean city, with little if any regard given to social issues. Indeed in the context of the Expo 2010 Shanghai China World fair, the slogan for the city is “Barcelona shows the world its creative and innovative sides”. However for the city-region no such narrative, neither positive nor negative, exists. This is surprising given that the Barcelona city-region is probably the largest of the city-regions along the Mediterranean coastline.

Closing with some considerations relating to the lessons learned from the experience of metropolitan or city-regional governance arrangements in the Barcelona city-region and their transferability, the Barcelona city-region stands out for its location within the Autonomous Community and a region which has enjoyed devolution of power in many aspects of public policy over the past 30 years. Indeed Catalonia was a point of reference for Scotland in the period leading up to the achievement of devolution in 1999. Whether as a result of the devolution enjoyed over the last 30 years or for other reasons, what is strongly evident is the difficulty experienced in accessing and connecting with the seat of central government in Madrid. And the ensuing tensions between the two levels of public administration. At the regional level, the difference in the political colours of the Catalonian regional government, and those of Barcelona City Council and immediately adjoining local authorities in the mid-1980s led to the abolition of the then metropolitan corporation in circumstance synonymous with the abolition of the Greater London Council in 1986. In spite of the electoral pledges emanating from the parties of the left-wing coalition of the regional government brought to power in 2003, the issue of the restoration of a metropolitan authority remains outstanding.

What can be said is that with the experience of 30 years of autonomous rule, the potential for the (re)creation of metropolitan and city-regional governance arrangements which could contribute to the benefits of agglomeration economies is enormous. However for the time being the deeply entrenched system of multilevel governance characteristic of Spain acts as a hindrance to the achievement of these objectives, highlighting the gulf between the potential and the reality.

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